## mEdPAC <br> Medicare Payment Advisory Commission

The Medicare Payment Advisory Commission (MedPAC) is an independent congressional agency established by the Balanced Budget Act of 1997 (P.L. 105-33) to advise the U.S. Congress on issues affecting the Medicare program. In addition to advising the Congress on payments to health plans participating in the Medicare Advantage program and providers in Medicare's traditional fee-for-service program, MedPAC is also tasked with analyzing access to care, quality of care, and other issues affecting Medicare.

The Commission's 17 members bring diverse expertise in the financing and delivery of health care services. Commissioners are appointed to three-year terms (subject to renewal) by the Comptroller General and serve part time. Appointments are staggered; the terms of five or six Commissioners expire each year. The Commission is supported by an executive director and a staff of analysts, who typically have backgrounds in economics, health policy, and public health.

MedPAC meets publicly to discuss policy issues and formulate its recommendations to the Congress. In the course of these meetings, Commissioners consider the results of staff research, presentations by policy experts, and comments from interested parties. (Meeting transcripts are available at www.medpac.gov.) Commission members and staff also seek input on Medicare issues through frequent meetings with individuals interested in the program, including staff from congressional committees and the Centers for Medicare \& Medicaid Services (CMS), health care researchers, health care providers, and beneficiary advocates.

Two reports-issued in March and June each year-are the primary outlets for Commission recommendations. In addition to annual reports and occasional reports on subjects requested by the Congress, MedPAC advises the Congress through other avenues, including comments on reports and proposed regulations issued by the Secretary of the Department of Health and Human Services, testimony, and briefings for congressional staff.

## REPORT TO THE CONGRESS

## Medicare Payment Policy

# MEUPAC <br> Medicare Payment <br> Advisory Commission 

425 I Street, NW • Suite 701
Washington, DC 20001
202-220-3700 •www.medpac.gov

Michael E. Chernew, Ph.D., Chair
Amol Navathe, M.D., Ph.D., Vice Chair James E. Mathews, Ph.D., Executive Director

March 15, 2023

The Honorable Kamala D. Harris
President of the Senate
U.S. Capitol

Washington, DC 20510
The Honorable Kevin McCarthy
Speaker of the House
U.S. House of Representatives
U.S. Capitol

Room H-232
Washington, DC 20515
Dear Madam President and Mister Speaker:
I am pleased to submit the Medicare Payment Advisory Commission's March 2023 Report to the Congress: Medicare Payment Policy. This report fulfills the Commission's legislative mandate to evaluate Medicare payment issues and make recommendations to the Congress. The report also satisfies an additional legislative mandate to compare per enrollee spending in the Medicare Advantage (MA) program with that of traditional fee-for-service (FFS) Medicare.

The report contains 12 chapters:

- a chapter that provides a broader context for the report, including the near-term consequences of the coronavirus pandemic and the longer-term effects of Medicare spending on the federal budget and the program's financial sustainability;
- a chapter that describes the Commission's analytic framework for assessing payment adequacy;
- seven chapters that describe the Commission's recommendations on Medicare FFS payment rate updates and related issues;
- a chapter that describes ambulatory surgical centers' participation in FFS Medicare;
- a chapter that describes recent trends in enrollment, plan offerings, and payments to MA plans, discusses related issues such as risk adjustment and coding intensity, and includes the congressionally mandated report comparing per enrollee spending in MA and FFS Medicare; and
- a chapter that updates the trends in enrollment, plan offerings, and payments for plans that provide prescription drug coverage under Part D.

Three years into the coronavirus pandemic, Medicare beneficiaries, health care workers, and providers continue to experience lingering effects from COVID-19. Thanks to the availability and use of vaccines
and therapies, mortality rates from the disease have dropped substantially. As of the writing of this report, the administration has announced its intent to end the coronavirus public health emergency on May 11, 2023. Yet COVID-19 variants continue to evolve, and the future effects of coronavirus transmission on the demand for health care services remains uncertain. In this report, we discuss some of the effects of the pandemic on beneficiaries' access to care and on providers' revenues and costs. However, a fuller discussion of the pandemic's effects on beneficiaries and providers is beyond the scope of this report.

The Commission is acutely aware of how providers' financial status and patterns of Medicare spending varied in 2020 and 2021 from historical trends, as well as the higher and more volatile increases in input costs for several health care sectors that occurred during 2022. Still, our statutory charge is to evaluate available data to assess whether Medicare payments, in aggregate, are sufficient to support the efficient delivery of care and ensure access to care for Medicare's beneficiaries. In this report, we make recommendations aimed at giving providers incentives to constrain their cost growth and thus help control program spending. If current projections of input inflation turn out to be inaccurate, these discrepancies will be accounted for in our assessment of payment adequacy in our next recommendation cycle.

In light of our payment adequacy analyses, we recommend for 2024 a higher-than-current-law FFS payment update for acute care hospitals, positive payment updates for two other sectors (physician and other health professional services and outpatient dialysis), and negative updates for three post-acute care sectors (skilled nursing facility, home health, and inpatient rehabilitation facility). We recommend a positive payment update in 2024 for hospice providers concurrent with wage adjusting and reducing the hospice aggregate Medicare payment cap by 20 percent. We also recommend providing additional resources to Medicare safety-net hospitals (as well as redistributing current disproportionate share and uncompensated care payments) and to clinicians who furnish care to Medicare beneficiaries with low incomes.

I hope you find this report useful as the Congress continues to grapple with the difficult task of controlling the growth of Medicare spending while preserving beneficiaries' access to efficiently delivered, high-quality care and providing equitable payment for providers.

Sincerely,


Michael E. Chernew, Ph.D. Chair

Enclosure

## Acknowledgments

This report was prepared with the assistance of many people. Their support was key as the Commission considered policy issues and worked toward consensus on its recommendations.

Despite a heavy workload, staff members of the Centers for Medicare \& Medicaid Services and the Department of Health and Human Services were particularly helpful during preparation of the report. We thank Kia Burwell, Catherine Cooksey, Stephen Heffler, Anthony Hodge, Michelle Hudson, John Kane, Larry Liu, Tammy Luo, Cindy Massuda, Shruti Rajan, Cheri Rice, Abigail Ryan, Kimberly Schwartz, Gift Tee, Donald Thompson, and David Vance.

The Commission also received valuable insights and assistance from others in government, industry, and the research community who generously offered their time and knowledge. They include Christine Aguiar Lynch, Michael Bagel, Kate Beller, Greg Berger, Juliette Cubanski, Joanne Cunningham, William Dombi, Janine Fink-Boyle, Theresa Forster, Jeannie Fuglesten Biniek, Bruce Gans, David Gifford, Jonathan Gold,

Leslie Gordon, Mollie Gurian, James Hahn, Jennifer Hananoki, Marc Hartstein, Kevin Hayes, Jack Hoadley, Gretchen Jacobson, Doug Johnson, Joanna Kim Hiatt, Kathleen J. Lester, Judi Lund Person, Paul Masi, Tracey McCutcheon, Alexa McKinley, Kara Newbury, Brian O'Donnell, Asha Saavoss, Sherry Smith, Stephen Speil, Cori Uccello, Lina Walker, Christopher Whaley, Shannon Wu, Shahid Zaman, and Noah Zwiefel.

Programmers and staff at Acumen LLC provided highly capable assistance to Commission staff. In particular, we appreciate the hard work of Anuradha Gajulapalli, Bruno Garcia, Cuong Nguyen, Ayush Manandhar, Kathrine Saniel, Susan Siford, Susan Tian, Xuanqi Wu, Xiao Xiao, Dashi Xu, and Rio Yan.

Finally, the Commission wishes to thank Sara June Arnold, Hannah Fein, and Melissa Lux for their help in editing and producing this report.

## Table of contents

Acknowledgments ..... $v$
Executive summary ..... xi
Chapters
1 Context for Medicare payment policy .....  3
Introduction ..... 7
COVID-19 has had a disproportionate impact on Medicare beneficiaries ..... 7
National health care spending has grown faster than GDP ..... 8
Medicare spending is projected to double in the next 10 years ..... 13
Medicare faces a financing challenge ..... 16
As Medicare spending increases, so too do premiums and cost sharing ..... 19
Medicare beneficiaries' health status has been improving ..... 22
The Commission's recommendations would slow the growth in Medicare spending and improve beneficiary access to care ..... 26
2 Assessing payment adequacy and updating payments in fee-for-service Medicare ..... 35
Background ..... 39
Assessing the adequacy of Medicare payments in 2023 ..... 42
Considering anticipated payment and cost changes in 2023 ..... 47
Recommending how Medicare payments should change in 2024 ..... 48
Payment adequacy in context ..... 50
3 Hospital inpatient and outpatient services ..... 55
Background ..... 59
Are Medicare payments adequate in 2023? ..... 60
How should Medicare payments change in 2024? ..... 80
Supporting Medicare safety-net hospitals ..... 82
Appendix: Supplemental information on the Medicare Safety-Net Index ..... 95
4 Physician and other health professional services ..... 109
Background ..... 113
Are Medicare payments adequate in 2023? ..... 115
How should Medicare payments change in 2024? ..... 131
Supporting Medicare safety-net clinicians ..... 133
Appendix: Key findings from the Commission's 2022 access-to-care survey ..... 143
5 Ambulatory surgical center services: Status report ..... 155
Background ..... 157
Supply of ASCs and volume of services continued to grow in 2021 ..... 157
The ASC Quality Reporting Program does not have enough measures for meaningful analysis ..... 161
Aggregate Medicare payments rose substantially in 2021 and were well above the prepandemic level. ..... 162
Ambulatory surgical centers should submit cost data ..... 163
6 Outpatient dialysis services ..... 171
Background ..... 173
Are Medicare payments adequate in 2023? ..... 178
How should Medicare payments change in 2024? ..... 194
7 Skilled nursing facility services ..... 203
Background ..... 207
Are Medicare payments adequate in 2023? ..... 209
How should Medicare payments change in 2024? ..... 224
Medicaid trends ..... 226
8 Home health care services. ..... 237
Background ..... 241
Are Medicare payments adequate in 2023? ..... 242
How should Medicare payments change in 2024?. ..... 252
9 Inpatient rehabilitation facility services ..... 259
Background ..... 261
Are Medicare payments adequate in 2023? ..... 262
How should Medicare payments change in 2024? ..... 277
10 Hospice services ..... 285
Background ..... 289
Are Medicare payments adequate in 2023? ..... 291
How should Medicare payments change in 2024? ..... 310
11 The Medicare Advantage program: Status report ..... 321
Background ..... 327
Increasingly robust MA enrollment, plan availability, and rebates ..... 332
Mandated report: Historical comparison shows MA payments consistently above FFS spending ..... 342
Coding differences increased payments to MA plans by $\$ 17$ billion in 2021 and generated rebate inequity across plans ..... 351
Quality in MA is difficult to evaluate ..... 363
12 The Medicare prescription drug program (Part D): Status report ..... 383
Background ..... 389
Enrollment and plan choices have continued to grow ..... 394
Part D's market dynamics have evolved ..... 398
Although moderated by generic use, brand prices have continued to grow. ..... 400
Reinsurance spending has accounted for a growing share of program costs ..... 401
While most Part D enrollees were satisfied, room for improvement remains ..... 406
Appendix
A Commissioners' voting on recommendations ..... 423
Acronyms ..... 429
More about MedPAC
Commission members ..... 435
Commissioners' biographies. ..... 437
Commission staff ..... 441

## Executive summary

## Executive summary

By law, the Medicare Payment Advisory Commission reports to the Congress each March on the Medicare fee-for-service (FFS) payment systems, the Medicare Advantage (MA) program, and the Medicare prescription drug program (Medicare Part D).

In this year's report, we consider the context of the Medicare program, including the near-term consequences of the coronavirus pandemic and the longer-term effects of program spending on the federal budget and the program's financial sustainability. We evaluate payment adequacy and make recommendations concerning Medicare FFS payment policy in 2024 for seven FFS payment systems: acute care hospital, physician and other health professional, outpatient dialysis facility, skilled nursing facility, home health agency, inpatient rehabilitation facility, and hospice services. We also include recommendations to redistribute current disproportionate share hospital and uncompensated care payments, and to provide additional resources to Medicare safetynet hospitals and clinicians who furnish care to Medicare beneficiaries with low incomes. Previously, the Commission also considered an annual update recommendation for long-term care hospitals (LTCHs). But as the number of cases that qualified for payment under Medicare's prospective payment system for LTCHs declined, we became increasingly concerned about small sample sizes in our analyses of this sector. As a result, we will no longer provide an annual payment adequacy analysis for LTCHs but will continue to monitor that sector and provide periodic status reports. The Commission also previously considered an annual update recommendation for ambulatory surgical centers (ASCs). However, because Medicare does not require ASCs to submit data on the cost of treating beneficiaries, we have no new significant data to inform an ASC update recommendation for 2024 and thus decided to provide a status report on ASCs instead of an update recommendation. We also review the status of the MA program (Medicare Part C) through which beneficiaries can join private plans in lieu of traditional FFS Medicare. Finally, we review the status of the Medicare program that provides prescription drug coverage (Medicare Part D).

Because of standard data lags, the most recent complete data we have for most payment adequacy
indicators are from 2021. Starting in 2020, the ongoing coronavirus pandemic has had catastrophic consequences for many Medicare beneficiaries and has affected health care delivery for all. In this report, we discuss some of the effects of the pandemic and pandemic-related policies on beneficiaries and providers, and we have considered the effects of the coronavirus public health emergency (PHE) on our indicators in 2021 and beyond. As of the writing of this report, the coronavirus PHE is scheduled to end on May 11, 2023. To the extent that the effects of the coronavirus pandemic are temporary or vary significantly across providers in a sector, they are best addressed through targeted temporary funding policies rather than permanent changes to payment rates in 2024 and future years.

The goal of Medicare payment policy is to obtain good value for the program's expenditures, which means maintaining beneficiaries' access to high-quality services while encouraging efficient use of resources. Payment system incentives that promote the efficient delivery of care serve the interests of the taxpayers and beneficiaries who finance Medicare through their taxes, premiums, and cost sharing.

The Commission recognizes that managing updates and relative payment rates alone will not solve what has been a fundamental problem with Medicare FFS payment systems-that providers are paid more when they deliver more services, often without regard to the value of those additional services. In addition, historically, FFS payment systems have seldom included incentives for providers to coordinate care over time and across care settings. To address these problems directly, two approaches must be pursued. First, payment reforms need to be implemented more broadly, coordinated across settings, and pursued as expeditiously as possible. Second, delivery system reforms that have the potential to encourage highquality care, better care transitions, and more efficient provision of care need to be enhanced and closely monitored, and successful models need to be adopted on a broad scale. Out of recognition of the need for reforms, CMS's Center for Medicare \& Medicaid Innovation has been testing and evaluating models such as accountable care organizations and episodebased payments.

In the interim, it is imperative that the current FFS payment systems be managed carefully and continuously improved. Medicare is likely to continue using its current FFS payment systems for some years into the future. This fact alone makes unit pricestheir overall level, the relative prices of different services within a sector, and the relative prices of the same service across sectors-of critical importance. Constraining unit price increases can induce providers to control their own costs and to be more receptive to new payment methods and delivery system reforms.

For each recommendation, the Commission presents its rationale, the implications for beneficiaries and providers, and how spending would compare with expected spending under current law. The spending implications are presented as ranges over one-year and five-year periods. Unlike official budget estimates used to assess the impact of legislation, these estimates do not consider the complete package of policy recommendations or the interactions among them. Although we include budgetary implications, our recommendations are not driven by any single budget or financial performance target but instead reflect our assessment of the payment rates needed to ensure adequate access to appropriate care while promoting the fiscal sustainability of the Medicare program.

In Appendix A, we list all of this year's recommendations and the Commissioners' votes.

## Context for Medicare payment policy

As described in Chapter 1, Medicare is the single largest health insurer in the U.S. The program covers a substantial share of many health care providers' patients and influences the payment policies of other payers. Yet external forces can also have a substantial impact on Medicare, as seen most recently with the coronavirus pandemic.

Coronavirus disease 2019 (COVID-19) has had a disproportionate impact on the three categories of Medicare beneficiaries-people ages 65 and over, people with disabilities, and people with end-stage renal disease. In addition to facing elevated risks of serious complications and mortality, Medicare beneficiaries have also had to adjust their patterns of health care use over the past few years. Some beneficiaries delayed seeking nonurgent health care at times, while others may have had difficulty obtaining
care as providers prioritized resources for the most severely ill. The Congress appropriated several hundred billion dollars in relief funds to health care providers to offset their lost revenues and ensure that they remained viable sources of care during the pandemic. The Congress and CMS also temporarily changed some payment policies. In 2020, those measures doubled the rate of growth in national health care spending. However, by 2021, relief funds tapered off, resulting in lower growth in national health care spending.

Medicare spending grew by a relatively modest 3.6 percent in 2020, then by 8.4 percent in 2021 as patients resumed care; the suspension of a 2 percent payment sequester and a temporary 3.75 percent increase to clinician payment rates (unrelated to the pandemic) also contributed to spending growth in 2021. CMS actuaries estimate that Medicare spending grew at a more typical rate in 2022, 7.5 percent, and project that Medicare spending will grow by about 6 percent to 7 percent per year in 2023 through 2030, resulting in Medicare spending doubling over the next 10 yearsrising from $\$ 875$ billion in 2021 to $\$ 1.8$ trillion in 2031. Medicare's projected spending growth is driven by an increasing number of beneficiaries (projected to expand from 63 million to 78 million over this period as the baby-boom generation continues to age into Medicare) and continued growth in the volume and intensity of services delivered per beneficiary (rather than price increases).

Despite this projected growth, the Medicare program finds itself-at least temporarily-in a somewhat better position financially than it was a year ago. After an initial economic slowdown at the start of the pandemic, the U.S. economy subsequently experienced strong growth, yielding higher-than-expected Medicare payroll tax revenues. This economic growth has contributed to a delay in the projected insolvency of Medicare's Hospital Insurance (HI) Trust Fund by a few years-to 2028, according to CMS's actuaries. However, to keep the HI Trust Fund solvent over the next 25 years, Medicare's Trustees estimate that the Medicare payroll tax would need to be raised immediately from its current rate of 2.9 percent to 3.66 percent, or Part A spending (which covers inpatient hospital stays and post-acute care following those hospital stays) would need to be permanently reduced by 16.9 percent. Alternatively, some combination of smaller spending reductions and smaller tax increases could be pursued.

Medicare payroll taxes are used to pay for Part A services and constitute only a portion of total Medicare spending (36 percent). The rest of Medicare's spending is largely funded by beneficiary premiums (which finance 17 percent of Medicare spending) and general revenues (44 percent). As Medicare spending increases, it consumes growing shares of the budgets of Medicare beneficiaries and the federal government.

Trends in beneficiaries' health status have the potential to affect Medicare program spending. In recent decades, the share of people ages 65 and over who report being in only "fair" or "poor" health has declined, as has the share of the Medicare population qualifying for the program due to disability. Until the coronavirus pandemic, there was little change in the leading causes of death in the U.S., with the Centers for Disease Control and Prevention finding that heart disease and cancer were the first and second most common causes of death among people ages 65 and over. In 2020, 2021, and 2022, COVID-19 became the third-leading cause of death. CMS actuaries have found that the Medicare beneficiaries who died of COVID-19 in 2020 tended to have high costs and multiple medical conditions, and the remaining beneficiary population was 2 percent less costly than previously expected.

One of the most powerful ways that the Medicare program can control spending growth is by setting prices. Our annual March reports recommend updates to Medicare payment rates for various types of providers, which can be positive or negative depending on our assessment of the adequacy of Medicare payments for each sector. Over the last 10 years, spending per Medicare beneficiary has grown more slowly than spending per privately insured enrollee. Increasing prices have been the main cause of spending growth for the privately insured. Complementing the payment update recommendations in this report, our annual June reports to the Congress typically present broader recommendations aimed at restructuring the way Medicare's payment systems work. For example, the Commission has recommended incorporating value-based insurance design into traditional Medicare's benefit design and changing the formula used to set payments for Medicare Advantage plans. The Commission's full inventory of recommendations, with links to relevant report chapters, is available at medpac.gov/recommendation/.

Assessing payment adequacy and updating payments in FFS Medicare
As required by law, the Commission annually makes payment update recommendations for providers paid under Medicare's traditional FFS payment systems. An update is the amount (usually expressed as a percentage change) by which the base payment rate to all providers in a payment system is changed relative to the prior year. As explained in Chapter 2, to determine an update, we first assess the adequacy of Medicare payments to providers in the current year (2023) by considering beneficiaries' access to care, the quality of care, providers' access to capital, and how Medicare payments compare with providers' costs. As part of that process, we examine whether payments will support the efficient delivery of services, consistent with our statutory mandate. We then make a judgment about what, if any, update is needed for the policy year in question (for this report, 2024).

Providers' financial status and the pattern of Medicare spending in 2020 and 2021 varied substantially from historical patterns. In the spring of 2020, many health care sectors experienced large reductions in the demand for services, resulting in temporary financial distress for some providers. In response, the Congress and CMS extended federal grants to providers and temporarily altered certain Medicare payment policies. At least in part, those actions have offset the shortterm financial effects of the coronavirus pandemic for many providers.

To fulfill our congressional mandate to recommend updates to Medicare's payment systems, we must confine our focus to factors that we expect will affect payment adequacy in 2024. To the extent that the effects of the pandemic are temporary or vary significantly across individual providers, they are best addressed through targeted temporary funding policies. Because updates are cumulative-that is, they compound each year-they are not the preferred policy response to abrupt but temporary changes in the demand for health care. Where we expect effects on providers' costs to persist into 2024, the policy year for our recommendations, those changes are noted in each sector's payment adequacy discussion and factor into our estimates of payment adequacy.

To ensure that our recommendations accurately reflect current conditions, the Commission looks
at all available indicators of payment adequacy and reevaluates any assumptions from prior years. We use the best available data-including up-to-date estimates of inflation-and changes in payment policy to project margins for 2023 and make payment recommendations for 2024, accounting for anticipated changes in Medicare payments and providers' costs up to 2024. Because of standard data lags, the most recent complete data we have are generally from 2021. Where possible, we have bolstered our analyses with data from 2022, including interim claims data, information on facility closures, and beneficiary survey data.

In considering updates to payment rates, we may make recommendations that redistribute payments within a payment system to correct any biases that may make treating patients with certain conditions financially undesirable, make certain procedures unusually profitable, or otherwise result in access issues for beneficiaries or inequity among providers. We may also recommend changes to improve program integrity. Our goal is to apply consistent criteria across settings, but because conditions at baseline and anticipated changes between baseline and the policy year may vary, the recommended updates may vary across sectors.

The Commission also examines payment rates for services that can be provided in multiple settings. Medicare often pays different amounts for similar services across settings. Basing the payment for services that lead to similar health outcomes on the rate in the lowest-cost setting would in many cases save money for Medicare, reduce cost sharing for beneficiaries, and reduce the financial incentive to provide services in the higher-paid setting. However, aligning FFS payment rates across settings is not a simple matter. The definitions of services provided and characteristics of beneficiaries served in the different settings must be sufficiently similar to warrant the same payment, and we must try to anticipate unintended consequences.

Our recommendations in this report, if adopted, could significantly change the revenues providers receive from Medicare. Payment rates set to cover the costs of relatively efficient providers-that is, those with lower costs and higher quality-help induce all providers to control their costs and improve quality, thereby helping the Medicare program get more value for its spending. Furthermore, Medicare rates have broader implications
for health care spending because they are used in setting payments for other government programs and private health insurance. Thus, while setting prices intended to support efficient provision of care directly benefits the Medicare program, it can also help control health care spending across payers.

## Hospital inpatient and outpatient services

General acute care hospitals (ACHs) primarily provide inpatient care and various outpatient services. To pay these hospitals for their facility costs, FFS Medicare generally sets prospective payment rates under the inpatient prospective payment systems (IPPS) and the outpatient prospective payment system (OPPS). In 2021, the FFS Medicare program and its beneficiaries paid general ACHs $\$ 182.5$ billion for inpatient and outpatient services under the IPPS and OPPS, including $\$ 8.3$ billion in uncompensated care payments made under the IPPS.

As described in Chapter 3, in 2021, most indicators of hospital payment adequacy remained positive or improved. However, indicators continued to vary substantially across hospitals, and some indicators remained below prepandemic levels. In 2022, input cost increases for hospitals were higher and more volatile than they have been in recent years.

Beneficiaries' access to care-In 2021 and 2022, the number of general ACHs that closed was the same as the number that opened, hospitals continued to have excess capacity in aggregate, and those with excess capacity continued to have a financial incentive to serve FFS Medicare beneficiaries. However, some hospitals faced occupancy and staffing constraints at times. In 2021, IPPS hospitals' marginal profit on IPPS and OPPS services (a measure of whether providers have a financial incentive to expand the number of Medicare beneficiaries they serve) was about 8 percent, which is similar to prepandemic levels.

Quality of care-In 2021, FFS beneficiaries' riskadjusted hospital readmission rate improved relative to 2019. However, the risk-adjusted hospital mortality rate remained higher than in 2019, and most patient experience measures declined.

Providers' access to capital-In 2021, IPPS hospitals' all-payer operating margin reached a record high of 8.7 percent. However, there was substantial variation
in margins across hospitals. Preliminary 2022 allpayer operating margin data were mixed relative to prepandemic levels.

Medicare payments and providers' costs-In 2021, Medicare's payments to hospitals continued to be below hospitals' costs in aggregate but near costs among relatively efficient hospitals and higher than in 2020. IPPS hospitals' Medicare margin increased in 2021 to -6.2 percent when including a share of federal relief funds ( -8.3 percent exclusive of these funds), and the median Medicare margin for relatively efficient hospitals increased to 1 percent (near break-even exclusive of federal relief funds). However, we project that hospitals' Medicare margins in 2023 will be lower than in 2021, driven in part by growth in hospitals' input costs, which exceeded the forecasts CMS used to set Medicare payment rate updates, and in part by the expected expiration of federal relief funds and temporary Medicare payment increases related to the PHE. These federal relief funds and Medicare payment increases exceeded hospitals' additional costs related to COVID-19. We anticipate that reductions in net revenue will be partially offset by other factors, including (1) reductions in hospitals' costs related to COVID-19 as cases decline and hospitals become better at managing cases and (2) the statutory 0.5 percent increase to inpatient operating payments to remove prior temporary reductions for past documentation and coding changes. We estimate that IPPS hospitals' Medicare margin will decrease in 2023 to about -10 percent (similar to the level in 2017) and that the median Medicare margin for relatively efficient hospitals will decrease to modestly below break-evensimilar to prepandemic levels.

Update recommendation-The current-law updates to payment rates for 2024 will not be finalized until summer 2023, but CMS's third-quarter 2022 forecasts would result in the IPPS operating base payment rate and OPPS base rate increasing by 2.9 percent and the IPPS capital base payment rate increasing by 2.4 percent. The Commission anticipates that a fiscal year 2024 update to hospital payment rates of current law plus 1 percent would generally be adequate to maintain FFS beneficiaries' access to hospital inpatient and outpatient care and keep IPPS and OPPS payment rates close to the cost of delivering highquality care efficiently. The Commission's payment update recommendation for 2024 reflects the most
recent inflation and other data from 2021, preliminary data from 2022, and projections for 2023. If current projections of input inflation and hospital costs turn out to be inaccurate, these discrepancies will be accounted for in our assessment of payment adequacy in our next recommendation cycle.

## Recommendation on supporting Medicare safety-net

 hospitals-The recommended update to IPPS and OPPS payment rates of current law plus 1 percent may not be sufficient to ensure the financial viability of some Medicare safety-net hospitals with a poor payer mix. As the Medicare program strives to ensure access to care for all beneficiaries and adequately pay providers for that access, additional Medicare payments to Medicare safety-net providers are warranted. Medicare already provides substantial safety-net funding to hospitals, but there are several problems with the way Medicare distributes these funds, including omitting a hospital's Medicare share from its funding formulas in favor of subsidizing Medicaid payments, making supplemental payments only for inpatient services, and having an uncompensated care payment formula that favors hospitals with few FFS Medicare patients. The Commission's view is that Medicare safetynet payments should be used primarily to support Medicare safety-net hospitals-those that provide care to large shares of low-income Medicare beneficiaries. We note that this definition of "safety-net hospital" is Medicare-centric by design; safety-net definitions used by Medicaid and other payers would likely differ.In Chapter 3, the Commission recommends redistributing the current Medicare safetynet payments (disproportionate share hospital and uncompensated care payments) using the Commission-developed Medicare Safety-Net Index (MSNI) for hospitals. Implementation of this index would better target scarce Medicare resources to support hospitals that are key sources of care for lowincome Medicare beneficiaries and may be at risk of closure. In addition, the Commission recommends adding $\$ 2$ billion to this MSNI pool of funds to help maintain the financial viability of Medicare safety-net hospitals. The FFS portion of the MSNI pool of funds should be distributed to hospitals as add-on payments to Medicare's IPPS and OPPS payments, with commensurate add-on amounts made to hospitals treating Medicare Advantage enrollees.

While most hospitals will see increases in Medicare revenue due to the $\$ 2$ billion in additional safetynet spending, there are some hospitals that will see reductions. Material reductions in Medicare revenue could occur for hospitals that currently receive high Medicare uncompensated care payments but serve relatively few FFS Medicare patients. In light of these effects, the Congress could phase in the MSNI policy for all hospitals over a set period of time (i.e., transition to the MSNI policy over three to five years). Alternatively, a transition could be managed through a stop-loss policy so that no hospital would experience changes (positive or negative) in Medicare payments due to the MSNI of more than 5 percent in any one year. Both approaches would also allow time for the hospitals facing the most substantial revenue reductions to try to augment revenues from existing sources and request additional financial support from state and local governments, as warranted. To the extent that these hospitals have high cost structures, a transition would allow time to improve efficiencies.

## Physician and other health professional services

Medicare's physician fee schedule pays for about 8,000 different types of medical services-ranging from office visits to surgical procedures, imaging, and tests-that are delivered in physician offices, hospitals, nursing homes, and other settings. The clinicians who are paid to deliver these services include not only physicians, nurse practitioners, and physician assistants but also podiatrists, physical therapists, psychologists, and other types of health professionals. In 2021, the Medicare program and its beneficiaries paid $\$ 92.8$ billion for services provided by almost 1.3 million clinicians, accounting for just under 18 percent of FFS spending.

As described in Chapter 4, in 2021 and 2022, most physician payment adequacy indicators remained positive or improved, but clinicians' input costs grew at rates not seen for many years.

Beneficiaries' access to care-In the 2022 fielding of the Commission's annual survey, Medicare beneficiaries continued to report access to clinician services that was equal to, or better than, that of privately insured people. Other national surveys and our annual focus groups with beneficiaries also suggest that beneficiaries have relatively good access to care.

Surveys indicate that the share of clinicians accepting Medicare is comparable to the share accepting private insurance, despite private health insurers paying higher rates. Almost all clinicians who bill Medicare accept physician fee schedule amounts as payment in full and do not seek to obtain higher payments from patients. The supply of most types of clinicians has been growing in recent years, although the composition of the clinician workforce continues to change, with a rapid increase in the number of advanced practice registered nurses and physician assistants, steady increase in the number of specialists, and a slow decline in the number of primary care physicians. These changes have coincided with our annual survey finding that both Medicare beneficiaries and privately insured people report more problems obtaining a new primary care provider than a new specialist. Despite the growth in the overall number of clinicians, the number of clinicians per Medicare beneficiary (including those in FFS Medicare and Medicare Advantage) has remained steady due to beneficiary enrollment growth. The overall number of beneficiary encounters with clinicians increased in 2021 but did not return to prepandemic levels.

Quality of care-In 2021, the coronavirus pandemic compounded difficulties assessing the quality of care provided by clinicians. While we report 2021 rates of ambulatory care-sensitive hospitalizations and emergency department visits and 2021 patient experience data, we have not used these results to assess the quality of care provided to Medicare beneficiaries.

Medicare payments and providers' costs-In 2021, total spending by the Medicare program and beneficiaries on clinician services was $\$ 8.1$ billion higher than it was in 2020 but $\$ 4.4$ billion lower than in 2019. In 2021, per beneficiary spending on evaluation and management (E\&M) services and on treatments was higher than it was in 2019, while spending on tests, imaging, procedures, and anesthesia was lower. The increase in E\&M spending primarily reflects large increases to the payment rates for certain E\&M services that were implemented in 2021, while changes in other service categories were driven by a combination of smaller changes in payment rates and reductions in service volume.

In 2021, payment rates paid by preferred provider organization health plans for clinician services were

134 percent of FFS Medicare's payment rates, down from 138 percent in 2020. Between 2017 and 2021, physicians' median all-payer compensation grew by an average of 3 percent per year. However, compensation remained much lower for primary care physicians than for most specialists-underscoring our longstanding concerns about the mispricing of physician fee schedule services and its impact on the number of physicians choosing to practice primary care.

Clinicians' input costs-as measured by the Medicare Economic Index (MEI)-grew by 2.6 percent in 2021 and are estimated to have grown by 4.7 percent in 2022, substantially higher than the recent historical norm of 1 percent to 2 percent growth per year. Growth in clinicians' input costs is projected to remain high in 2023 ( 3.9 percent) and 2024 ( 2.9 percent), though these projections are subject to change.

Update recommendation-Given the recent growth in inflation, cost increases could be difficult for clinicians to absorb. However, on the basis of our indicators, current payments to clinicians appear adequate. The Commission recommends that for calendar year 2024, the Congress update the 2023 Medicare base payment rate for physician and other health professional services by 50 percent of the projected increase in the MEI. Because clinicians' practice expenses account for about half of the MEI, this recommendation would help ensure that payment rates keep pace with the growth of clinicians' practice costs. Based on CMS's MEI projections at the time of publication, the recommended update for 2024 would be equivalent to 1.45 percent.

## Recommendation on supporting Medicare safety-

 net clinicians-To promote adequate access to care for all Medicare beneficiaries, the Commission has determined that providing additional financial support for clinicians who furnish care to Medicare beneficiaries with low incomes is warranted. Clinicians often receive less revenue when treating low-income beneficiaries because of the way Medicare's costsharing policies interact with state Medicaid payment policies, which likely makes beneficiaries with low incomes less profitable to care for and could put some clinicians at financial risk. At the same time, low-income beneficiaries report having more difficulty accessing needed care than other beneficiaries. The Commission recommends that Medicare make targeted add-onpayments of 15 percent to primary care clinicians and 5 percent to all other clinicians for physician fee schedule services provided to Medicare beneficiaries enrolled in the Part D low-income subsidy program.

## Ambulatory surgical center services: Status report

Ambulatory surgical centers (ASCs) provide outpatient procedures to patients who do not require an overnight stay. As described in Chapter 5's status report, in 2021, the 6,075 ASCs certified by Medicare treated 3.3 million FFS Medicare beneficiaries. Medicare program and beneficiary spending on ASC services was about $\$ 5.7$ billion.

The supply of ASCs and volume of services continued to grow in 2021. The number of ASCs grew 2.7 percent, and the volume of ASC surgical procedures per FFS beneficiary-after dropping substantially in 2020climbed to above prepandemic levels. Numerous factors likely have contributed to this sector's growth, including changes in clinical practice and health care technology that have expanded the provision of surgical procedures in ambulatory settings. The most common service in ASCs, accounting for almost 19 percent of volume in 2021, was extracapsular cataract removal with intraocular lens insertion.

Most ASCs are for profit, and geographic distribution is uneven, with the vast majority located in urban areas and the concentration of ASCs varying widely across states. About 65 percent of ASCs that billed Medicare in 2021 specialized in a single clinical area, of which gastroenterology and ophthalmology were the most common. The remainder were multispecialty facilities, providing services in more than one clinical specialty. From 2016 to 2021, the ASC specialty that grew most rapidly was pain management.

Medicare spending per FFS beneficiary on ASC services rose at an average annual rate of 7.7 percent from 2016 through 2019 and at an average annual rate of 8.7 percent from 2019 to 2021. However, policymakers know little about the costs ASCs incur in treating beneficiaries because Medicare does not require ASCs to submit cost data, unlike its cost data requirements for other types of facilities. The Commission contends that ASCs could feasibly provide such information, and we have recommended since 2010 that the Congress require them to submit cost data.

## Outpatient dialysis services

Outpatient dialysis services are used to treat the majority of individuals with end-stage renal disease (ESRD). In 2021, nearly 332,000 beneficiaries with ESRD on dialysis were covered under FFS Medicare and received dialysis from more than 7,800 dialysis facilities. In 2021, Medicare expenditures for outpatient dialysis services totaled $\$ 10.0$ billion.

As described in Chapter 6, measures of the capacity and supply of outpatient dialysis providers, beneficiaries' ability to obtain care, and changes in the volume of services suggest that Medicare payments are adequate.

Beneficiaries' access to care-Dialysis facilities appear to have the capacity to meet demand. Between 2020 and 2021, the number of in-center treatment stations grew faster than the number of FFS and Medicare Advantage (MA) dialysis beneficiaries. A steep ( 20 percent) decline in FFS treatments in 2021 is largely due to the removal of the statutory provision that prevented most dialysis beneficiaries from enrolling in MA plans. Between January 2020 and December 2021, the share of dialysis beneficiaries enrolled in MA plans increased from 25 percent to roughly 40 percent. The effects of the pandemic's excess mortality also contributed to the decline in FFS treatments in 2021. An estimated 20 percent marginal profit in 2021 suggests that dialysis providers have a financial incentive to continue to serve Medicare beneficiaries.

Quality of care-FFS dialysis beneficiaries' rates of all-cause hospitalization and mortality increased somewhat between 2020 and 2021, while emergency department use remained steady. The share of beneficiaries dialyzing at home, which is associated with better patient satisfaction, continued to grow.

## Providers' access to capital-Information from

 investment analysts suggests that access to capital for dialysis providers continues to be strong. The number of facilities, particularly for-profit facilities, continues to increase. The two largest dialysis organizations have grown through acquisitions of and mergers with midsize dialysis organizations.Medicare payments and providers' costs-Medicare payment per treatment in freestanding dialysis facilities (which provide the vast majority of FFS dialysis treatments) grew by 0.9 percent while cost
per treatment rose by 1.3 percent. Growth in costs was seen across all cost categories, with the exception of ESRD drugs. The aggregate Medicare margin fell from 2.7 percent in 2020 to 2.3 percent in 2021. (The aggregate margin in 2021 was 2.7 percent including provider-relief pandemic revenues.) We project that the 2023 aggregate Medicare margin will drop to -0.4 percent due to cost growth that we expect will exceed payment updates.

Recommendation-Under current law, the Medicare FFS base payment rate for dialysis services is projected to increase by 1.8 percent in 2024. Given that most of our indicators of payment adequacy are positive, the Commission recommends that, for 2024, the Congress update the calendar year 2023 ESRD PPS base rate by the amount determined under current law.

## Skilled nursing facility services

Medicare covers short-term skilled nursing and rehabilitation services for beneficiaries in skilled nursing facilities (SNFs) after an inpatient hospital stay. In 2021, about 14,700 SNFs furnished about 1.7 million Medicarecovered stays to 1.2 million FFS beneficiaries ( 3.4 percent of Medicare's FFS beneficiaries). In that year, Medicare FFS spending on SNF services was $\$ 28.5$ billion. Most SNFs are also certified as nursing homes, which furnish long-term care services not covered by Medicare.

In Chapter 7, we examine the adequacy of Medicare's SNF payments. The COVID-19 pandemic has had devastating effects on nursing facility residents and staff. However, owing to federal policies supporting SNFs during the coronavirus PHE and the implementation of Medicare's new case-mix system, SNFs' aggregate financial performance under Medicare was robust in 2021, despite occupancy that has been slow to rebound and ongoing staffing pressures.

Beneficiaries' access to care-Changes in the indicators of access in 2021 were mixed and reflect the impact of the coronavirus pandemic, not the adequacy of Medicare's payments. In 2021, 88 percent of beneficiaries lived in a county with three or more SNFs or swing bed facilities (rural hospitals with beds that can serve as either SNF beds or acute care beds), and nationwide, occupancy rates remain below prepandemic levels, indicating bed availability. However, staffing shortages may constrain capacity for some facilities. Continued waiver of coverage rules
during the PHE tempered the reductions in Medicare volume that began in March 2020. Nevertheless, between 2020 and 2021, Medicare-covered admissions per 1,000 FFS beneficiaries dropped 2.4 percent, while covered days per 1,000 FFS beneficiaries fell 3.7 percent as length of stay declined. Slow-to-return demand for SNF care is likely due, at least in part, to pandemicrelated factors, including continued avoidance of the setting and mortality due to COVID-19 among the aged and disabled populations that would otherwise be receiving care in a nursing facility. Decreased volume was also due to the impact of the coronavirus pandemic, not the adequacy of Medicare payments. FFS Medicare remains a preferred payer for SNFs. In 2021, Medicare marginal profit (an indicator of whether SNFs have an incentive to treat more Medicare beneficiaries) averaged 26 percent for freestanding facilities. This profit is a strong positive indicator of beneficiary access to SNF care, though factors other than the level of payment (such as bed availability or staffing shortages) could challenge access.

Quality of care-In 2021, the mean facility risk-adjusted rate of successful discharge to the community from SNFs was 43.5 percent, and the mean facility riskadjusted rate of hospitalizations was 13.1 percent. The pandemic and PHE-related policies confound our measurement and assessment of trends in our quality measures.

Providers' access to capital-The number of nursing facility transactions in 2021 was lower than it was before the coronavirus pandemic, reflecting a lack of sellers rather than a lack of investor interest. In 2021, the average price per bed increased to a near record level. In 2021, the all-payer total margin-reflecting all payers (including managed care, Medicaid, Medicare, and private insurers) and all lines of business (such as skilled and long-term care, hospice, ancillary services, home health care, and investment income)-was 3.4 percent, which was higher than recent prepandemic averages. The all-payer margin increased during the coronavirus pandemic because of funding that nursing homes received during the PHE and changes in Medicare and Medicaid payments. Without pandemicrelated funds, the all-payer margin was -1.5 percent.

Medicare payments and providers' costs-Between 2020 and 2021, Medicare's aggregate FFS spending on SNF services increased 0.5 percent to $\$ 28.5$ billion, despite
fewer covered SNF days. Payments per day increased over 3 percent, while costs per day grew 4 percent. The Medicare margin for freestanding SNFs was 17.2 percent in 2021. Margins varied greatly across facilities, reflecting differences in costs per day, economies of scale, and cost growth. The 2021 Medicare margin for relatively efficient SNFs was 22 percent. We project an aggregate Medicare margin of 10 percent for 2023.

Recommendation-While the effects of the pandemic on beneficiaries and nursing home staff have been devastating, the combination of federal policies and the implementation of the new case-mix system resulted in improved financial performance for SNFs. Medicare's payments need to be reduced to more closely align aggregate payments with aggregate costs. The Commission recommends that, for fiscal year 2024, the Congress reduce the 2023 Medicare base payment rates for skilled nursing facilities by 3 percent.

## Home health care services

Home health agencies (HHAs) provide services to beneficiaries who are homebound and need skilled nursing care or therapy. In 2021, about 3.0 million Medicare FFS beneficiaries received care, and the program spent $\$ 16.9$ billion on home health care services. In that year, 11,474 HHAs participated in Medicare.

As described in Chapter 8, the indicators of Medicare payment adequacy for home health care are generally positive.

Beneficiaries' access to care-Access to home health care was adequate in 2021: Over 98 percent of Medicare beneficiaries lived in a ZIP code served by at least two HHAs. Between 2020 and 2021, the number of HHAs fell by 0.8 percent, continuing a slow decline that began in 2013, but at a lower rate than in prior years. This slower decline suggests that neither the coronavirus pandemic nor the major revisions to the home health PPS implemented in 2020 had a significant impact on HHA supply. In 2021, the number of FFS beneficiaries receiving home health care fell by 1.1 percent, and the number of 30 -day periods declined by 2.9 percent. However, the overall number of beneficiaries enrolled in FFS also declined as more beneficiaries enrolled in Medicare Advantage. As a result, the number of 30-day periods per 100 FFS beneficiaries increased by almost

1 percent in 2021, and the share of FFS beneficiaries using home health care increased to 8.3 percent. The average number of in-person visits per 30-day period declined (by 4.7 percent), but some of the decline could have been offset by greater use of virtual visits through telehealth. In 2021, freestanding HHAs' marginal profit-that is, the rate at which Medicare payments exceed providers' marginal costs-was 26 percent, suggesting a significant financial incentive for freestanding HHAs with excess capacity to serve additional Medicare patients.

Quality of care-In 2021, the mean agency risk-adjusted rate of successful discharge to the community from HHAs was 52.2 percent, and the mean agency riskadjusted rate of hospitalizations was 18.2 percent. The coronavirus pandemic and policies related to the PHE confound our assessment of trends in both quality measures. Further complicating assessment, the home health payment system now uses a shortened unit of payment (a 30-day unit rather than 60 days), which changes the period used in the postdischarge hospitalization measure.

Providers' access to capital-Access to capital is a less important indicator of Medicare payment adequacy for home health care because this sector is less capital intensive than other health care sectors. The major publicly traded for-profit home health companies had sufficient access to capital markets for their credit needs.

Medicare payments and providers' costs-In 2021, home health agencies' average cost per 30-day period decreased by 2.9 percent, in part reflecting a decline in the number of visits per 30-day period. As the number of visits per period declined, Medicare's payment per in-person visit increased by 17.7 percent. Medicare margins for freestanding agencies averaged 24.9 percent in 2021-a historic high-up from 20.2 percent in 2020 and 15.4 percent in 2019. These high margins indicate that the increase in payments in 2021 far exceeded the increase in costs. In aggregate, Medicare's payments have always been substantially more than costs under prospective payment: From 2001 to 2019, the Medicare margin for freestanding HHAs averaged 16.4 percent. The projected margin for 2023 is 17.0 percent, reflecting both a statutory reduction to the base payment rate of 3.5 percent in 2023 (required to maintain budget neutrality following recent changes to the home health payment system) and expected cost
growth indicated by the Medicare home health market basket. However, this rate of inflation is high relative to past experience, so margins in 2023 could be higher.

Recommendation-Our review of payment adequacy for Medicare home health services indicates that access is more than adequate in most areas. Home health care can be a high-value benefit when it is appropriately and efficiently delivered. Medicare beneficiaries often prefer to receive care at home instead of in institutional settings, and home health care can be provided at lower costs than institutional care. However, Medicare's payments for home health services are too high, and these excess payments diminish the service's value as a substitute for more costly services. On the basis of these findings, the Commission recommends that, for calendar year 2024, the Congress should reduce the 2023 base rate by 7 percent.

## Inpatient rehabilitation facility services

Inpatient rehabilitation facilities (IRFs) provide intensive rehabilitation services to patients after illness, injury, or surgery. Rehabilitation programs are supervised by rehabilitation physicians and include services such as physical and occupational therapy, rehabilitation nursing, speech-language pathology, and prosthetic and orthotic services. In 2021, Medicare spent $\$ 8.5$ billion on 379,000 FFS IRF stays in about 1,180 IRFs nationwide.

As described in Chapter 9, most IRF payment adequacy indicators remained positive or improved.

Beneficiaries' access to care-Between 2020 and 2021, the number of IRFs and IRF beds slightly increased. The aggregate IRF occupancy rate was 68 percent, indicating that capacity is more than adequate to meet demand. From 2020 to 2021, Medicare cases per 10,000 FFS beneficiaries increased by about 4 percent. Marginal profit, an indicator of whether IRFs with excess capacity have an incentive to treat more Medicare beneficiaries, was 22 percent for hospitalbased IRFs and 41 percent for freestanding IRFs-a very strong indicator of access.

Quality of care-In 2021, the mean facility risk-adjusted rate of successful discharge to the community from IRFs was 67.6 percent and the mean facility riskadjusted rate of hospitalizations was 7.2 percent. The coronavirus pandemic and related policies confound
our measurement and assessment of trends in our quality measures.

Providers' access to capital-Between 2020 and 2021, freestanding IRFs' all-payer total margin grew from 10.2 percent to 14.0 percent, and the largest IRF chain (which accounted for almost a third of all Medicare FFS IRF discharges) continued to open new IRFs and enter joint ventures with other organizations, suggesting strong access to capital. Hospital-based IRFs continued to have strong access to capital through their parent hospitals.

Medicare payments and providers' costs-IRFs' Medicare margin increased to 17.0 percent in 2021, driven by slow cost growth. The Medicare margin for relatively efficient IRFs was even higher, at about 20 percent, as these IRFs were generally able to leverage greater economies of scale. We anticipate that the 2023 margin will decrease to 11 percent, driven in part by the expiration of PHE-related increases in Medicare payments to IRFs.

Recommendation-Given our positive payment adequacy indicators, the Commission recommends that, for fiscal year 2024, the 2023 IRF base payment rate be reduced by 3 percent. This recommendation would continue to provide IRFs with sufficient revenues to maintain beneficiaries' access to IRF care while bringing IRF PPS payment rates closer to the cost of delivering high-quality care efficiently.

## Hospice services

The Medicare hospice benefit covers palliative and support services for beneficiaries who are terminally ill with a life expectancy of six months or less if the illness runs its normal course. When beneficiaries elect to enroll in the Medicare hospice benefit, they agree to forgo Medicare coverage for conventional treatment of their terminal illness and related conditions. In 2021, more than 1.7 million Medicare beneficiaries (including almost half of decedents) received hospice services from 5,358 providers, and Medicare hospice expenditures totaled $\$ 23.1$ billion.

As described in Chapter 10, the indicators of Medicare payment adequacy for hospice services are generally positive.

Beneficiaries' access to care-In 2021, some measures of volume were stable while others declined. The declining measures appear to stem from the effects of changing
death rates and patterns of care due to the coronavirus pandemic and are not a reflection of Medicare payment adequacy. In 2021, the number of hospice providers increased by about 6 percent as more for-profit hospices entered the market, a trend that has extended for more than a decade. Total deaths among Medicare beneficiaries increased sharply in 2020 and declined just 0.1 percent in 2021, while the number of Medicare decedents who used hospice declined 1.3 percent. The overall share of Medicare decedents using hospice services decreased slightly to 47.3 percent, but patterns of hospice use among decedents varied by beneficiary characteristics and grew among some groups. Among all beneficiaries (not limited to decedents), the number of beneficiaries who received hospice services and the number of hospice days furnished was stable. For decedents, average lifetime length of stay fell by almost 5 days in 2021 to 92.1 days, similar to the prepandemic level. Between 2020 and 2021, median length of stay declined slightly, from 18 days to 17 days. In 2020, Medicare payments to hospice providers exceeded marginal costs by 18 percent. This rate of marginal profit suggests that providers have a strong incentive to treat Medicare patients and is a positive indicator of patient access.

Quality of care-Quality of care in 2021 is difficult to assess. While we report the most recent data from hospice patient experience and process measures, we have not used those results to inform our conclusions about trends in the quality of care provided to Medicare hospice beneficiaries and their relationship to Medicare payment adequacy. Scores on the Hospice Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$ were stable in the most recent period. Scores on a composite of seven processes of care at admission were generally topped out (meaning scores are so high and unvarying that meaningful distinctions and improvement in performance can no longer be made). The provision of in-person visits at the end of life was stable in 2021, after declining modestly in 2020 due to the coronavirus pandemic. CMS also launched a new claims-based quality measure, based on 10 indicators, that identifies outlier patterns of care among hospice providers.

Providers' access to capital-Hospices are not as capital intensive as other provider types because they do not require extensive physical infrastructure. Continued growth in the number of for-profit providers (an
increase of over 8 percent in 2021) and reports of strong investor interest in the sector suggest that capital is available to these providers. Less is known about access to capital for nonprofit freestanding providers, for which capital may be more limited. Hospital-based and home health-based hospices have access to capital through their parent providers.

Medicare payments and providers' costs-Hospice margins are presented through 2020 because of the data lag required to calculate cap overpayment amounts. Between 2019 and 2020, average cost per day increased just 1.1 percent, which helped boost the 2020 Medicare aggregate margin to 14.2 percent, up from 13.4 percent in 2019. With Medicare's share of pandemic-related relief funds included, the estimated 2020 aggregate Medicare margin rises to about 16 percent. In 2021, growth in hospice cost per day increased 4.2 percent. We project an aggregate Medicare margin for hospices of about 8 percent in 2023.

In addition to indicators of hospice payment adequacy, Chapter 10 also assesses the hospice aggregate cap. The cap limits the aggregate payments a hospice provider can receive in a year and functions as a mechanism that reduces payments to hospices with long stays and high margins. We estimate that 18.6 percent of hospices exceeded the cap in 2020; the aggregate Medicare margin for these hospices was about 23 percent before and 8 percent after application of the cap.

Recommendation-Based on the generally positive indicators of payment adequacy and strong margins, the Commission concludes that a reduction in aggregate payments is warranted. However, in this sector, with the range of financial performance across hospice providers and the existence of the hospice aggregate cap, there is the potential to focus payment reductions on providers with disproportionately long stays and high margins. Therefore, the Commission recommends that the Congress wage adjust and reduce the hospice aggregate cap by 20 percent while maintaining the current-law update for fiscal year 2024. Under this recommendation, payments would increase for many hospice providers by an estimated 2.9 percent, while payments would be reduced for providers with very long lengths of stay and low costs relative to payments.

The Medicare Advantage program: Status report and mandated report on historical comparison of MA payments to FFS spending
The MA program gives Medicare beneficiaries the option of receiving benefits from private plans rather than from the FFS Medicare program. As described in Chapter 11, in 2022, the MA program included 5,261 plan options offered by 182 organizations, enrolled about 29 million beneficiaries ( 49 percent of Medicare beneficiaries with both Part A and Part B coverage), and paid MA plans $\$ 403$ billion (not including Part D drug plan payments). The Commission strongly supports the inclusion of private plans in the Medicare program. Beneficiaries should be able to choose among Medicare coverage options, as some may prefer to avoid the constraints of provider networks and utilization management by enrolling in the traditional FFS Medicare program, while others may prefer to seek the additional benefits and alternative delivery systems that private plans provide. Because Medicare pays private plans a predetermined rate-risk adjusted per enrollee-rather than a per service rate, plans should have greater incentives than FFS providers to deliver more efficient care.

The Commission remains concerned that the benefits from MA's lower cost relative to FFS spending are shared exclusively by the companies sponsoring MA plans (in the form of increased enrollment and revenues) and MA enrollees (in extra benefits). The taxpayers and FFS Medicare beneficiaries who help fund the MA program through Part B premiums do not realize any savings from MA plan efficiencies. Further, Part B premiums are higher for all beneficiaries than they otherwise would be, and Medicare spends 6 percent more for MA enrollees than it would spend if those beneficiaries were enrolled in FFS Medicare, a difference that translates into a projected \$27 billion in 2023. This amount would be even larger if the favorable selection of beneficiaries in MA plans were taken into account because beneficiaries who choose to enroll in an MA plan tend to be more profitable than beneficiaries who remain in FFS Medicare.

In 1985, payments to private plans were initially set at 95 percent of FFS payments because it was expected that plans would share savings from their efficiencies relative to FFS with taxpayers. But subsequent policies have explicitly elevated payments to MA above the

FFS equivalent and, in the aggregate, private plans have never been paid less than FFS Medicare. MA benchmarks are set above FFS in many markets in part to encourage more uniform plan participation across the country, and quality payments (which the Commission has found do not meaningfully reflect plan quality, from the perspective of enrollees or the Medicare program) further inflate MA payments above FFS. Moreover, MA plans' diagnostic coding practices inflate payments and undermine the goal of plans competing to improve quality and reduce costs. All of these factors lead to government subsidization of increasingly higher levels of extra benefits for MA enrollees. In addition, the Commission finds that the plan-submitted data about beneficiaries' health care encounters are incomplete-or, in the case of many extra benefits, nonexistent-which prevents policymakers from understanding enrollees' use of services and plan efficiencies and limits policymakers' ability to carry out program oversight.

As evidenced by rapid growth in enrollment, additional benefits (including lower plan cost sharing for basic Medicare benefits and reduced premiums for Part D coverage) are attractive to beneficiaries. Nevertheless, for many reasons, a major overhaul of MA policies is urgently needed. First, the use and value of the many supplemental benefits is unclear, and currently such benefits are well above their historical level. As a result, the Commission believes that payments can be reduced without substantial cuts to benefits (which would remain more generous than in the recent past). Second, the disparity between MA and FFS payment disadvantages beneficiaries who-due to medical reasons or personal preferences-do not want to enroll in MA plans that use tools like narrow networks or utilization management policies. Third, the payment-induced growth in MA will increasingly create challenges for setting benchmarks because beneficiaries remaining in FFS may be higher risk (and thus have higher spending) in ways that risk adjustment cannot adequately capture. Finally, because of Medicare's fiscal situation, any expansion of benefits, if desired by policymakers, should be done deliberately, with attention to their value, and in the most fiscally efficient manner. The Commission asserts that the current policy does not meet that standard. Therefore, over the past few years, the Commission has made several recommendations to improve the program. These recommendations call for the Congress and CMS
to address coding intensity, replace the quality bonus program, establish more equitable benchmarks, and improve the completeness of encounter data.

Enrollment, plan offerings, and extra benefits-
The MA program is quite robust, with growth in enrollment, increased plan offerings, and, for the seventh consecutive year, a historically high level of extra benefits. From 2018 to 2022, the share of eligible Medicare beneficiaries enrolled in MA rose by 3 percentage points per year, from 37 percent to 49 percent. It is likely that a majority of eligible Medicare beneficiaries will be enrolled in MA in 2023. In 2023, the average Medicare beneficiary has a choice of 41 plans (offered by an average of 8 organizations), and the average MA plan enrollee has access to over $\$ 2,350$ in extra benefits annually that FFS enrollees cannot access without purchasing additional health insurance coverage or paying for the services on an out-of-pocket basis. The rebate amount, which finances extra benefits, has more than doubled since 2018 and, in 2023, accounts for 17 percent of payments to MA plans. At the same time, we do not have reliable information about the extent to which beneficiaries use or value these benefits.

Medicare payments to plans-In 2023, payments to MA plans-including the impact of coding intensity but ignoring any favorable selection-average an estimated 106 percent of projected FFS spending. In addition, MA benchmarks, which represent the maximum amount Medicare will pay an MA plan to provide Part A and Part B benefits, continue to be well above projected FFS spending levels. In 2023, MA benchmarks averaged an estimated 109 percent of projected FFS spending (including quality bonuses but not accounting for MA coding), 1 percentage point above the level in 2022.

The bids that MA plans submit to CMS suggest that plans continue to capitalize on their administrative flexibility and reduce their relative growth in health care costs year over year. Nearly all plans bid below the projected cost of FFS Medicare. For 2023, the average plan bid to provide Part A and Part B benefits was 17 percent less than FFS Medicare would be projected to spend for those enrollees under current payment policies, a record low.

Risk adjustment and coding intensity-Medicare payments to MA plans are specific to each enrollee, based on a plan's payment rate and the enrollee's risk score. Risk scores account for differences in expected
medical expenditures and are based in part on diagnoses that providers code. In FFS Medicare, most claims are paid using procedure codes, which offer little incentive for providers to record more diagnosis codes than necessary to justify providing a service. In contrast, MA plans have a financial incentive to ensure that their providers record all possible diagnoses because those diagnoses raise an enrollee's risk score and result in higher payments to the plan.

Our analysis of 2021 data shows that higher diagnosis coding intensity resulted in MA risk scores that were about 10.8 percent higher than scores for similar FFS beneficiaries. By law, CMS reduces MA risk scores across the board to make them more consistent with FFS coding; CMS has the authority to impose a larger reduction than the minimum required by law but has never done so. In 2021, the adjustment reduced MA risk scores by 5.9 percent. However, we estimate that MA risk scores were still about 4.9 percent higher than they would have been if MA enrollees had been treated in FFS Medicare. In 2021, those higher scores resulted in $\$ 17$ billion in excess payments to MA plans, and we project that the amount will reach $\$ 23$ billion in 2023 (if MA coding remains the same as in 2021). We continue to find that coding intensity varies significantly across MA plans and that increasing diagnostic coding allows some plans to offer more extra benefits, thereby attracting more enrollees and undermining plan incentives to improve quality and reduce costs.

The Commission previously recommended changes to MA risk adjustment that would exclude diagnoses collected from health risk assessments (which rely on unverified enrollee-reported data), use two years of diagnostic data, and apply an adjustment to eliminate any residual impact of coding intensity. We find that nearly two-thirds of MA coding intensity could be due to use of diagnoses from chart reviews and health risk assessments, and that these two mechanisms are a primary factor driving coding differences among MA plans.

Quality in MA-The current state of quality reporting in MA is such that the Commission can no longer provide an accurate description of MA quality of care. Beneficiaries lack good information on the quality of care provided by MA plans in their local market, limiting their ability to make informed choices among plans. Further, the 49 percent of eligible Medicare
beneficiaries enrolled in MA do not know how their plan's quality compares with quality in FFS Medicare. MA and FFS quality comparisons are also necessary for policymakers to evaluate the quality of care that beneficiaries receive in all sectors. In our June 2020 report, the Commission recommended replacing the current quality bonus program, which is not achieving its intended purposes and is costly to Medicare, with a new value incentive program for MA.

The academic community has devoted growing attention to assessing MA quality and making comparisons with FFS. Notwithstanding the methodological and data issues that are present in many studies, that literature suggests that MA plans likely improve performance on some process measures. Findings are sufficiently mixed on patient experience and outcomes that the Commission cannot conclude that MA plans systematically provide better (or worse) quality compared with traditional FFS Medicare.

## Mandated report: Historical comparison shows MA payments were consistently above FFS spending

The Consolidated Appropriations Act, 2023, mandated that the Commission submit a report by March 15, 2023, that compares MA and FFS per enrollee spending for at least the last five years for which data are available. The Act requests that the Commission's analysis use the FFS spending method used to calculate MA benchmarks and compare MA payments with beneficiaries enrolled in both Part A and Part B. In Chapter 11, we use our long-standing prospective method of comparing MA payments with FFS spending from 2004 through 2023 and supplement this analysis with a retrospective method using the available data on actual MA payments and FFS spending (both claims and nonclaims payments) from 2016 through 2019. Our prospective and retrospective methods yielded very similar results: Both found that MA payments were higher than FFS spending from 2016 through 2019. We note, however, that the retrospective and prospective methods likely would not yield similar results when estimating MA payments and FFS spending for 2020 because CMS's projection of FFS spending and MA bid and risk score projections were overestimated during the first year of the coronavirus pandemic. We will continue to update our retrospective comparison of MA payments relative to FFS spending as more recent data become available.

## The Medicare prescription drug program (Part D): Status report

As described in Chapter 12, in 2022, Part D paid for outpatient drug coverage on behalf of nearly 50 million Medicare beneficiaries. For Part D plan enrollees, Medicare subsidizes about three-quarters of the cost of basic benefits. Part D also includes a low-income subsidy (LIS) that provides assistance with premiums and cost sharing for more than 13 million individuals with low income and assets.

In 2021, Part D program expenditures totaled $\$ 110.8$ billion, accounting for about 13 percent of Medicare spending. Of that amount, enrollees paid $\$ 14.9$ billion in premiums for basic benefits. Medicare spending for the LIS totaled $\$ 35.1$ billion: $\$ 31.3$ billion for cost sharing and $\$ 3.8$ billion for premiums. Beyond program spending, Part D plan enrollees paid $\$ 17.9$ billion in cost sharing and $\$ 7.5$ billion in premiums for enhanced benefits.

Since its inception in 2006, Part D has changed in important ways. Part D enrollees have greatly expanded their use of generics, while a relatively small share of prescriptions for high-cost biologics and specialty medications account for a mounting share of spending. A growing share of Medicare's payments have taken the form of cost-based reimbursements to plans through Medicare's reinsurance. As a result, the financial risk that plans bear, as well as their incentives to control costs, has declined markedly. In 2020, the Commission recommended major changes to the Part D benefit design and Medicare's subsidies in order to restore the role of risk-based, capitated payments that was present at the start of the program. In 2022, the Congress passed the Inflation Reduction Act (IRA), which included numerous policies related to prescription drugs; one such provision is a redesign of the Part D benefit with many similarities to the Commission's recommended changes. The changes adopted in the IRA will be implemented over the next several years and are likely to alter the drug-pricing landscape.

About 300 organizations operate Part D plans, but most beneficiaries are enrolled in plans sponsored by a handful of large health insurers. Most of the largest sponsors have their own pharmacy benefit managers (PBMs) that operate mail-order and specialty pharmacies. Formularies (a plan's list of covered drugs) remain plan sponsors' most important
tool for managing drug benefits. In Part D, plans and their PBMs reduce benefit costs with postsale rebates and discounts. Generally, pharmaceutical manufacturers pay larger rebates to a sponsor when the sponsor positions a drug on its formulary in a way that increases the likelihood of winning market share over competing drugs. Plan sponsors also use provisions in network contracts with pharmacies that require postsale recoupments or payments for meeting performance metrics. These rebates and pharmacy fees have grown as a share of Part D spending. Going forward, changes in CMS's program rules and changes resulting from the IRA may affect the magnitude of rebates and pharmacy fees.

## Enrollment in 2022 and benefit offerings for 2023-

 In 2022, 77 percent of Medicare beneficiaries were enrolled in Part D plans. An additional 2 percent obtained drug coverage through employer-sponsored plans that received Medicare's retiree drug subsidy. We estimate that among the remaining beneficiaries, just under 10 percent had creditable drug coverage from other sources and less than 12 percent had no coverage or coverage less generous than Part D.Enrollment in stand-alone prescription drug plans (PDPs) peaked in 2019 at 25.5 million ( 56 percent of total plan enrollment) but fell to 23.3 million in 2022 (47 percent). Enrollment in Medicare AdvantagePrescription Drug plans (MA-PDs) surpassed enrollment in PDPs for the first time in 2021 and reached 26.5 million in 2022. In 2022, LLS enrollees made up 27 percent of total enrollment compared with 28 percent in 2018.

For 2023, beneficiaries continue to have a broad choice of plans. Plan sponsors offered 3,539 general MA-PDs and 1,254 MA-PDs tailored to specific populations (special needs plans) -5 percent and 11 percent more, respectively, than in 2022. In 2023, plan sponsors are offering 804 PDPs, nearly 5 percent more than the previous year.

For 2023, the base beneficiary premium declined by 2 percent from 2022 to $\$ 32.74$, reflecting a small decrease in the total average estimated cost for basic benefits after taking postsale rebates and discounts into account. However, individual plans' premiums vary substantially, with PDPs typically having higher premiums than MA-PDs. In 2023, 191 PDPs, roughly
one-quarter of all PDPs, are available premium free to enrollees who receive the LIS, and all regions have at least three premium-free PDPs for LIS enrollees. Most Part D plans use a five-tier formulary with differential cost sharing between preferred and nonpreferred drugs, as well as a specialty tier for high-cost drugs. For 2023, nearly half of all plans had intended to participate in the Senior Savings Model that covers certain insulins at no more than $\$ 35$ for each prescription of a month's supply. Subsequently, the IRA-passed after plan bids for 2023 had already been submitted-required all Part D plans to provide such a benefit for covered insulin products in 2023.

Part D program spending-In 2021, Medicare program spending on Part D (excluding the $\$ 14.9$ billion in premiums paid by enrollees) totaled $\$ 95.9$ billion, up from $\$ 93.0$ billion in 2020 (an increase of 3 percent). Enrollees whose spending reaches the benefit's catastrophic phase increasingly drive program spending. Medicare's reinsurance (which covers 80 percent of spending in the catastrophic phase of the benefit after rebates) continued to be the largest and fastest-growing component of program spending, totaling $\$ 52.4$ billion, or about 55 percent of the total. The value of the average basic benefit that is paid to plans through the capitated direct subsidy has plummeted in recent years. In 2023, direct subsidy payments average less than $\$ 2$ per member per month, compared with payments of nearly $\$ 94$ per member per month for reinsurance.

Growth in drug prices-In 2021, growth in drug prices accelerated, approaching rates observed before the pandemic. Prices of generic drugs declined, which helped moderate overall price growth. However, generics' share of prescriptions has plateaued at about 90 percent since 2017, and further opportunities for generic substitution may be limited, given the shift in the drug development pipeline toward biologics with longer periods of market exclusivity. Inflation in prices for brand-name drugs and biologics will likely continue to drive spending upward unless the program can achieve meaningful savings from the successful launch of biosimilars and their adoption by prescribers and beneficiaries. In 2021, about 464,000 enrollees filled a prescription that, by itself, was sufficiently expensive to meet the out-of-pocket threshold, up from just 33,000 enrollees in 2010.

Beneficiary access and quality in Part D-According to the 2020 Medicare Current Beneficiary Survey, which is the latest available, 79 percent of Part D enrollees reported overall satisfaction with the program. While satisfaction was quite high regarding the amount paid for drugs, coverage, and participating pharmacies, beneficiaries were less satisfied with their ability to understand the program and the information they received, and 27 percent were not confident their coverage met their needs. Overall, 25 percent of enrollees reported problems with affordability, including 14 percent who did not take their medicine as prescribed because of cost. Although it has long been believed that premiums are paramount among the factors beneficiaries consider when choosing their plan, in 2020, more beneficiaries ( 30 percent) reported considering their out-of-pocket costs than premiums (26 percent).

The quality of prescription drug care requires a balance between beneficiary access and medication management. For many conditions, effective treatment may hinge primarily on access and adherence to prescription medicines. For this reason, Medicare evaluates Part D plan formularies and network pharmacies. However, one concern is that among beneficiaries without the LIS, high cost sharing for expensive therapies can be a barrier to access. At the same time, Medicare beneficiaries take an average of nearly five prescription drugs and are at higher risk for adverse drug events associated with polypharmacy. Thus, it is also critically important that Part D plans help to manage medication therapies.

By law, Part D plans are required to carry out medication therapy management (MTM) programs and programs to manage opioid use. Between 2017 and 2021, CMS tested an Enhanced MTM model to see if new payment incentives and regulatory flexibilities would spur PDPs to improve their MTM interventions and reduce Medicare spending. Although an evaluation of the entire five-year demonstration is not yet complete, over the first four years, CMS found no significant reductions in Medicare spending for Part A and Part B services, a net increase in Medicare spending after accounting for model payments, and mixed effects on quality measures.

> CHAPTER

## Context for Medicare payment policy

C H A P T ER

## Context for Medicare payment policy

## Chapter summary

Medicare is the single largest health insurer in the U.S., covering one in five Americans. As such, the Medicare program has great influence on the health care sector: It covers a substantial share of many health care providers' patients and influences the payment policies of other payers. Yet external forces in the environment can also have a substantial impact on the Medicare program, as seen most recently with the coronavirus pandemic.

Coronavirus disease 2019 (COVID-19) has had a disproportionate effect on Medicare beneficiaries. Individuals ages 65 and older have made up only 13 percent of reported COVID-19 cases but have constituted 75 percent of COVID-19 deaths. The risk of severe illness and death has been especially high for Medicare beneficiaries with disabilities and those with end-stage renal disease, who are one-and-a-half times and six times, respectively, more likely to be hospitalized for COVID-19 than beneficiaries who qualify for Medicare due to age alone. The coronavirus pandemic also has prompted many Medicare beneficiaries to adjust their health care utilization patterns. To minimize their risk of contracting COVID-19, some beneficiaries delayed seeking nonurgent health care at times; other beneficiaries may have had difficulty obtaining care as health care providers prioritized resources for the most severely ill.

## In this chapter

- COVID-19 has had a disproportionate impact on Medicare beneficiaries
- National health care spending has grown faster than GDP
- Medicare spending is projected to double in the next 10 years
- Medicare faces a financing challenge
- As Medicare spending increases, so too do premiums and cost sharing
- Medicare beneficiaries' health status has been improving
- The Commission's recommendations would slow the growth in Medicare spending and improve beneficiary access to care

The Congress appropriated several hundred billion dollars in relief funds to health care providers to offset lost revenues and ensure that they remained viable sources of care during the pandemic. The Congress and CMS also temporarily changed some payment policies, many of which are still in effect as of the date of publication of this report. These developments resulted in a doubling of the rate of growth in national health care spending in 2020. By 2021, relief funds tapered off, resulting in lower growth in national health care spending that year. By contrast, Medicare spending grew by a relatively modest 3.6 percent in 2020, then surged 8.4 percent in 2021 as patients resumed care; the suspension of a 2 percent payment sequester and a temporary 3.75 percent increase to clinician payment rates (unrelated to the pandemic) also contributed to Medicare spending growth in 2021. CMS actuaries estimate that Medicare spending grew at a more typical rate in 2022, 7.5 percent, and project that Medicare spending will grow by about 6 percent to 7 percent per year in 2023 through 2030. Medicare spending is expected to double over the next 10 years-rising from $\$ 875$ billion in 2021 to $\$ 1.8$ trillion in 2031. Medicare's projected spending growth is driven by growth in the number of beneficiaries (projected to increase from 63 million to 78 million over this period, as the baby-boom generation continues to age into Medicare) and continued growth in the volume and intensity of services delivered per beneficiary (as opposed to price increases).

Despite the projected growth in Medicare spending, the Medicare program finds itself-at least temporarily-in a somewhat better position financially than it was a year ago. After an initial economic slowdown at the start of the pandemic, the U.S. economy subsequently experienced strong growth, yielding higher-than-expected Medicare payroll tax revenues. This economic growth has contributed to a delay in the projected insolvency of Medicare's Hospital Insurance (HI) Trust Fund by a few years-to 2028, according to CMS's actuaries. However, to keep the HI Trust Fund solvent over the next 25 years, the Trustees estimate that the Medicare payroll tax would need to be raised immediately from its current rate of 2.9 percent to 3.66 percent or Part A spending would need to be permanently reduced by 16.9 percent. Alternatively, some combination of smaller spending reductions and smaller tax increases could be pursued.

Medicare payroll taxes are used to pay for Part A services (inpatient hospital stays and post-acute care following those hospital stays) and constitute only a portion of total Medicare spending ( 36 percent). The rest of Medicare's spending is largely funded by beneficiary premiums (which finance 17 percent
of Medicare spending) and general revenues (which finance 44 percent). As Medicare spending increases, it consumes growing shares of the budgets of Medicare beneficiaries and the federal government.

Trends in beneficiaries' health status have the potential to impact Medicare program spending. In recent decades, the share of people ages 65 and over who report being in only "fair" or "poor" health has declined. And the share of workers who gain eligibility for Social Security Disability Insurance (SSDI) payments each year has also been declining, falling from nearly 6.5 recipients per 1,000 workers in 2010 to 3 recipients per 1,000 workers in 2021. Research suggests that a number of factors likely influence the disability incidence rate, including the general health of the country's population, the social environment that leads a person with an impairment to become disabled, social mores, the unemployment rate (which tends to rise and fall in tandem with the disability incidence rate), financial incentives (such as the value of SSDI payments relative to wages), and policy changes. There has been little to no growth in the number of beneficiaries who have Medicare coverage as a result of disability in recent years, while the number of beneficiaries who qualify due to old age has been growing; as a result, a declining share of the Medicare population is now disabled.

The most prevalent chronic conditions among Medicare beneficiaries in 2020 were high blood pressure, high cholesterol, arthritis, diabetes, and enlarged prostate. Two other conditions-heart disease and cancer-have been the first and second most common causes of death among people ages 65 and over for years. In 2020, COVID-19 became the third-leading cause of death among Medicare beneficiaries and was ranked third in 2021 and 2022 as well. CMS actuaries have found that the Medicare beneficiaries who died of COVID-19 in 2020 tended to be high-cost beneficiaries with multiple medical conditions; CMS estimates that the remaining beneficiary population was 2 percent less costly than previously expected.

One of the most powerful ways that the Medicare program can control spending growth is by setting prices. Our annual March reports recommend updates to Medicare payment rates for various types of providers, which can be positive or negative depending on our assessment of the adequacy of Medicare payments for each sector. Over the last 10 years, spending per Medicare beneficiary has grown more slowly than spending per privately insured enrollee. Increasing prices have been the main cause of spending growth for the privately insured. From 2011 to 2021, annual per enrollee
spending on private health insurance grew 2.9 percent, driven in part by increased provider consolidation that has led to high levels of provider market power. By comparison, Medicare spending per enrollee increased by 2.4 percent per year, on average-closer to the general inflation rate of 2.0 percent over this period. Our annual June reports to the Congress typically present broader recommendations aimed at restructuring the way Medicare's payment systems work. For example, the Commission has recommended incorporating value-based insurance design into traditional Medicare's benefit design and changing the formula used to set payments for Medicare Advantage plans. The Commission's full inventory of recommendations, with links to relevant report chapters, is available at medpac.gov/recommendation/. The Commission's recommendations are based on our review of the latest available data and are aimed at obtaining good value for the Medicare program's expenditureswhich means maintaining beneficiaries' access to high-quality services while encouraging efficient use of resources.

## Introduction

Each March, the Commission reports to the Congress on traditional Medicare's various fee-for-service (FFS) payment systems, the Medicare Advantage (MA) program, and the Medicare Part D prescription drug program. To place the information presented in those chapters in context, this chapter highlights key national trends in health care spending for the country as a whole and for the Medicare program in particular. We also review the factors that contribute to Medicare spending growth-including trends in demographics and the volume and intensity of services delivered per beneficiary. Before considering the long-term financial context for the Medicare program, however, we first describe the short-term context: the coronavirus pandemic.

## COVID-19 has had a disproportionate impact on Medicare beneficiaries

Medicare beneficiaries have been disproportionately affected by coronavirus disease 2019 (COVID-19). By the end of 2022, data from the Centers for Disease Control and Prevention (CDC) indicated that individuals ages 65 and older had made up only 13 percent of reported COVID-19 cases but had constituted 75 percent of reported COVID-19 deaths (Centers for Disease Control and Prevention 2022a). Medicare beneficiaries with disabilities have had a 50 percent higher risk of having a COVID-19 hospitalization compared with beneficiaries who qualify for Medicare due to old age (Yuan et al. 2022). And beneficiaries with endstage renal disease have been six times more likely to be hospitalized for COVID-19 than beneficiaries who qualify for Medicare due to old age (Centers for Medicare \& Medicaid Services 2022b).

Clinicians have had to adjust to new care delivery approaches and priorities during the coronavirus pandemic-at times switching from providing inperson services to delivering them via telehealth and delaying elective procedures to preserve resources for the most severely ill. In the Commission's 2021 survey of Medicare beneficiaries ages 65 and over, 47 percent of beneficiaries reported having had a telehealth visit in the past year, either using video or an audio-only telephone call. In our 2022 survey (conducted in August
2022), that share had dropped to 35 percent, as access to in-person care was restored. Audio-only telephone visits were used somewhat more often (by 25 percent of beneficiaries) than video visits (which were used by 19 percent of beneficiaries in our 2022 survey). High shares of beneficiaries ( 92 percent) were satisfied with their telehealth visits, but less than half of telehealth users wanted to continue using telehealth after the pandemic ended. ${ }^{1}$

Despite the availability of telehealth, some services could not be provided through this medium and needed to be postponed in the early months of the pandemic. According to CMS's Medicare Current Beneficiary Survey, 21 percent of beneficiaries reported forgoing care during the first few months of the pandemic (Centers for Medicare \& Medicaid Services 2020). By summer 2020, access had largely been restored: only 7 to 8 percent of Medicare beneficiaries surveyed in fall 2020 and spring 2021 reported forgoing care in the prior few months (Centers for Medicare \& Medicaid Services 2021a, Centers for Medicare \& Medicaid Services 2021b, Centers for Medicare \& Medicaid Services 2020). The most common types of care that Medicare beneficiaries reported forgoing were dental care, regular check-ups, treatment for an ongoing condition, and diagnostic or medical screening tests (Centers for Medicare \& Medicaid Services 2021a, Centers for Medicare \& Medicaid Services 2021b, Centers for Medicare \& Medicaid Services 2020). Consistent with this finding, a CDC survey fielded near the start of the pandemic found that 30 percent of respondents ages 65 and over reported delaying or avoiding routine care in the past few months, but only 4 percent reported delaying or avoiding urgent or emergency care (Czeisler et al. 2020).

To keep health care providers financially stable and ensure they remained viable sources of care during the coronavirus pandemic, the Congress appropriated several hundred billion dollars in relief funds and changed certain payment policies. The rate of growth in national health care spending doubled as a result, with 10.3 percent spending growth observed in 2020 compared with 4 percent or 5 percent in prior years (Martin et al. 2023). ${ }^{2,3}$ In 2021, much smaller amounts of relief funds were paid to providers as the provision of in-person services increased. That year, national health care spending increased by a more modest 2.7 percent (Martin et al. 2023).


Note: GDP (gross domestic product). First projected year in graph is 2022. Beginning in 2014, private health insurance spending includes federal subsidies for both premiums and cost sharing for the health insurance marketplaces created by the Affordable Care Act of 2010. Health care spending also includes the following expenditures (not shown): out-of-pocket spending; spending by other health insurance programs (the Children's Health Insurance Program, the Department of Veterans Affairs, and the Department of Defense); and other third-party payers and programs (including Indian Health Service; Substance Abuse and Mental Health Services Administration; maternal and child health; school health; workers' compensation; worksite health care; vocational rehabilitation; other federal programs; other state and local programs; other private revenues; and general assistance) and public health activity. Pandemic relief funds are not considered Medicare spending since they are meant to offset pandemic-related revenue losses from all payers, not just Medicare.

Source: MedPAC analysis of CMS's National Health Expenditure Data (projected data released in April 2022 and historical data released in December 2022), https://www.cms.gov/Research-Statistics-Data-and-Systems/Statistics-Trends-and-Reports/NationalHealthExpendData/index.html.

Despite its current and future challenges, the Medicare program finds itself in a better position financially than it was a year ago. After initially contracting at the start of the coronavirus pandemic, the U.S. economy subsequently experienced strong growth, yielding higher-than-expected Medicare payroll tax revenues. This contributed to a delay in the projected insolvency of Medicare's Hospital Insurance Trust Fund by a few years-to 2028, according to CMS's actuaries.

## National health care spending has grown faster than GDP

Historically, national health care spending has grown faster than the U.S. gross domestic product (GDP) in most years, causing national health care spending as a share of GDP to increase over time (Figure 1-1). For example, from 1981 to 2021, national health care spending as a share of GDP doubled, increasing from 9.2 percent to 18.3 percent. The rate of growth

Rapid price growth in the private sector has not affected Medicare beneficiaries' access to care

Spending per enrollee on health care in the private sector has grown faster than spending per enrollee in the Medicare program. Between 2011 and 2021, private health insurance spending per enrollee grew by an average of 2.9 percent annually, while Medicare spending per enrollee grew by an average of 2.4 percent-closer to the general inflation rate of 2.0 percent per year (Bureau of Labor Statistics 2022, Centers for Medicare \& Medicaid Services 2022a).

The difference between private sector spending growth and Medicare spending growth becomes more stark once patient cost sharing is taken into account. Between 2014 and 2020, total health care spending per capita (including cost sharing, but not including spending on retail prescription drugs) grew 21 percent for the privately insured, compared with 8 percent for beneficiaries in traditional fee-for-service (FFS) Medicare (Figure 1-2, p. 10). (Actual spending amounts are lower for the privately insured, who tend to be younger and healthier than Medicare beneficiaries.) In 2020, health care utilization declined among both the privately insured and the Medicare population due to the coronavirus pandemic.

Increased prices were largely responsible for this faster private spending growth, which occurred at a time of low growth in private sector health care utilization (Health Care Cost Institute 2022, Health Care Cost Institute 2020). Our analysis of payer data and review of the literature suggest that, although there is wide variation geographically and by service, private insurers generally pay rates about twice as high as Medicare for hospital services and almost one and a half times Medicare rates for physician services (Chernew et al. 2020, Kaiser Family

Foundation 2020, Medicare Payment Advisory Commission 2017, Whaley et al. 2022).

One key driver of the private sector's higher prices is provider market power (Baker et al. 2014a, Baker et al. 2014b, Cooper et al. 2015, Curto et al. 2022, Gaynor and Town 2012, Medicare Payment Advisory Commission 2020b, Medicare Payment Advisory Commission 2017, Robinson and Miller 2014, Scheffler et al. 2018, Whaley et al. 2022). Hospitals and physician groups have increasingly consolidated, in part to gain leverage in negotiating higher payment rates with private insurers. Other motivations include gaining economies of scale, access to capital, improved coordination, relieving physicians of practice management duties, and adopting common electronic medical records (Medicare Payment Advisory Commission 2017). Meanwhile, commercial insurance markets are themselves concentrated and have grown more so. One study found that in 2021, commercial health plans were highly concentrated in 75 percent of local markets, up from 71 percent in 2014 (Guardado and Kane 2022).

Hospitals have consolidated steadily over the past several decades. From 2003 to 2017, the share of hospital markets that were "super-concentrated" (with a single dominant system that accounts for a majority of hospital discharges) rose from 47 percent to 57 percent. ${ }^{4}$ Hospital consolidation can influence prices because hospital systems with larger market shares are in a stronger bargaining position to negotiate higher payment rates from commercial insurers (Abelson 2018, Department of Justice and the Federal Trade Commission 1996, Federal Trade Commission 2016a, Federal Trade Commission 2016b).
(continued next page)
has varied by type of coverage, with private health insurance spending as a share of GDP more than doubling over this period and Medicare spending nearly tripling.

Different spending trends have been observed during the coronavirus pandemic, however. In 2020, national health care spending as a share of GDP increased sharply (to 19.7 percent of GDP or $\$ 4.1$ trillion) due

## Rapid price growth in the private sector has not affected Medicare beneficiaries' access to care (cont.)

Hospitals and their advocacy organizations may assert that losses on Medicare patients force them to increase private prices or force them to merge into larger systems with pricing power (Dobson et al. 2006, Fox and Pickering 2008, Frakt 2015). However, in contrast with this assertion, a Congressional Budget Office analysis and literature review finds: "The share of providers' patients who are covered by Medicare and Medicaid is not related to higher prices paid by commercial insurers. That finding
suggests that providers do not raise the prices they negotiate with commercial insurers to offset lower prices paid by government programs (a concept known as cost shifting)" (Congressional Budget Office 2022b).

The market for physician services is also changing, through both horizontal consolidation among practices and vertical integration between practices and health systems. In turn, these changes can also
(continued next page)

## FIGURE 1-2 <br> Health care spending per enrollee has grown faster for the privately insured than for beneficiaries in traditional FFS Medicare, 2014-2020



Note: FFS (fee-for-service). Spending in figure includes payments to providers from health insurers and patients (i.e., cost sharing) but not payments from other sources (e.g., workers' compensation or auto insurance). Spending on retail prescription drugs is not available for the privately insured, so it is excluded from both lines in this graph. Spending on out-of-network services for the privately insured is not available for that group and thus is not included in this graph. "Private insurance" reflects spending contributed by national and regional plans and third-party administrators nationwide for adults ages 18 to 64 in self-insured plans (i.e., employer self-funded plans) and fully insured plans, including individual and group plans, marketplace plans, and Medicare Advantage plans for disabled individuals under the age of 65. The figure reflects spending for individuals with full-year insurance coverage (including individuals with $\$ 0$ of health care spending).

Source: MedPAC analysis of Medicare's Master Beneficiary Summary File; FAIR Health analysis of its National Private Insurance Claims database (which reflects 150 million covered lives) for the subset of enrollees ages 18 to 64.

## Rapid price growth in the private sector has not affected Medicare

 beneficiaries' access to care (cont.)affect commercial prices. The American Medical Association's survey of physicians indicates that, over time, physicians have shifted from smaller to larger practices or have become practice employees rather than owners (Kane 2021). ${ }^{5}$ Between 2016 and 2018, the share of all physicians affiliated with health systems grew from 40 percent to 51 percent (Furukawa et al. 2020). ${ }^{6}$ After controlling for the level of horizontal concentration of physician services, three studies found that hospital-physician integration led to commercial price increases ranging from 3 percent to 14 percent (Capps et al. 2018, Medicare Payment Advisory Commission 2017, Neprash et al. 2015). Some of Medicare's policies may have created incentives for physicians to consolidate into larger organizations-through higher payment rates for hospital-owned physician practices and the Merit-based Incentive Payment System's burdensome reporting requirements, for example (Gaynor et al. 2017). Other factors likely also play a role, such as the desire to join a larger provider organization that has more leverage when negotiating payment rates with commercial insurers and a desire by a growing number of physicians to have the lifestyle of an employee rather than an independent practitioner.

As hospitals have acquired increasing numbers of physician practices, over the past two decades, many of the nation's largest health plans have become vertically integrated entities, acquiring physician groups, medical centers, and urgent care facilities as well as their own pharmacy benefit managers, pharmacies, and data analytic firms (Herman 2022). Companies that have not traditionally participated in health care, such as Amazon, have more recently acquired primary care practices (Landi 2022). In addition, although just 4 percent of physicians reported private equity ownership in their practice in 2020 (Kane 2021), private equity funds compete with health systems and plans for physician practices and may contribute to the increasing pace of consolidation (Medicare Payment Advisory Commission 2021). ${ }^{7}$ The Federal Trade Commission has observed that
"providers increasingly pursue alternatives to traditional mergers such as affiliation arrangements, joint ventures, and partnerships, all of which could also have significant implications for competition" (Federal Trade Commission 2016b).

There is limited information on the effects of horizontal and vertical consolidation on quality. However, most of the literature suggests that consolidation increases prices without an improvement in quality (Schwartz et al. 2020).

To date, the rise in commercial prices has had little direct impact on the Medicare program because of Medicare's ability to administratively set prices for most health care services. Even as commercial prices have risen relative to Medicare payments, most clinicians continue to participate in the Medicare program. From 2012 to 2019, the share of non-pediatric office-based physicians accepting new Medicare patients and the share accepting new commercially insured patients was nearly identicalhovering around 90 percent despite the discrepancy in Medicare and commercial payment rates (Kaiser Family Foundation 2022).

That said, there is a long-term risk of private sector consolidation influencing Medicare prices and patients' access to care. In the case of hospitals, higher private prices enabled by consolidation result in less pressure for providers to constrain costs and higher costs per case (Medicare Payment Advisory Commission 2009, Stensland et al. 2010, White and Wu 2014). These higher costs are then reported on hospitals' cost reports, resulting in lower Medicare profit margins and pressure to increase provider payment rates. If Medicare payment rates do not keep pace with these higher costs, eventually the difference between commercial rates and Medicare rates could grow so large that providers have an incentive to focus primarily on patients with commercial insurance. Thus, in the long term, Medicare beneficiaries' access to care may in part depend on restraining commercial payer rates.■


Fiscal year
Note: CBO (Congressional Budget Office). First projected year in graph is 2022. The sharp increase in spending in 2020 includes $\$ 103.9$ billion in Medicare Accelerated and Advance Payments paid to providers that year; these payments were expected to be repaid to the Medicare program in 2021 and 2022.

Source: 2022 annual report of the Boards of Trustees of the Medicare trust funds, Table V.H4; CBO's May 2022 baseline projections for the Medicare program.
to one-time spending by the federal government on pandemic relief funds for health care providers and public health activities at a time when the country's GDP was shrinking (Figure 1-1, p. 8). The two main sources of pandemic relief funds were the Paycheck Protection Program (which paid health care providers $\$ 53.3$ billion in 2020) and the Provider Relief Fund (which paid providers $\$ 121.6$ billion that year) (Poisal et al. 2022). (CMS also paid health care providers $\$ 103.9$ billion in 2020 through the COVID-19 Accelerated and Advance Payments Program; the agency was scheduled to recoup these funds in 2021 and 2022. These shortterm loans are not captured in CMS's national health expenditures data, which we rely on for Figure 1-1 and this passage of our chapter, but they are included in the Medicare Trustees' spending tallies and Figure 1-3.)

In 2021, the federal government continued to distribute pandemic relief funds, but at much lower levels (paying
out $\$ 22$ billion through the Paycheck Protection Program and $\$ 28.3$ billion through the Provider Relief Fund). Meanwhile, payers' spending on health care increased as patients resumed receiving health care (Martin et al. 2023, Poisal et al. 2022), and GDP expanded rapidly (by 10.7 percent in 2021). The net effect of these forces was a sharp decline in national health care spending as a share of GDP (to 18.3 percent of GDP) (Figure 1-1, p. 8).

In 2022, national health care spending is estimated to have grown by 4.6 percent, driven by continued high demand for health care services and price growth caused by high inflation (Poisal et al. 2022). (Although the current growth in health care prices is partly a result of high economy-wide inflation, it is also a result of increasing provider consolidation, which we discuss in an accompanying text box, pp. 9-11.)

By 2024, more historical spending trends are expected to return, with national health care spending growing faster than GDP (Poisal et al. 2022).

## Medicare spending is projected to double in the next 10 years

Medicare spending grew by a relatively modest 3.6 percent in 2020. Total Medicare spending increased in 2020, despite a decrease in spending in traditional FFS Medicare, because capitated payments to Medicare Advantage plans were set before the coronavirus pandemic began and assumed prepandemic utilization trends would continue in 2020, and because rapid growth in beneficiary enrollment in these private plans continued in 2020 (Hartman et al. 2022, Martin et al. 2023).

Medicare spending then grew at an accelerated rate in 2021 (by 8.4 percent), as patients resumed care. The suspension of a 2 percent payment sequester and a temporary 3.75 percent increase to clinician payment rates (unrelated to the pandemic and described in Chapter 4) also contributed to spending growth in 2021 (Martin et al. 2023).

Medicare spending is estimated to have grown at a more typical rate in 2022 ( 7.5 percent) as the 2 percent sequester was reinstated and patient demand for health care services eased (Poisal et al. 2022).

Medicare's Trustees project that Medicare spending will grow in 2023 through 2030 by more typical rates of about 6 percent to 7 percent per year (Poisal et al. 2022). Such rates will result in Medicare spending doubling over the next 10 years-rising from $\$ 875$ billion in 2021 to $\$ 1.8$ trillion in 2031 (Figure 1-3). (These amounts include Medicare program spending and beneficiaries' premiums but not beneficiaries' cost sharing.)

Several factors drive the projected growth in Medicare's spending. The annual report produced by Medicare's Trustees decomposes projected Medicare spending growth into different explanatory factors, and we have augmented their analysis by removing the effects of economy-wide inflation (Table 1-1, p. 14). We find that Medicare spending is projected to grow 4.7 percent faster than inflation over the next 10 years, despite

Medicare prices growing slower than inflation. The two factors driving Medicare's spending growth are the projected increase in the number of beneficiaries (which is expected to grow by a little more than 2 percent per year, as the baby-boom generation continues to age into Medicare) and the projected increase in the volume and intensity of services delivered per beneficiary (which is expected to grow by 3.3 percent per year) (Table 1-1, p. 14). ${ }^{8}$ Increasing the "intensity" of services refers to using more complex, expensive services or medical technologies in the place of older, less expensive options-for example, a computed tomography (CT) scan rather than an X-ray, or a new drug with a high launch price rather than an older, less expensive drug. In particular, Medicare spending on drugs administered by physicians and hospital outpatient departments (which are paid for under Part B) has grown rapidly in recent yearsincreasing by an average of 10 percent per year from 2009 to 2019-due in large part to an increase in the average price Medicare paid for these drugs (Medicare Payment Advisory Commission 2022b). This growth in the average price per drug reflects increased prices for existing products, the introduction of new higher-priced drugs, and shifts in the mix of drugs. (Spending on prescription drugs obtained through retail pharmacies, which are covered under Part D, is discussed in Chapter 12.)

Table 1-1 (p. 14) indicates that the changing demographic mix of beneficiaries in the program is not expected to cause increased spending in the next 10 years. Beneficiaries have been getting healthier in recent decades (as we discuss later in this chapter), and the average age of Medicare beneficiaries is currently declining. Shifting demographics are not expected to cause an increase in spending per beneficiary until the 2030s, when baby boomers will begin to reach older ages (Boards of Trustees 2022). This aging will have cost implications for the Medicare program because average spending per beneficiary rises with age (Figure 1-4, p. 14).

## Medicare Advantage costs 6 percent more per beneficiary than traditional FFS Medicare

Medicare spending can be divided into three program components: 48 percent of Medicare spending pays for traditional FFS Medicare coverage, 41 percent pays

## Factors contributing to Medicare's projected spending growth, 2022-2031 (after subtracting economy-wide inflation)

Average annual percent change in:

| Medicare | Medicare prices <br> (minus inflation) | Number of <br> beneficiaries | Beneficiary <br> demographic <br> mix | Volume and <br> intensity of <br> services used |
| :--- | :---: | :---: | :---: | :---: | | Medicare's <br> projected spending <br> (minus inflation) |
| :---: |
| Part A |

Note: N/A (not available). Includes Medicare Advantage enrollees. "Medicare prices" reflects Medicare's annual updates to payment rates (not including inflation, as measured by the consumer price index), total factor productivity reductions, and any other reductions required by law or regulation. Part A prices are expected to decrease to a smaller degree than Part B and Part D in part due to statutorily required increases. Specifically, in fiscal years 2022 and 2023, there is a statutory 0.5 percent increase in inpatient operating payments due to unwinding a temporary reduction in payments that was put in place to recoup past overpayments resulting from changes in providers' documentation and coding. "Volume and intensity" is the residual after the other three factors shown in the table (growth in "Medicare prices," "Number of beneficiaries," and "Beneficiary demographic mix") are removed. The projected increase in "Volume and intensity" reflects the development of new expensive drugs, the new costs associated with new laboratory tests, growth in outpatient procedures, as well as actuaries' expectation that inpatient volume will rebound in 2022 after declining during the pandemic; over the long run, we expect FFS inpatient volume per capita to continue its decades-long downward trend. The "Medicare's projected spending" column is the product of the other columns in the table.
*The "Total" row is the sum of the other rows of the table, each weighted by their part's share of total Medicare spending in 2021 (as measured by shares of GDP).
${ }^{* *}$ We are unable to calculate the total contribution of the growth in "Number of beneficiaries" to projected spending growth because there is beneficiary overlap in enrollment in Part A, Part B, and Part D.

Source: MedPAC analysis of data from the 2022 annual report of the Boards of Trustees of the Medicare trust funds.


Note: Includes beneficiaries in fee-for-service Medicare and Medicare Advantage dwelling in the community and in institutions. Spending per beneficiary for enrollees under the age of 65 (who are eligible for Medicare due to disability or end-stage renal disease) was $\$ 16,289$ (not shown). The Medicare Current Beneficiary Survey is collected from a sample of Medicare beneficiaries; year-to-year variation in some reported data is expected.

[^0]for Medicare Advantage (MA) and other private plans, and 11 percent pays for Medicare Part D drug coverage (including for beneficiaries enrolled in MA plans) (Figure 1-5).

For beneficiaries in FFS Medicare, Medicare pays health care providers directly for health care goods and services that beneficiaries obtain at prices set through legislation and regulation.

As an alternative to traditional Medicare, beneficiaries can enroll in a private MA plan. Such plans receive monthly capitated payments from the Medicare program and in turn pay health care providers using payment rates negotiated with providers. For beneficiaries, differences between MA and FFS Medicare include the fact that MA plans typically incorporate Part D coverage for prescription drugs and have a cap on beneficiaries' total annual out-of-pocket spending. In addition, most MA plans offer lower cost sharing for many services and/or cover supplemental benefits (e.g., vision, dental, and hearing benefits). In exchange for these benefits, beneficiaries in MA generally agree to a narrower network of providers than beneficiaries in traditional FFS Medicare, the potential use of utilization management (e.g., prior authorization or required referrals) for certain services, and potentially higher cost sharing or no coverage for services sought outside of a plan's network. The share of beneficiaries enrolled in MA plans has grown rapidly over the past two decades.

In addition to MA, other types of private health plans are available to Medicare beneficiaries: MedicareMedicaid Plans, Program of All-Inclusive Care for the Elderly (PACE) plans, and cost-based (as opposed to capitated) plans. Only about 3 percent of the beneficiaries in private plans are in one of these types of non-MA plans (Boards of Trustees 2022).

Through Medicare Part D, beneficiaries can obtain subsidized prescription drug coverage from private insurers by purchasing a stand-alone drug plan or by enrolling in an MA plan that includes prescription drug coverage.

Growth in spending per beneficiary differs across Medicare's three program components (Table 1-2, p. 16). From 2013 to 2021, spending per beneficiary on MA and other private plans grew by 3.0 percent, while

Share of Medicare spending on different program components, 2021

17\%
Medicare Part D prescription drug coverage (for FFS and MA enrollees)


Note: FFS (fee-for-service), MA (Medicare Advantage). Figure shows percentages of aggregate reimbursement amounts on an incurred basis. Includes spending for all FFS Medicare beneficiaries, including those with only Part A or Part B coverage. MA spending does not include medical education, hospice, and nonhospice Part A and Part B services received by hospice enrollees; when these services are furnished to MA enrollees, FFS Medicare incurs the spending.

Source: MedPAC analysis of Tables IV.A3, IV.B6, and IV.B10 in the 2022 annual report of the Boards of Trustees of the Medicare trust funds.
spending per beneficiary in traditional FFS Medicare grew by 2.3 percent and spending on Medicare Part D (including MA enrollees' prescription drug costs) grew by 1.9 percent.

We estimate that in 2023, the Medicare program will spend 6 percent more per beneficiary for MA enrollees compared with traditional FFS beneficiaries (see Chapter 11). The Commission has identified a number of factors that contribute to high MA spending. Payments to MA plans are inflated because plans pay providers to maximize the diagnoses they report for their MA enrollees, which garners higher overall payments for

## Spending per beneficiary on FFS Medicare, MA, and Medicare Part D has grown at different rates over time

Annual percent change in spending per beneficiary

|  |  |  |  |
| :--- | :---: | :---: | :---: |
| Year | FFS <br> Medicare | MA and other <br> private plans | Medicare <br> Part $\mathbf{D}$ |
| 2013 | $0.2 \%$ | $-1.4 \%$ | $0.3 \%$ |
| 2014 | 1.3 | -7.1 | 8.2 |
| 2015 | 1.7 | 1.8 | 6.2 |
| 2016 | 1.2 | 2.9 | -0.9 |
| 2017 | 1.7 | 2.8 | -2.4 |
| 2018 | 3.8 | 4.7 | 0.5 |
| 2019 | 3.6 | 7.7 | 3.0 |
| 2020 | -2.4 | 6.1 | 2.1 |
| 2021 | 10.0 | 3.6 | 0.5 |
| Average over this period | $\mathbf{2 . 3}$ | $\mathbf{3 . 0}$ | $\mathbf{1 . 9}$ |

Note: FFS (fee-for-service), MA (Medicare Advantage). Percent change is calculated using annual spending on an incurred basis that is not risk standardized. Spending per beneficiary is not adjusted for health status or coding differences between MA and FFS. Private plans include MA plans, Medicare-Medicaid plans, Program of All-Inclusive Care for the Elderly (PACE) plans, and cost-based (as opposed to capitated) plans. Spending per beneficiary on MA and other private plans is calculated by summing Part A spending on private health plans and Part B spending on private health plans, then dividing that by the number of enrollees in Part C (in private health plans). FFS Medicare spending per beneficiary is calculated by summing (1) Part A FFS spending divided by Part A FFS enrollees and (2) Part B FFS spending divided by Part B FFS enrollees. Part D spending (which includes MA enrollees' outpatient prescription drug costs) is calculated by taking total Part D spending, subtracting premiums (mostly paid by enrollees), then dividing that by the number of enrollees in Part D.

Source: MedPAC analysis of data from the 2022 annual report of the Boards of Trustees of the Medicare trust funds

MA plans. MA plans also receive quality bonuses that increase Medicare spending for the majority of MA enrollees, yet the Commission has found that the MA quality rating system does not provide meaningful information about plans' quality of care (Medicare Payment Advisory Commission 2020a, Medicare Payment Advisory Commission 2019b). MA spending is also driven up by plan benchmarks that are set so high that the Medicare program (and its beneficiaries, through higher Part B premiums) ends up subsidizing the substantial extra benefits that MA plans offer to their enrollees-benefits that are not available to FFS enrollees. Over the past few years, the Commission has recommended policies to address each of these issues (Medicare Payment Advisory Commission 2021, Medicare Payment Advisory Commission 2020a, Medicare Payment Advisory Commission 2016). Implementing these recommendations would have a meaningful impact on Medicare spending.

## Medicare faces a financing challenge

The entire baby-boom generation will be eligible for Medicare by 2029 (Poisal et al. 2022). ${ }^{9}$ By that point, Medicare is projected to have 76 million beneficiariesup from 63 million beneficiaries in 2021 (Figure 1-6a). Meanwhile, the ratio of workers helping to finance Medicare through their taxes relative to the number of Medicare beneficiaries is expected to continue to decline. Around the time of Medicare's inception, there were 4.6 workers for each Medicare beneficiary, but by 2021 there were only 2.9 workers per beneficiary, and by 2031 there are expected to be only 2.5 workers per beneficiary (Figure 1-6b).

These demographics create a financing challenge for the Medicare program. Medicare Part A (which covers inpatient hospital stays and post-acute care

Figure 1-6a. Medicare enrollment


Figure 1-6b. Workers per Medicare beneficiary


Note: "Beneficiaries" referenced in these graphs are beneficiaries enrolled in Medicare Part A (including beneficiaries in Medicare Advantage). First projected year is 2022. Part A services are financed by Medicare's Hospital Insurance Trust Fund and beneficiary cost sharing

Source: 2022 annual report of the Boards of Trustees of the Medicare trust funds.
following those hospital stays) is mainly financed through workers' payroll taxes, which are deposited into Medicare's Hospital Insurance (HI) Trust Fund. In some recent years, Medicare has spent more on Part A services than it has collected through HI Trust Fund revenues-creating annual deficits. ${ }^{10}$ In other years, trust fund revenues have exceeded Part A spending (including in 2021 and 2022)-creating annual surpluses. ${ }^{11}$ Medicare's Trustees currently estimate that the trust fund will experience annual deficits from 2023 on and its accumulated surplus will be exhausted by 2028 (Boards of Trustees 2022). The Congressional Budget Office (CBO) also tracks the trust fund's financial status and projects a similar trust fund depletion date of 2030 (Congressional Budget Office 2022a).

According to Medicare's Trustees, if Medicare's HI Trust Fund balance is depleted, "Medicare could pay health plans and providers of Part A services only to the extent allowed by ongoing tax revenues-and these
revenues would be inadequate to fully cover costs," which they warn could rapidly curtail beneficiary access to care. However, the Trustees note that lawmakers have never allowed the HI Trust Fund assets to be depleted (Boards of Trustees 2022).

To keep the HI Trust Fund solvent over the next 25 years, the Trustees estimate that the Medicare payroll tax would need to be raised immediately from its current rate of 2.9 percent to 3.66 percent or Part A spending would need to be permanently reduced by 16.9 percent (Table 1-3, p. 18), which is equivalent to a reduction in spending of about $\$ 69$ billion in 2023 (Boards of Trustees 2022). ${ }^{12}$ Reducing Part A spending by $\$ 69$ billion in a single year would require major structural changes to the Medicare program and is not likely to be achieved through narrow payment policy changes. For example, CBO has estimated that one of the Commission's more financially impactful recommendations-replacing the MA quality bonus

## Higher Medicare payroll tax or lower Medicare Part A spending needed to maintain solvency of the Hospital Insurance Trust Fund

To maintain Hospital Insurance
Trust Fund solvency for:
Increase 2.9\% payroll tax to:
Or decrease Part A spending by:
25 years (2022-2046) $\quad 3.66 \% \quad 16.9 \%$

Note: Part A spending includes spending on inpatient hospital, skilled nursing facility, home health agency, and hospice services and includes spending for beneficiaries in fee-for-service Medicare and Medicare Advantage.

Source: MedPAC analysis of Table III.B8 in 2022 annual report of the Boards of Trustees of the Medicare trust funds.
program with a redesigned value incentive programwould have saved $\$ 10$ billion in 2022 through a mix of Part A and Part B savings (Congressional Budget Office 2018)-but that amount is only a fraction of the $\$ 69$ billion in Part A savings needed to extend the solvency of the trust fund. Given the large amount of money needed to extend the life of the trust fund, a combination of smaller spending reductions and smaller tax increases is another option that could be pursued.

The rest of Medicare spending, under Part B (which covers clinician and outpatient services) and Part D (which covers prescription drugs), is financed through the Supplementary Medical Insurance (SMI) Trust Fund. The SMI Trust Fund is funded by premiums paid by beneficiaries and transfers from the general fund of the Treasury. ${ }^{13}$ Since premiums and transfers are intentionally set to grow at the same rate as Part B and Part D spending, the SMI Trust Fund automatically remains solvent. However, as Part $B$ and Part D spending rises, so too do premiums and transfers from the Treasury-putting pressure on the budgets of Medicare beneficiaries and the U.S. government (Figure 1-7).

The large and growing share of Medicare spending funded through general revenues (shown in Figure $1-7$ ) is a financing challenge. As the amount of general revenues needed to finance Medicare increases, it reduces government resources available for other priorities, such as investments that could expand future economic output (e.g., federal investments in education, transportation, and research and development). ${ }^{14}$

The increasing expenditure of general revenues on Medicare is also a problem because the federal government already spends more than it collects in revenues each year (Figure 1-8, p. 20). The gray line at the top of Figure 1-8 represents total federal spending as a share of GDP; the black line below it represents total federal revenues. The difference between these two lines represents the budget deficit, which must be covered by federal borrowing. The stacked layers in Figure 1-8 depict federal spending by program. By 2041, spending on Medicare, the other mandatory programs shown in the figure, and net interest payments are projected to reach 18.7 percent of the nation's GDP and, by themselves, will exceed total federal revenues. At that point, every dollar spent on programs funded through annual discretionary appropriations will need to be financed through federal borrowing.

While these projections are sobering enough in and of themselves, CMS actuaries caution that they may actually be "overly optimistic" (Office of the Actuary 2022). Medicare spending is projected to grow rapidly through the mid-2030s, then grow at a slower rate in subsequent decades due to various cost-reduction measures specified in current law. ${ }^{15} \mathrm{CMS}$ actuaries note that if these cost-reduction measures are replaced with more generous payment policies, Medicare spending from the mid-2030s on will increase at a higher rate that is more in line with past spending growth. This higher rate of growth would mean that, by 2046, instead of Medicare spending constituting 6.2 percent of GDP (as shown in

## General revenues have overtaken Medicare payroll taxes as the largest source of Medicare funding



Note: GDP (gross domestic product). First projected year is 2022. These projections are based on the Trustees' intermediate set of assumptions. "Tax on benefits" refers to the portion of income taxes that higher-income individuals pay on Social Security benefits, which is designated for Medicare. "State transfers" refers to payments from the states to Medicare, required by the Medicare Prescription Drug, Improvement, and Modernization Act of 2003, for assuming primary responsibility for prescription drug spending. "Drug fees" refers to the fee imposed by the Affordable Care Act of 2010 on manufacturers and importers of brand-name prescription drugs; these fees are deposited in the Part B account of the Supplementary Medical Insurance Trust Fund. Graph does not include interest earned on trust fund investments (which makes up 1 percent of the HI Trust Fund's income and is expected to decline in coming years as trust fund assets decline).

Source: 2022 annual report of the Boards of Trustees of the Medicare trust funds.

Figure 1-8, p. 20), Medicare spending could constitute 6.5 percent of GDP. It would also mean that the payroll tax increase or Part A spending decrease needed to maintain the solvency of Medicare's HI Trust Fund (shown earlier in Table 1-3) would need to be much larger (Office of the Actuary 2022, Spitalnic 2022). The Medicare Trustees' long-term spending projections should therefore be viewed as a lower bound of what future Medicare spending could look like and "should not be interpreted as the most likely expectation of actual Medicare financial operations in the future,"
according to CMS actuaries (Boards of Trustees 2022, Office of the Actuary 2022).

## As Medicare spending increases, so too do premiums and cost sharing

Medicare's spending growth affects beneficiaries' ability to afford health care through higher premiums and cost sharing. Medicare beneficiaries typically do not

Spending on Medicare, other major health programs, Social Security, and net interest is projected to exceed total federal revenues by 2041


Note: GDP (gross domestic product), CHIP (Children's Health Insurance Program), ACA (Affordable Care Act of 2010).
Source: Congressional Budget Office's long-term budget projections, published July 2022.
pay premiums for Part A (Hospital Insurance) coverage, but the annual cost of Part B (Supplementary Medical Insurance) standard premiums was $\$ 2,041$ in 2022, and the average annual cost of Part D prescription drug plan premiums was $\$ 480$ (Medicare Payment Advisory Commission 2022a). In addition, cost sharing for beneficiaries in traditional FFS Medicare averaged $\$ 383$ for Part A services, $\$ 1,469$ for Part B services, and $\$ 432$ for beneficiaries with Part D coverage in 2020 (Medicare Payment Advisory Commission 2022a). (Beneficiaries' Part D cost sharing is likely to decline in future years due to new limits on cost sharing that were included in the Inflation Reduction Act of 2022. ${ }^{16}$ ) The typical Medicare beneficiary has relatively modest resources to draw on when paying for premiums and cost sharing: Researchers estimate that Medicare
beneficiaries' median per capita income in 2019 was $\$ 29,650$ and their median savings was $\$ 73,800$ (Koma et al. 2020).

A small share of Medicare beneficiaries receive help with their Part A and Part B out-of-pocket costs by concurrently enrolling in their state's Medicaid program: 9 percent of noninstitutionalized Medicare beneficiaries were eligible for both Medicare and Medicaid benefits (dual-eligible beneficiaries) in 2019 (Figure 1-9). In addition, 21 percent of Medicare beneficiaries had low enough income and assets that they received help with their out-of-pocket drug costs through the Part D low-income subsidy in 2021 (Medicare Payment Advisory Commission 2022a).

Among beneficiaries with modest incomes and assets that are nevertheless too high to allow them to qualify for Medicaid or the Part D low-income subsidy, high medical prices can be a barrier to obtaining needed medications. One study found that among Medicare beneficiaries not receiving the low-income subsidy who were prescribed high-priced specialty drugs, one in three did not fill prescriptions for anticancer drugs, one in five did not fill prescriptions for hepatitis C curative therapies, and well over half did not fill prescriptions for drugs for immune system disorders and high cholesterol (Dusetzina et al. 2022).

Most beneficiaries reduce their out-of-pocket spending by obtaining supplemental insurance coverage or by opting out of FFS Medicare and into an MA plan. In 2019, half of all noninstitutionalized beneficiaries had FFS Medicare plus supplemental coverage (commonly obtained through Medicaid, a former employer, and/or a Medigap plan they purchased themselves). Another 41 percent were enrolled in an MA plan or other managed care plan. ${ }^{17}$ The remaining 10 percent of beneficiaries had FFS Medicare without any supplemental coverage to reduce their cost sharing (equivalent to 17 percent of FFS beneficiaries) (Figure 1-9). ${ }^{18}$

Taken together, beneficiary spending on Medicare Part B and Part D premiums and cost sharing consumed 28 percent of the average Social Security benefit in 2022, up from 16 percent 20 years earlier; in another 20 years, Part B and Part D premiums and cost sharing are expected to consume 36 percent of the average Social Security benefit (Boards of Trustees 2022). ${ }^{19}$ (As a point of reference, Social Security benefits accounted for 50 percent or more of household income for half of all seniors in 2015 and for 90 percent or more of household income for one in four seniors that year (Dushi and Trenkamp 2021).)

A few subpopulations of beneficiaries have reported experiencing problems obtaining health care due to high costs at notably higher rates than other beneficiaries, according to our analysis of CMS's 2020 Medicare Current Beneficiary Survey. Among nonelderly beneficiaries (who are disabled or have endstage renal disease), 20 percent reported problems getting health care due to cost. Among beneficiaries with different types of primary and supplemental coverage, the two groups with the highest share of

FIGURE
1-9

Most Medicare beneficiaries reduced their cost sharing through supplemental coverage or enrollment in a Medicare Advantage plan in 2019


Note: MA (Medicare Advantage). Our analysis assigned beneficiaries to the supplemental coverage category they were in for the most time in 2019; beneficiaries could have had coverage in other categories during 2019. "Medicare Advantage and other managed care plans" includes beneficiaries with employersubsidized MA coverage and MA enrollees dually enrolled in Medicaid. The analysis includes only beneficiaries not living in institutions such as nursing homes. It excludes beneficiaries who were not in both Part A and Part B throughout their enrollment in 2019 or who had Medicare as a secondary payer.

Source: MedPAC analysis of Medicare Current Beneficiary Survey, Survey file 2019.
beneficiaries reporting trouble obtaining care due to cost were FFS beneficiaries with no supplemental coverage and partial-benefit dual-eligible beneficiaries: 15 percent of beneficiaries with these types of coverage reported this difficulty. (Partial-benefit dual-eligible beneficiaries receive Medicaid assistance with out-ofpocket costs but do not qualify for additional Medicaid benefits that full-benefit dual-eligible beneficiaries receive, such as dental care and nonemergency medical transportation.) And among beneficiaries with

The share of various subgroups of Medicare eligibles who reported being in fair or poor health declined from 2010 to 2018


Note: "Adults of any age reporting a lot of difficulty in functional domains or cannot do at all" are people ages 18 and over who reported that for at least one of six functional domains (e.g., mobility, communication, self-care) they had a lot of difficulty or could not do the activity at all. Similarly, "Adults of any age reporting some difficulty in functional domains" are people ages 78 and over who reported that for at least one of six functional domains, they had some difficulty doing the activity.

Source: National Center for Health Statistics, Health, United States, 2019, Table 16, released 2021. https://www.cdc.gov/nchs/hus/contents2019. htm\#Table-016.
annual household incomes of less than $\$ 25,000,13$ percent reported trouble getting health care due to cost. By comparison, among all noninstitutionalized beneficiaries in CMS's 2020 survey, only 8 percent reported trouble getting care due to cost. ${ }^{20}$

## Medicare beneficiaries' health status has been improving

Trends in beneficiaries' health status have the potential to impact Medicare program spending. In recent decades, the reported health status of people who are likely eligible for Medicare has improved. For example, between 2010 and 2018, the share of people ages 65 to 74 reporting being in only "fair" or "poor" health fell from
21.2 percent to 19.1 percent. Among people ages 75 and older, the share who reported "fair" or "poor" health fell from 28.3 percent to 26.6 percent. Among adults of any age who reported some difficulty in a functional domain (and thus may serve as a proxy for disabled Medicare beneficiaries), the share reporting being in "fair" or "poor" health fell from 17.1 percent to 14.0 percent. And among adults of any age who reported a lot of difficulty or an inability to complete an activity in a functional domain, the share reporting "fair" or "poor" health fell from 47.3 percent to 44.7 percent (Figure 1-10).

The share of Medicare beneficiaries who gain eligibility for the program due to disability has also been declining (Figure 1-11). According to the Social Security Administration, the share of workers who gain eligibility for Social Security Disability Insurance (SSDI)

```
FIGURE
    1-11
Over the past decade, the share of Medicare beneficiaries who are disabled has declined
```



```
Note: ESRD (end-stage renal disease). The vast majority of Medicare beneficiaries under the age of 65 gain eligibility for the program due to disability (98\%) as opposed to ESRD (2\%).
Source: Annual data provided by CMS Office of the Actuary using information from the 2022 annual report of the Boards of Trustees of the Medicare trust funds.
```

payments each year fell from nearly 6.5 recipients per 1,000 workers in 2010 to 3 recipients per 1,000 workers in 2021 (Goss and Glenn 2022). The agency does not have a definitive explanation for the marked decline in the rate of disability incidence; its prior research has suggested that a number of factors likely influence the SSDI disability incidence rate, including the general health of the country's population, the social environment that leads a person with an impairment to become disabled, social mores, the unemployment rate (which tends to rise and fall in tandem with the disability incidence rate), financial incentives (such as the value of SSDI payments
relative to wages), and policy changes (Goss and Glenn 2022, Social Security Administration 2006).

## The most common chronic conditions are high blood pressure and high cholesterol

The most prevalent chronic conditions among Medicare beneficiaries are high blood pressure, high cholesterol, arthritis, diabetes, and enlarged prostate (Table 1-4, p. 24). These conditions may persist for years and can lead to other chronic conditions. Spending per beneficiary per year is highest for those recently diagnosed with a heart attack, lung cancer, a stroke, heart failure, or colon cancer. ${ }^{21}$

Prevalence among beneficiaries in FFS Medicare

Spending per beneficiary for those with the specified condition

## Most prevalent chronic conditions

Hypertension (high blood pressure)
Hyperlipidemia (high cholesterol)
Rheumatoid arthritis / osteoarthritis
Diabetes
Benign prostatic hyperplasia (enlarged
prostate)

| $67 \%$ | $\$ 16,240$ |
| :--- | ---: |
| 63 | 15,570 |
| 35 | 17,190 |
| 27 | 18,012 |
| 27 | $\mathrm{~N} / \mathrm{A}$ |

## Most costly conditions

| Acute myocardial infarction (heart | 1 | 58,691 |
| :--- | :---: | ---: |
| attack) | 1 | 42,374 |
| Lung cancer | 6 | 37,097 |
| Stroke / transient ischemic attack | 12 | 31,305 |
| Heart failure | 2 | 30,384 |

Note: FFS (fee-for-service), N/A (not available). Beneficiaries may be counted in more than one chronic condition category. The information should not be used to attribute utilization or payments strictly to the condition selected because beneficiaries with any of the conditions presented could have other health conditions that contribute to their Medicare utilization and spending amounts. Spending per beneficiary reflects Medicare payments only, and not beneficiary cost sharing, and is actual spending, as opposed to age- or risk-standardized spending. Prevalence data for chronic conditions are not directly comparable to prevalence data reported in prior years' Commission reports due to a change in our data source's methodology.

Source: Centers for Medicare \& Medicaid Services' Chronic Conditions Warehouse (CCW), Table B.2a. Medicare beneficiary prevalence for 30 CCW chronic conditions using fee-for-service (FFS) claims, 2017-2020, May 2022, https://www2.ccwdata.org/documents/10280/19096644/ccw-website-table-b2a.pdf; Centers for Medicare \& Medicaid Services' Mapping Medicare Disparities by Population interactive tool, October 12, 2022, https:// data.cms.gov/tools/mapping-medicare-disparities-by-population.

Until the coronavirus pandemic, there was little change in the leading causes of death in the U.S., with the CDC finding that heart disease and cancer were the first and second most common causes of death, both among people ages 65 and over (Table 1-5) and among the general population (Centers for Disease Control and Prevention 2022b). However, since the start of the coronavirus pandemic in March 2020, COVID-19 has been one of the leading causes of death in the U.S., with its rank relative to other causes of death rising and falling during the pandemic's various peaks and valleys-briefly ranking as the leading cause of death from December 2020 through February 2021 and falling to the second- or thirdleading cause of death in most other months (Ortaliza
et al. 2022). When looking at annual totals, COVID-19 was the third-leading cause of death in 2020, 2021, and 2022, both among people ages 65 and over and among the general population (data not shown) (Ortaliza et al. 2022). ${ }^{22}$

CMS actuaries have found that the Medicare beneficiaries who died of COVID-19 in 2020 tended to be high-cost beneficiaries with multiple medical conditions; the remaining beneficiaries were estimated to be 2 percent less costly, on average (Spitalnic 2022). By 2028, actuaries project that this effect will subside and beneficiary case mix will return to a more typical composition (Boards of Trustees 2022).

## Cause of death

Share of deaths
Heart disease ..... 25\%
Cancer ..... 21
Chronic lower respiratory diseases (breathing disorders) ..... 6
Cerebrovascular diseases (conditions that affect blood flow to the brain) ..... 6
Alzheimer's disease ..... 6
Diabetes ..... 3
Unintentional injuries ..... 3
Nephritis, nephrotic syndrome, nephrosis (kidney disorders) ..... 2
Influenza and pneumonia (lung infections) ..... 2
Parkinson's disease ..... 2
Note:

"Chronic lower respiratory diseases" were formerly known as "chronic obstructive pulmonary diseases."

Source: National Center for Health Statistics, Health, United States, 2020-21, Table LCODAge, released 2022. https://ftp.cdc.gov/pub/Health_Statistics/NCHS/ Publications/Health_US/hus20-27tables/lcodage.xIsx.

## Certain subgroups of Medicare beneficiaries have less longevity and worse access to care than others

Life expectancy at age 65 varies by race, ethnicity, and sex. In 2019, among individuals who lived to age 65, Black and American Indian or Alaska Native individuals could expect to live an additional 18 years, White individuals could expect an additional 19.5 years, Hispanic individuals could expect another 21.6 years, and Asian individuals could expect another 23.4 years (Figure 1-12, p. 26). ${ }^{23}$ Across all race and ethnicity groups, women tend to live longer than men.

Recent data indicate that life expectancy declined in 2020 , largely due to the coronavirus pandemic, with people age 65 losing an average of 1.1 years of life expectancy (Murphy et al. 2021). Life expectancy at age 65 declined by an additional 0.1 years in 2021, as the pandemic continued (Xu et al. 2022). (These data have not yet been analyzed to identify differences by race, ethnicity, or sex.)

To examine whether beneficiaries of different races and ethnicities have different access to care, we
analyzed CMS's 2020 Medicare Current Beneficiary Survey, which was fielded among 14,000 Medicare beneficiaries, and the Commission's 2022 access-tocare survey, which was fielded among 4,000 Medicare beneficiaries. For most questions related to accessing care, the share of beneficiaries of different race and ethnicity groups who reported a particular care experience varied by no more than a few percentage points. But some more substantive differences did emerge. For example, CMS's survey found that 16 percent of Black beneficiaries and 10 percent of Hispanic beneficiaries reported having problems paying a medical bill, compared with 6 percent of White beneficiaries. CMS's survey also found that Hispanic beneficiaries were 4 percentage points more likely to delay care due to cost and to lack a usual care provider compared with White beneficiaries. ${ }^{24}$ The Commission's survey found that 39 percent of Hispanic beneficiaries and 36 percent of Black beneficiaries reported seeing no specialists in the past year, while only 23 percent of White beneficiaries reported this. ${ }^{25}$ And CMS's survey found that only 90 percent of Black beneficiaries and 91 percent of Hispanic beneficiaries


Note: Figure shows most recent available data for different combinations of race/ethnicity and sex.
Source: National Center for Health Statistics, Health, United States, 2020-27, Table LExpMort, released 2022. https://ftp.cdc.gov/pub/Health_Statistics/ NCHS/Publications/Health_US/hus20-21tables/lexpmort.xIsx.
reported feeling that their usual care provider spent enough time with them, compared with 96 percent of White beneficiaries.

## The Commission's recommendations would slow the growth in Medicare spending and improve beneficiary access to care

Several aspects of Medicare's payment systems hamper the program's ability to maximize program efficiencies and beneficiaries' access to care. The Commission regularly makes recommendations to address these issues. Our annual March reports recommend updates to Medicare payment rates for various types of providers, which can be positive or negative depending on our assessment of the adequacy
of Medicare payments for each sector. Our annual June reports typically offer broad recommendations aimed at restructuring the way Medicare's payment systems work. For example, we have recommended incorporating value-based insurance design into FFS Medicare's benefit design and changing the formula used to set payments for MA plans. A list of the Commission's recommendations, with links to relevant report chapters, is available at medpac.gov/ recommendation/. The Commission's recommendations are based on our review of the latest available data and are aimed at obtaining good value for the Medicare program's expenditures-which means maintaining beneficiaries' access to high-quality services while encouraging efficient use of resources.

## Endnotes

1 The Commission's annual access-to-care survey is completed by approximately 4,000 Medicare beneficiaries ages 65 and over in traditional FFS Medicare or Medicare Advantage and produces nationally representative results.

2 Expenditures for prescription drugs, physician-administered drugs, durable medical equipment, and hospice were not materially affected by the pandemic (Boards of Trustees 2022).

3 Examples of pandemic payment policies that increased spending on certain types of services include the waiver of the requirement for a three-day inpatient stay prior to skilled nursing facility services, the 20 percent increase to payments for COVID-19 inpatient admissions, and temporarily allowing beneficiaries residing in any part of the U.S. to access telehealth services from their home.

4 The most concentrated markets have a HerfindahlHirschman Index above 5,000, meaning that in a market with two systems, one of the systems has more than a 50 percent market share; these have been referred to as "superconcentrated" markets (Fulton et al. 2018).

5 In 2020, 50 percent of physicians reported that they were employees, up from 42 percent in 2012, and the share with an ownership stake in their practice fell to 44 percent from 53 percent over the same period (Kane 2021).

6 Health systems are defined here as organizations that had at least one acute care hospital and one physician group and that were connected through common ownership or joint management.

7 While the share of surveyed physicians who reported private equity ownership in their practices in 2020 was well below 10 percent for most specialties, it was between 10 percent and 15 percent for emergency medicine and anesthesiology (Kane 2021).

8 It should be noted that the 3.3 percent expected average annual growth in volume and intensity from 2022 to 2031 in Table 1-1 (p. 14) is higher than historical volume and intensity growth and higher than CMS's long-term projections of growth because it reflects CMS's assumption that volumes in 2022 and 2023 will bounce back from unusually low volumes that occurred during the pandemic year of 2021. In other words, part of the expected growth in volume and intensity reflects a recovery relative to the decrease in volume that occurred from 2019 to 2021 during the pandemic.

9 Baby boomers are people born in the period between the end of World War II and the mid-1960s.

10 The HI Trust Fund's income is derived from several sources, including payroll taxes (which made up 90 percent of the trust fund's income in 2021), taxation of Social Security benefits ( 7 percent), interest earned on trust fund investments ( 1 percent), and premiums collected from voluntary participants (1 percent) (Boards of Trustees 2022).

11 HI Trust Fund surpluses are a result of several factors. In late 2021 and 2022, health care providers were expected to fully repay the Medicare program for $\$ 107.2$ billion in accelerated and advance payments paid to them in 2020 and early 2021 (some of these funds were expected to be repaid to the HI Trust Fund specifically). Part A spending in 2021 and 2022 is also now projected to be lower than previously projected due to the pandemic lasting longer than initially expected. In addition, both the number of workers paying the Medicare payroll tax and the size of their average wages are now estimated to be higher than previously projected (Boards of Trustees 2022).

12 Workers and their employers split the cost of the payroll tax (workers pay 1.45 percent and employers pay the remaining 1.45 percent). Meanwhile, self-employed people pay both the worker's and the employer's share of this tax, totaling 2.9 percent of their net earnings. High-income workers pay an additional 0.9 percent of their earnings above $\$ 200,000$ for single workers or $\$ 250,000$ for married couples filing joint income tax returns.

13 For Part D, the beneficiary premium share is based on 25.5 percent of the average cost of the basic benefit.

14 General revenues primarily consist of individual and corporate taxes but also include customs duties, leases of government-owned land and buildings, the sale of natural resources, usage and licensing fees, and payments to agencies (Department of Treasury 2022).

15 For example, Medicare's Trustees assumed that starting in 2026, clinicians who are not in advanced alternative payment models (A-APMs) will receive lower annual updates to their Medicare physician fee schedule payment rates ( 0.25 percent per year) than clinicians who are in A-APMs ( 0.75 percent per year)-and that these updates will not be replaced with updates that are more reflective of medical inflation (which is projected to average 2 percent per year in the long range). Medicare's Trustees also assumed that bonuses clinicians currently receive for participating in A-APMs or for
demonstrating "exceptional" performance under the Meritbased Incentive Payment System will end in 2025-and not be extended through legislative intervention.

16 The Inflation Reduction Act of 2022 specified that in 2024, beneficiaries will no longer be required to pay cost sharing upon reaching the catastrophic phase of the Part D benefit, and in 2025, out-of-pocket costs in Part D will be capped at $\$ 2,000$. (In 2021, roughly 1.5 million beneficiaries reached the catastrophic phase and would have benefited from this cap.)

17 Among Medicare beneficiaries with both Part A and Part B, 49 percent were enrolled in an MA plan in 2022 (see Chapter 11).

18 The share of community-dwelling Medicare beneficiaries who report having traditional FFS coverage with public or private supplemental coverage has declined from nearly three-quarters of beneficiaries in 2000 to about half of beneficiaries in 2019, according to our analyses of CMS's Medicare Current Beneficiary Survey data (Medicare Payment Advisory Commission 2022a, Medicare Payment Advisory Commission 2019a, Medicare Payment Advisory Commission 2018, Medicare Payment Advisory Commission 2003).

19 These estimates do not reflect the new limits on Part D cost sharing that were included in the Inflation Reduction Act of 2022, described in endnote 16.

20 The Medicare Current Beneficiary Survey results reported in this paragraph reflect the experiences of noninstitutionalized beneficiaries with Part A and/or Part B coverage. When we instead restricted our sample to noninstitutionalized
beneficiaries who had both Part A and Part B, our results changed by negligible amounts ( 0 percentage point to 1 percentage point).

21 Although a stroke can be a one-time event, it can cause ongoing health problems such as paralysis, seizures, and difficulty communicating.

22 COVID-19's rank as the third-leading cause of death in 2022 is based on data for January-September of 2022.

23 Hispanic individuals' superior longevity despite worse profiles on some social determinants of health has puzzled demographers for decades and has been referred to as the Hispanic health paradox. A definitive explanation for this paradox has yet to be identified, but researchers hypothesize that Hispanic individuals' longevity may be due to immigration dynamics (with Hispanics who enter the U.S. tending to be relatively healthy, and Hispanics who leave the U.S. to return to their home countries tending to be older and less healthy), low rates of cigarette smoking, and high levels of family support (Dominguez et al. 2015).

24 We also observe some substantive differences in the experiences of Multiracial versus White beneficiaries and Native American/Alaska Native/Native Hawaiian/Pacific Islander beneficiaries versus White beneficiaries, but not Asian versus White beneficiaries.

25 The small sample size of the Commission's access-to-care survey (approximately 4,000 Medicare beneficiaries) means that the only statistically significant differences by race/ ethnicity that we can detect are those that are quite large.

## References

Abelson, R. 2018. When hospitals merge to save money, patients often pay more. New York Times, November 14.

Baker, L. C., M. K. Bundorf, and D. P. Kessler. 2014a. Vertical integration: Hospital ownership of physician practices is associated with higher prices and spending. Health Affairs 33, no. 5 (May): 756-763.

Baker, L. C., M. K. Bundorf, A. B. Royalty, et al. 2014b. Physician practice competition and prices paid by private insurers for office visits. JAMA 312, no. 16 (October 22-29): 1653-1662.

Boards of Trustees, Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. 2022. 2022 annual report of the Boards of Trustees of the Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. Washington, DC: Boards of Trustees.

Bureau of Labor Statistics, Department of Labor. 2022. CPI for all urban consumers (CPI-U). https://data.bls.gov/timeseries/ CUUR0000SA0?years_option=all_years.

Capps, C., D. Dranove, and C. Ody. 2018. The effect of hospital acquisitions of physician practices on prices and spending. Journal of Health Economics 59 (May): 139-152.

Centers for Disease Control and Prevention. 2022a. Demographic trends of COVID-19 cases and deaths in the U.S. reported to the CDC. https://covid.cdc.gov/covid-data-tracker/\#demographics.

Centers for Disease Control and Prevention. 2022b. Table LCODRace. Leading cases of death and number of deaths, by sex, race, and Hispanic origin: United States, 1980 and 2019. https://ftp.cdc.gov/pub/Health_Statistics/NCHS/Publications/ Health_US/hus20-21tables/lcodage.xlsx.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022a. National health expenditure data: Historical. Baltimore, MD: CMS. https://www.cms.gov/Research-Statistics-Data-and-Systems/Statistics-Trends-and-Reports/ NationalHealthExpendData/NationalHealthAccountsHistorical.

Centers for Medicare \& Medicaid Services. 2022b. Preliminary Medicare COVID-19 data snapshot: Medicare claims and encounter data: January 1, 2020 to November 20, 2021, received by December 17, 2021. Fact sheet. https://www.cms.gov/files/ document/medicare-covid-19-data-snapshot-fact-sheet.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2021a. COVID-19 experiences among the Medicare population: Fall 2020. https://www.cms.gov/files/ document/medicare-current-beneficiary-survey-covid-19-data-snapshot-infographic-fall-2020.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2021b. COVID-19 experiences among the Medicare population: Winter 2021. https://www.cms.gov/files/ document/medicare-current-beneficiary-survey-covid-19-data-snapshot-infographic-winter-2021.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2020. COVID-19 experiences among the Medicare population: Summer 2020. https://www.cms.gov/ files/document/medicare-current-beneficiary-survey-summer-2020-covid-19-data-snapshot.pdf.

Chernew, M. E., A. L. Hicks, and S. A. Shah. 2020. Wide statelevel variation in commercial health care prices suggests uneven impact of price regulation. Health Affairs 39, no. 5 (May): 791-799.

Congressional Budget Office. 2022a. The budget and economic outlook: 2022 to 2032. Washington, DC: CBO. https://www.cbo. gov/system/files/2022-05/57950-Outlook.pdf.

Congressional Budget Office. 2022b. The prices that commercial health insurers and Medicare pay for hospitals' and physicians' services. Washington, DC: CBO. https://www.cbo.gov/ publication/57422.

Congressional Budget Office. 2018. Options for reducing the deficit: 2019 to 2028. Washington, DC: CBO.

Cooper, Z., S. V. Craig, M. Gaynor, et al. 2015. That price ain't right? Hospital prices and health spending on the privately insured. NBER working paper no. 21815. Cambridge, MA: National Bureau of Economic Research.

Curto, V., A. D. Sinaiko, and M. B. Rosenthal. 2022. Price effects of vertical integration and joint contracting between physicians and hospitals in Massachusetts. Health Affairs 41, no. 5 (May): 741-750.

Czeisler, M. E., K. Marynak, K. E. N. Clarke, et al. 2020. Delay or avoidance of medical care because of COVID-19-related concerns: United States, June 2020. Morbidity and Mortality Weekly Report 69, no. 36 (September 11): 1250-1257.

Department of Justice and the Federal Trade Commission. 1996. Statements of antitrust enforcement policy in health care. Washington, DC: DOJ/FTC. https://www.ftc.gov/sites/ default/files/attachments/competition-policy-guidance/ statements_of_antitrust_enforcement_policy_in_health_ care_august_1996.pdf.

Department of Treasury. 2022. How much revenue has the U.S. government collected this year? https://fiscaldata. treasury.gov/americas-finance-guide/governmentrevenue/\#:~:text=This\ comparison\ provides\ a\  sense,States\%20that\%20year\%20\%2425.02\%20trillion.

Dobson, A., J. Davanzo, and N. Sen. 2006. The cost-shift payment "hydraulic": Foundation, history, and implications. Health Affairs 25, no. 1 (January-February): 22-33.

Dominguez, K., A. Penman-Aguilar, M. H. Chang, et al. 2015. Vital signs: Leading causes of death, prevalence of diseases and risk factors, and use of health services among Hispanics in the United States: 2009-2013. Morbidity and Mortality Weekly Report 64, no. 17 (May 8): 469-478.

Dusetzina, S. B., H. A. Huskamp, R. L. Rothman, et al. 2022. Many Medicare beneficiaries do not fill high-price specialty drug prescriptions. Health Affairs 41, no. 4 (April): 487-496.

Dushi, I., and B. Trenkamp. 2021. Improving the measurement of retirement income of the aged population. ORES working paper no. 116. Washington, DC: Social Security Administration. https:// www.ssa.gov/policy/docs/workingpapers/wp116.html.

Federal Trade Commission. 2016a. The accuracy of hospital merger screening methods. Working paper no. 326. Washington, DC: FTC. https://www.ftc.gov/sites/default/files/attachments/ competition-policy-guidance/statements_of_antitrust_ enforcement_policy_in_health_care_august_1996.pdf.

Federal Trade Commission. 2016b. Keynote address of FTC Chairwoman Edith Ramirez at the Antitrust in Healthcare Conference, May 12. https://www.ftc.gov/system/files/ documents/public_statements/950143/160519antitrusthealthca rekeynote.pdf.

Fox, W., and J. Pickering. 2008. Hospital \& physician cost shift: Payment level comparison of Medicare, Medicaid, and commerical payers. New York: Milliman.

Frakt, A. 2015. Hospitals are wrong about shifting costs to private insurers. New York Times, March 23.

Fulton, B., D. Arnold, and R. M. Scheffler. 2018. Market concentration variation of health care providers and health insurers in the United States. To the Point blog. Commonwealth Fund. July 30. https://www.commonwealthfund.org/blog/2018/ variation-healthcare-provider-and-health-insurer-marketconcentration.

Furukawa, M. F., L. Kimmey, D. J. Jones, et al. 2020. Consolidation of providers into health systems increased substantially, 2016-18. Health Affairs 39, no. 8 (August): 1321-1325.

Gaynor, M., F. Mostashari, and P. B. Ginsburg. 2017. Making health care markets work: Competition policy for health care. JAMA (published online March 2).

Gaynor, M., and R. Town. 2012. The impact of hospital consolidation: Update. The Synthesis Project, policy brief no. 9. Princeton, NJ: Robert Wood Johnson Foundation.

Goss, S., and K. Glenn. 2022. Social Security and Medicare trustees reports-A deep dive discussion with the programs' chief actuaries. June 17. Webinar hosted by the American Academy of Actuaries. https://www.ssa.gov/oact/presentations/ ocact_20220617.pdf.

Guardado, J. R., and C. Kane. 2022. Competition in health insurance: A comprehensive study of U.S. markets. Chicago, IL: American Medical Association. https://www.ama-assn.org/ system/files/competition-health-insurance-us-markets.pdf.

Hartman, M., A. B. Martin, B. Washington, et al. 2022. National health care spending in 2020: Growth driven by federal spending in response to the COVID-19 pandemic. Health Affairs 41, no. 1 (January): 13-25.

Health Care Cost Institute. 2022. 2020 health care cost and utilization report. Washington, DC: HCCI. https:// healthcostinstitute.org/images//pdfs/HCCI_2020_Health_ Care_Cost_and_Utilization_Report.pdf.

Health Care Cost Institute. 2020. 2018 health care cost and utilization report. Washington, DC: HCCI.

Herman, B. 2022. The health insurer will see you now: How UnitedHealth is keeping more profits, as your doctor. Stat News, December 5. https://www.statnews.com/2022/12/05/ unitedhealth-keeping-profits-as-your-doctor-insurer/.

Kaiser Family Foundation. 2022. Most office-based physicians accept new patients, including patients with Medicare and private insurance. https://www.kff.org/medicare/issue-brief/ most-office-based-physicians-accept-new-patients-including-patients-with-medicare-and-private-insurance/.

Kaiser Family Foundation. 2020. How much more than Medicare do private insurers pay? A review of the literature. Washington, DC: KFF.

Kane, C. 2021. Policy research perspectives. Recent changes in physician practice arrangements: Private practice dropped to less than 50 percent of physicians in 2020. Chicago, IL: American Medical Association.

Koma, W., T. Newman, G. Jacobson, et al. 2020. Medicare beneficiaries' financial security before the coronavirus pandemic. Washington, DC: Kaiser Family Foundation. https://www.kff. org/medicare/issue-brief/medicare-beneficiaries-financial-security-before-the-coronavirus-pandemic/.

Landi, H. 2022. Amazon scoops up primary care company One Medical in deal valued at \$3.9B. Fierce Healthcare, July 21. https:// www.fiercehealthcare.com/health-tech/amazon-shells-out-39b-primary-care-startup-one-medical.

Martin, A., M. Hartman, J. Benson, et al. 2023. National health care spending in 2021: Decline in federal spending outweighs greater use of health care. Health Affairs 42, no. 1.

Medicare Payment Advisory Commission. 2022a. A data book: Health care spending and the Medicare program. Washington, DC: MedPAC. https://www.medpac.gov/wp-content/ uploads/2022/07/July2022_MedPAC_DataBook_SEC_v2.pdf.

Medicare Payment Advisory Commission. 2022b. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2020a. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2020b. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2019a. A data book: Health care spending and the Medicare program. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2019b. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2018. A data book: Health care spending and the Medicare program. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2017. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2016. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2009. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2003. A data book: Healthcare spending and the Medicare program. Washington, DC: MedPAC.

Murphy, S. L., K. Kochanek, J. Q. Xu, et al. 2021. Mortality in the United States, 2020. NCHS data brief, no. 427. Hyattsville, MD: National Center for Health Statistics.

Neprash, H. T., M. E. Chernew, A. L. Hicks, et al. 2015. Association of financial integration between physicians and hospitals with commercial health care prices. JAMA Internal Medicine 175, no. 12 (December): 1932-1939.

Office of the Actuary. 2022. Memorandum from John D. Shatto and $M$. Kent Clemens regarding projected Medicare expenditures under an illustrative scenario with alternative payment updates to Medicare providers. June 2. Baltimore, MD.

Ortaliza, J., K. Amin, and C. Cox. 2022. COVID-19 leading cause of death ranking. Peterson-KFF Health System Tracker. https:// www.healthsystemtracker.org/brief/covid-19-leading-cause-of-death-ranking/.

Poisal, J. A., A. M. Sisko, G. A. Cuckler, et al. 2022. National health expenditure projections, 2021-30: Growth to moderate as COVID-19 impacts wane. Health Affairs 41, no. 4 (April): 474-486.

Robinson, J. C., and K. Miller. 2014. Total expenditures per patient in hospital-owned and physician-owned physician organizations in California. JAMA 312, no. 16 (October 22-29): 1663-1669.

Scheffler, R. M., D. R. Arnold, and C. M. Whaley. 2018.
Consolidation trends in California's health care system: Impacts on ACA premiums and outpatient visit prices. Health Affairs 37, no. 9 (September): 1409-1416.

Schwartz, K., M. Rae, and T. Neuman. 2020. What we know about provider consolidation. Washington, DC: Kaiser Family Foundation.

Social Security Administration. 2006. Trends in the Social Security and Supplemental Security Income disability programs. Washington, DC: SSA. August. https://www.ssa.gov/policy/ docs/chartbooks/disability_trends/trends.pdf.

Spitalnic, P. 2022. The financial status of Medicare: A summary of the 2022 Trustees Report. Presentation at an event sponsored by the American Enterprise Institute, June 6. https://www.aei.org/ wp-content/uploads/2022/05/AEI-TR22.pptx?x91208.

Stensland, J., Z. R. Gaumer, and M. E. Miller. 2010. Private-payer profits can induce negative Medicare margins. Health Affairs 29, no. 5 (May): 1045-1051.

Whaley, C. M., B. Briscombe, R. Kerber, et al. 2022. Prices paid to hospitals by private health plans. Santa Monica, CA: RAND. https://www.rand.org/pubs/research_reports/RRA1144-1.html.

White, C., and V. Y. Wu. 2014. How do hospitals cope with sustained slow growth in Medicare prices? Health Services Research 49, no. 1 (February): 11-31.

Xu, J., S. Murphy, K. Kochanek, et al. 2022. Mortality in the United States, 2021. NCHS Data Brief, no. 456 (December).

Yuan, Y., J. M. Thierry, L. Bull-Otterson, et al. 2022. COVID-19 cases and hospitalizations among Medicare beneficiaries with and without disabilities: United States, January 1, 2020 to November 20, 2021. Morbidity and Mortality Weekly Report 71, no. 24 (June 17): 791-796.


Assessing payment adequacy and updating payments in fee-for-service Medicare

## C H A P TER

# Assessing payment adequacy and updating payments in fee-for-service Medicare 

## Chapter summary

As required by law, the Commission annually makes payment update recommendations for providers paid under Medicare's traditional fee-for-service (FFS) payment systems. An update is the amount (usually expressed as a percentage change) by which the base payment to all providers in a payment system is changed relative to the prior year. To determine an update, we first assess the adequacy of Medicare payments to providers in the current year (2023) by considering beneficiaries' access to care, the quality of care, providers' access to capital, and how Medicare payments compare with providers' costs. As part of that process, we examine whether payments will support the efficient delivery of services, consistent with our statutory mandate. We then make a judgment about what, if any, update is needed for the policy year in question (for this report, 2024). (The Commission also assesses Medicare payment systems for Part C (Medicare Advantage) and Part D (outpatient prescription drug coverage) in this report and makes recommendations as appropriate. Because they are not FFS payment systems, however, they are not discussed in this chapter.)

Providers' financial status and the pattern of Medicare spending in 2020 and 2021 varied substantially from historical patterns. In the spring of 2020, many health care sectors experienced large reductions in

## In this chapter

- Assessing the adequacy of Medicare payments in 2023
- Considering anticipated payment and cost changes in 2023
- Recommending how Medicare payments should change in 2024
- Payment adequacy in context
the demand for services, resulting in temporary financial distress for some providers. In response, the Congress and CMS extended federal grants to providers and temporarily altered certain Medicare payment policies. At least in part, those actions offset the short-term financial effects of the coronavirus public health emergency (PHE) for many providers. Some providers eventually returned funds to the federal government because their finances recovered faster than expected. Those temporary actions, even if not precisely targeted, were a commensurate response to the immediate financial effects of the PHE. In 2021, aggregate demand for services rebounded in many health care sectors, although not to prepandemic levels in every sector.

To fulfill our congressional mandate to update Medicare's payment systems, we must confine our focus to factors that we expect will affect payment adequacy in 2024. To the extent that the pandemic effects are temporary or vary significantly across individual providers, they are best addressed through targeted temporary funding policies. Because updates are cumulative-that is, they compound each year-they are not the preferred policy response to abrupt but temporary changes in the demand for health care. Where we expect the effects on providers' costs to persist into 2024, the policy year for our recommendations, those changes are noted in each sector's payment adequacy discussion and factor into our estimates of payment adequacy.

This year, we consider recommendations in seven FFS payment systems for the following sectors: acute care hospitals, physicians and other health professional services, outpatient dialysis facilities, skilled nursing facilities, home health agencies, inpatient rehabilitation facilities, and hospice providers. We also include recommendations to redistribute current disproportionate share hospital and uncompensated care payments, and to provide additional resources to Medicare safety-net hospitals and clinicians who furnish care to Medicare beneficiaries with low incomes. The Commission previously considered an annual update recommendation for ambulatory surgical centers (ASCs). However, because Medicare does not require ASCs to submit data on the cost of treating beneficiaries, we have no new significant data to inform an ASC update recommendation for 2024 and thus decided to provide a status report on ASCs instead of an update recommendation. Previously, the Commission also considered an annual update recommendation for long-term care hospitals (LTCHs). However, as the number of cases that qualified for payment under Medicare's prospective payment system for LTCHs declined, we became more concerned about small sample sizes in our analyses of this sector. ${ }^{1}$ As a result, we will no longer provide an annual payment adequacy
analysis for LTCHs but will continue to monitor that sector and provide periodic status reports.

The Commission examines all available indicators of payment adequacy and reevaluates any assumptions from prior years, using the most recent data available to make sure its recommendations accurately reflect current conditions. We use the best available data and changes in payment policy to project margins for 2023 and make payment recommendations for 2024, accounting for anticipated changes in providers' costs up to 2024. Because of standard data lags, the most recent complete data we have are generally from 2021. We also used preliminary data from 2022 when available. The coronavirus PHE has created additional data lags, most notably for cost reports because the deadlines for their submission were extended. These data lags have affected some health care sectors more than others.

In considering updates to payment rates, we may make recommendations that redistribute payments within a payment system to correct any biases that may make treating patients with certain conditions financially undesirable, make certain procedures unusually profitable, or otherwise result in inequity among providers. We may recommend changes to improve program integrity where we deem it necessary. Our goal is to apply consistent criteria across settings, but because conditions at baseline and anticipated changes between baseline and the policy year may vary, the recommended updates may vary across sectors.

The Commission also examines payment rates for services that can be provided in multiple settings. Medicare often pays different amounts for similar services across settings. Basing the payment for services that lead to similar health outcomes on the rate in the lowest-cost setting would in many cases save money for Medicare, reduce cost sharing for beneficiaries, and reduce the financial incentive to provide services in the higher-paid setting. However, aligning FFS payment rates across settings is not a simple matter. The definitions of services provided and characteristics of beneficiaries served in the different settings must be sufficiently similar to warrant the same payment, and we must try to anticipate unintended consequences.

Our recommendations in this report, if adopted, could significantly change the revenues that providers receive from Medicare. Payment rates set to cover the costs of relatively efficient providers-that is, those with lower costs and higher quality-help induce all providers to control their costs and improve
quality, thereby helping the Medicare program get more value for its spending. Furthermore, Medicare rates have broader implications for health care spending because they are used in setting payments for other federal and state government programs and private health insurance. Thus, while maintaining fiscal pressure on health care providers through payment rate updates directly benefits the Medicare program, it can also help control health care spending across payers.

## Background

The goal of Medicare payment policy should be to obtain good value for the program's expenditures, which means maintaining beneficiaries' access to highquality services while encouraging efficient use of resources. Anything less does not serve the interests of the taxpayers and beneficiaries who finance Medicare through their taxes and premiums. Steps toward this goal involve:

- setting the base payment rate (i.e., the payment for services of average complexity) at a level that covers the reasonable cost to treat a beneficiary;
- developing payment adjustments that accurately reflect market, service, and patient cost differences beyond providers' control;
- adjusting payments to encourage high-quality care; and
- considering the need for annual payment updates and other policy changes.

To help determine the appropriate base payment rate for a given payment system in 2024, we generally first consider whether payments are adequate for relatively efficient providers in 2023. To inform the Commission's judgment, we examine the most recent available data on beneficiaries' access to care, the quality of care, and providers' access to capital. We then consider anticipated policy and cost changes to project Medicare payments and providers' costs for 2023. Taking these factors into account, we recommend how Medicare payments for the sector in aggregate should change for 2024.

Within any given level of funding for a sector, we may also consider changes in payment policy to improve relative payment accuracy across patients and services. Such changes are intended to improve equity among providers or access to care for beneficiaries and may also affect the distribution of payments among providers in a sector. For example, in 2020, the Commission recommended that CMS replace the low-volume payment adjustment and the rural adjustment in the end-stage renal disease prospective payment system (PPS) with a single payment adjustment that would better target additional payments to dialysis facilities that are isolated and have low volume. Occasionally, the Commission considers
both redistributing current levels of funding and adding or subtracting resources. One example is the recommendation in this report to redistribute current disproportionate share hospital and uncompensated care payments and to add funding for Medicare safety-net payments using the Commission-developed Medicare Safety-Net Index to support hospitals that are key sources of care for low-income Medicare beneficiaries (see Chapter 3).

We also make recommendations to improve program integrity when needed. In some cases, our data analyses reveal problematic variation in service utilization across geographic regions or providers. For example, in 2016, we recommended that the Secretary closely examine the coding practices of certain inpatient rehabilitation facilities that appeared to result in very high Medicare margins (Medicare Payment Advisory Commission 2016b).

We compare our update and other policy recommendations for 2024 with the base payment rates specified in law to understand the implications for beneficiaries, providers, and the Medicare program. As has been the Commission's policy in the past, our recommendations each year consider the most current data and, in general, recommend updates for a single year.

As of the writing of this report in 2023, the pandemic is entering its fourth year. In 2021 and 2022, the Delta and Omicron variants of the virus contributed to subsequent spikes in coronavirus disease 2019 (COVID-19) cases. Those waves in case volume led to surges in hospitalizations and protracted strain on health care workers. In late 2020 and in 2021, the Food and Drug Administration (FDA) granted emergency-use authorization to several COVID-19 vaccines and therapies, and by spring 2021, nearly two-thirds of surveyed Medicare beneficiaries said they had received at least one vaccine dose (Centers for Medicare \& Medicaid Services 2021). Yet COVID-19 variants continue to evolve, and the effect of virus transmission on the demand for health care services remains uncertain. As of the writing of this report, the coronavirus public health emergency (PHE) is scheduled to end on May 11, 2023, but we will continue to analyze the effects of the pandemic going forward. Because many of the analyses in this report use data from 2021, we recount, below, the timeline of the pandemic and related policies in 2020 and 2021

## Select pandemic-related temporary Medicare policy changes

| Setting | Temporary change |
| :---: | :---: |
| Hospital | - Provided a 20 percent Medicare IPPS add-on payment for stays with a principal or secondary diagnosis of COVID-19 through the end of the PHE. <br> - Provided an enhanced IPPS payment for eligible inpatient cases that use certain new products authorized or approved to treat COVID-19, effective November 2, 2020, through the end of the fiscal year in which the PHE ends. |
| Physicians and clinicians | - Added more than 140 new PFS services to the telehealth list, extending some of them through the end of the fiscal year in which the PHE ends. <br> - Permitted clinicians to provide telehealth services regardless of the beneficiary's location through the end of the PHE or December 31, 2024, whichever is later. <br> - Waived requirements that physicians and NPPs be licensed in the state where they are providing services for individuals who meet certain conditions. |
| SNF | - Waived the requirement for a 3-day prior hospitalization for coverage of a SNF stay and authorized renewed SNF coverage without starting a new benefit period through the end of the PHE. |
| Home health | - Waived the requirement for an RN to conduct an initial assessment visit, which can be performed remotely. |
| IRF | - Permitted telehealth to fulfill the face-to-face visit and supervision requirements through the end of the PHE. <br> - Waived the 3-hour rule, which is intended to ensure that patients require an intensive rehabilitation program generally consisting of 3 hours of therapy at least 5 days per week, through the end of the PHE. <br> - Permitted exclusion of patient stays resulting from the PHE for purposes of calculating the applicable thresholds associated with the 60 percent rule through the end of the PHE. |
| Hospice | - Allowed the use of telecommunications technology by the hospice physician or NP for the face-to-face visit when such visit is solely for the purpose of recertifying a patient for hospice services through the end of the PHE or December 31, 2024, whichever is later. |

Note: IPPS (inpatient prospective payment systems), PFS (physician fee schedule), NPP (nonphysician practitioner), SNF (skilled nursing facility), RN (registered nurse), IRF (inpatient rehabilitation facility), PHE (public health emergency), PPS (prospective payment system), NP (nurse practitioner). As of the writing of this report, the PHE is scheduled to end on May 11, 2023. This list of temporary PHE-related Medicare policies is not exhaustive. For a comprehensive list, see Podulka and Blum (2020). Changes specific to individual sectors and their effects on our payment adequacy indicators are discussed in more detail in each chapter of this report.

Source: Podulka and Blum 2020.
to establish PHE-related conditions that affect our indicators of payment adequacy.

On January 31, 2020, the Secretary of Health and Human Services first declared the coronavirus PHE starting January $27,2020 .{ }^{2}$ In late March 2020, the nation's health care system first began to experience enormous strain as COVID-19 patients filled hospital
emergency rooms and intensive care units, displacing other types of cases. Frontline health care workers faced burnout and risks to their health and safety treating COVID-19 cases. In nursing homes, the effects of COVID-19 have been devastating. Staff and residents accounted for a disproportionate share of COVID-19 cases and deaths as they faced the outbreaks with inadequate resources. Residents who remained in
nursing homes suffered from isolation as nursing homes closed to visitors. Meanwhile, the volume of ambulatory care services dropped sharply in the early months of the pandemic as patients delayed or avoided care and access to some services was curtailed to avoid spreading the disease.

To help respond to the enormous challenges of the pandemic, the Congress and CMS altered Medicare payments and policies and granted regulatory flexibilities starting in March 2020 (Podulka and Blum 2020). Some of these measures have been phased out, but many are scheduled to remain in effect for the duration of the PHE, which, as noted above, is expected to continue until May 11, 2023. A plurality of the changes eased some provider eligibility requirements (Podulka and Blum 2020). Regulatory waivers allowed providers to furnish services outside the state where they are enrolled and permitted beneficiaries to receive care in settings other than acute care hospitals (e.g., homes, skilled nursing facilities (SNFs)) to allow for surge capacity in hospitals. Changes to post-acute care policies waived facility-specific criteria for payment designed to control use of specialized, high-cost settings like inpatient rehabilitation facilities (IRFs) but also added, in certain settings, reporting requirements related to the coronavirus pandemic. Other changes suspended audits and quality reporting requirements or granted more flexibility over which measures to report. CMS also expanded access to telehealth services, including temporarily eliminating geographic restrictions on where such services can be provided and expanding the types of services that can be furnished remotely. ${ }^{3}$ A sample of payment changes and waivers that can affect access, quality, and payments is shown in Table 2-1. We discuss policies that affected each sector in more detail in each of the chapters of this report.

The Congress also responded to the unfolding crisis by providing funding for providers (i.e., higher Medicare payments, grants, and loans). Key sources of federal funds included suspension of the 2 percent sequestration payment adjustment applied to all Medicare fee-for-service (FFS) claims; the Provider Relief Fund, which furnished qualified providers with payments for health care expenses or lost revenue due to the pandemic; the COVID-19 Accelerated and Advance Payments Program that provided advance Medicare payments that must be repaid;
and the Paycheck Protection Program (PPP) loans for small businesses, including health care providers, which do not need to be repaid if recipients meet certain conditions. Several of those measures have subsequently ended, such as the PPP in May 2021 and the reinstatement of the sequester in March 2022.

In any year, factors unrelated to the adequacy of Medicare's payment rates can affect our indicators of access to care, quality, access to capital, and Medicare payments and providers' costs in the settings we examine. This year, as they will in future years, the direct and indirect effects of COVID-19 and PHE-related policy changes and emergency funding for providers made it more difficult to interpret some of our indicators of the adequacy of Medicare's payment rates, as discussed in more detail below. In our analysis of each sector, we have identified conceptually and, where possible, empirically how our payment adequacy indicators were affected by the PHE and related policies. ${ }^{4}$

Our recommendations in this report, if adopted, could significantly change the revenues that providers receive from Medicare. Payment rates set to cover the costs of relatively efficient providers help induce all providers to control their costs. Furthermore, Medicare rates have broader implications for health care spending because they are used in setting payments for other federal and state government programs and private health insurance. For example, most Medicare Advantage plans pay hospitals using rates that are comparable with, or based on, Medicare FFS rates (Berenson et al. 2015, Maeda and Nelson 2017); the Department of Veterans Affairs (VA) sets payment rates not to exceed Medicare FFS rates for most care provided in non-VA settings (Department of Veterans Affairs 2019); and the Medicaid program uses Medicare rates when setting maximum supplemental "upper payment limit" Medicaid FFS payments to hospitals (Medicaid and CHIP Payment and Access Commission 2019, Medicaid and CHIP Payment and Access Commission 2016). Some states use Medicare FFS rates as inputs for provider payments in public employee health plans (e.g., Montana) or in health plan options offered to their public constituents (e.g., Washington State) (Appleby 2018, Carlton et al. 2021). Thus, while maintaining fiscal pressure on health care providers through payment rate updates directly benefits the Medicare program, it can also help control health care spending across payers.


Note: We use different measures of margins in our payment adequacy analysis. "Medicare marginal profit" is an indicator of access to care, where Medicare marginal profit = (Medicare payment - costs of treating Medicare beneficiaries that vary with volume) / Medicare payment. The "all-payer total margin" is a measure of a sector's access to capital, where the all-payer margin = ( payments from all payers and sources - cost of providing services) / payments from all payers and sources. "Medicare aggregate margin" for a sector is a measure of the relationship between Medicare's payments and providers' costs for treating Medicare beneficiaries, where Medicare aggregate margin = (Medicare payments for service - cost of providing service) / Medicare payment for the service.

Source: MedPAC

## Assessing the adequacy of Medicare payments in 2023

The first part of the Commission's approach to developing payment updates is to assess the adequacy of current Medicare payments. For each sector, we make a judgment by examining information on the following: beneficiaries' access to care, quality of care, providers' access to capital, and Medicare payments and providers' costs for 2023.

Some measures focus on beneficiaries (e.g., access to care), and some focus on providers (e.g., the relationship between payments and providers' costs). The direct relevance, availability, and quality of each type of information vary among sectors, and no single measure provides all the information needed for the Commission to judge payment adequacy. For example, to inform our assessment of payments for
physicians and other health professionals, we conduct a survey of beneficiary access. Ultimately, in making its recommendations, the Commission considers as many of these factors as are available. Figure 2-1 shows our payment adequacy framework and an example of the kind of factors used (when they are available) for a sector.

## Beneficiaries' access to care

Access to care is an important indicator of the willingness of providers to serve Medicare beneficiaries and the adequacy of Medicare payments. For example, poor access could indicate that Medicare payments are too low. However, factors unrelated to Medicare's payment policies may also affect access to care, such as coverage policies, changes in the delivery of health care services, beneficiaries' preferences, local market conditions, and supplemental insurance. In March and April 2020, for example, access was profoundly
influenced by the coronavirus pandemic. Many elective procedures were delayed or canceled, and many beneficiaries chose not to visit providers' offices and health care facilities because of the risk of contracting COVID-19 (Czeisler et al. 2020).

The measures we use to assess beneficiaries' access to care depend on the availability and relevance of information in each sector. We use results from several surveys to assess the willingness of physicians and other health professionals to serve beneficiaries and beneficiaries' opinions about their access to physician and other health professional services. For home health services, we examine data on whether communities are served by providers. To the extent that access continues to be affected by the pandemic, we will take that factor into account as well.

## Access: Provider capacity, supply, and staffing

Rapid growth in the capacity of providers to furnish care may increase beneficiaries' access and indicate that payments are more than adequate to cover providers' costs. Changes in technology and practice patterns may also affect providers' capacity. For example, as a surgical procedure becomes less invasive, it might be more frequently performed in outpatient settings, freeing up some inpatient hospital capacity. Likewise, as the prices of certain pieces of equipment fall, they can be more easily purchased by providers, increasing the capacity to provide certain services.

Rapid entry of providers into a sector, particularly by for-profit entities, may suggest that Medicare's payments are more than adequate and could raise concerns about the value of the services being furnished. However, if Medicare is not the dominant payer for a given provider type (such as ambulatory surgical centers), changes in the number of providers may be influenced more by other payers and their demand for services and thus may be difficult to relate to Medicare payments. When the number of providers declines because of facility closures, we try to distinguish between closures that have serious implications for access to care and those that may have resulted from excess capacity. For example, in 2016, the Congress significantly reduced Medicare's payment rates for certain cases in long-term care hospitals (LTCHs); subsequently, many LTCHs closed. However, the closures occurred primarily in market areas with multiple LTCHs.

The PHE has had several other effects on provider capacity and supply that can confound our ability to interpret changes as indicators of Medicare payment adequacy. Supplemental payments or policies to waive Medicare's payment rules may have subsidized providers that would have exited the market otherwise, absent the PHE. Provider capacity was constrained in some settings and expanded in others due to the pandemic and policy changes, including waivers of payment rules and expanded telehealth access. One dimension of capacity is providers' staffing levels. Prior to the pandemic, employment in some provider sectors had been increasing steadily. After the pandemic's onset, employment in several sectors declined rapidly and, despite more recent modest increases, some providers continued to report critical staffing shortages at times during 2021 and 2022. Effects of the PHE on capacity have varied by geography and over time. Changes in the capacity and supply of providers we observe during the pandemic are not necessarily an indicator of inadequate Medicare base payment rates.

## Access: Volume of services

The volume of services furnished by health care providers can be an indirect indicator of beneficiary access. An increase in volume shows that beneficiaries are receiving more services and suggests sufficient access in aggregate, although it does not necessarily demonstrate that the services are necessary or appropriate. Volume is also an indicator of payment adequacy: An increase in volume beyond what would be expected relative to the increase in the number of beneficiaries could suggest that Medicare's payment rates are too high. Very rapid increases in the volume of a service might even raise questions about program integrity or whether the definition of the corresponding benefit is too vague. By contrast, reductions in the volume of services can sometimes be a signal that revenues are inadequate for providers to continue operating or to provide the same level of service. Finally, rapid changes in volume between sectors whose services can be substituted for one another may suggest distortions in payment and raise questions about provider equity. For example, over the last several years, the volume of evaluation and management (E\&M) office visits billed as being provided in hospital outpatient departments (HOPDs) has increased while the volume of E\&M visits billed as
being provided in physicians' offices has decreased. This shift is likely driven at least in part by much higher payment rates for E\&M visits in HOPDs than in physicians' offices.

However, changes in the volume of services are not direct indicators of access; increases and decreases can be explained by other factors such as population changes, changes in disease prevalence among beneficiaries, dissemination of new and improved medical knowledge and technology, deliberate policy interventions, and beneficiaries' preferences. For example, the number of beneficiaries in traditional FFS Medicare varies from year to year; therefore, we look at the volume of services per FFS beneficiary as well as the total volume of services. Explicit policy decisions can also influence volume. For example, during fiscal year 2016, LTCHs-as expected-changed their admitting practices largely in response to the implementation of a dual payment-rate system, and the number of admissions paid under the LTCH PPS decreased markedly.

Changes in the volume of physician services must be interpreted particularly cautiously. Findings from the literature are mixed, but some studies have shown that providers can respond to reductions in payment rates for discretionary services by increasing the volume or intensity of the services they provide (Brunt and Hendrickson 2021, Clemens and Gottlieb 2014, Congressional Budget Office 2020, Mitchell et al. 2002). Whether such an offsetting phenomenon might exist within other sectors would depend in part on how discretionary the services are and the degree to which providers are able to influence beneficiaries' demand for them.

During the early months of the 2020 coronavirus pandemic, the volume of services provided in many sectors decreased rapidly due to changes in demand and PHE-related shutdowns. In addition to the effects of the coronavirus itself, ongoing waivers related to the PHE also had the potential to affect the volume and mix of cases. In the physician sector, a decline in volume was accompanied by a rapid rise in the volume of telehealth services. By June, the number of office visits and telehealth visits combined was close to the volume experienced for office visits in previous years (during which the volume of telehealth visits was minimal). In most other sectors, volume rebounded by late June or July 2020. However, the volume of SNF services has
not fully recovered. Facility volume and employment at SNFs began to increase in 2022 but remained below prepandemic levels nationally, although rebounds in occupancy have varied geographically.

## Access: Medicare marginal profit

Another factor we consider when evaluating access to care is whether providers have a financial incentive to expand the number of Medicare beneficiaries they serve. In considering whether to treat a patient, a provider with excess capacity compares the marginal revenue it will receive (e.g., the Medicare payment) with its marginal costs-that is, the costs to treat Medicare beneficiaries that vary with volume in the short term. If Medicare payments are larger than the marginal costs of treating an additional beneficiary, a provider has a financial incentive to increase its volume of Medicare patients. In contrast, if payments do not cover the marginal costs, the provider may have a disincentive to care for Medicare beneficiaries. We note, however, that in instances in which a sector does not have substantial excess capacity, where demand is suppressed, or in which Medicare composes a dominant share of a sector's patients, marginal profit may be a less useful indicator of access to care.

## Quality of care

The relationship between quality of care and the adequacy of Medicare payment is not direct. Simply increasing payments through an update for all providers in a sector is unlikely to influence the overall quality of care that beneficiaries receive because there is no imperative for providers to devote the additional revenue to actions that are known to improve quality. Indeed, historically, Medicare payment systems created little or no incentive for providers to spend additional resources on improving quality.

The Medicare program has in more recent years implemented quality-based payment policies in several sectors; however, some issues have arisen. First, differentiating quality performance among providers when the number of cases per provider is relatively low is difficult. This issue has been particularly vexing in measuring quality performance for individual clinicians. Second, the Commission has been concerned that Medicare scores too many quality measures focused on process as opposed to patient outcomes (Medicare Payment Advisory Commission 2018). Many current
process measures are weakly correlated with outcomes of interest such as rates of mortality and readmissions. Most process measures focus on addressing the underuse of services, while the Commission believes that overuse and inappropriate use are also of concern. Third, reliance on provider-reported measures can create a burden on providers and can lead to biased reporting in response to strong financial incentives.

In our June 2018 report to the Congress, we formalized principles for designing Medicare quality incentive programs, which address these issues. In 2019, we applied these principles to recommend a hospital value incentive program that scores a small set of outcome, patient experience, and cost measures, and in 2020, we recommended changing the quality incentive program for Medicare Advantage to better evaluate quality and reward high-quality plans (Medicare Payment Advisory Commission 2020, Medicare Payment Advisory Commission 2019). In 2021, we made related recommendations for Medicare to eliminate the current SNF value-based purchasing program and to establish a new SNF value incentive program (Medicare Payment Advisory Commission 2021a).

While we examine our quality indicators using 2021 data, the trends in 2020 and 2021 were challenging to interpret due to the effects of the PHE on many of our outcome measures. We cannot draw conclusions about the relationship of quality measures to Medicare payment adequacy because our indicators reflect circumstances unique to the PHE. For example, increased mortality related to COVID-19 and capacity constraints at acute care hospitals could affect measures such as rates of readmission and discharge to the community. Further, with the exception of our analysis of the hospital sector in Chapter 3, most of our quality metrics rely on risk-adjustment models that do not explicitly account for the effects COVID-19.

## Providers' access to capital

Providers must have access to capital to maintain and modernize their facilities and to improve patient care delivery. Widespread ability to access capital throughout a sector may reflect the adequacy of Medicare payments. Some sectors such as hospitals require large capital investments, and access to capital can be a useful indicator. Other sectors such as home health care do not need large capital investments, so access to capital is a more limited indicator. In some
cases, a broad measure such as changes in employment may be a useful indicator of financial health within a sector. Similarly, in sectors where providers derive most of their payments from other payers (such as ambulatory surgical centers) or other lines of business, or when conditions in the credit markets are extreme, access to capital may be a limited indicator of the adequacy of Medicare payments.

One indicator of a sector's access to capital is its allpayer profitability, reflecting income from all sources. We refer to this amount as the sector's all-payer margin, which is calculated as aggregate income, minus costs, divided by income. All-payer margins can inform our assessment of a sector's overall financial condition and hence its access to capital. All-payer margins in 2020 and 2021 reflect take-up of relief funds to the extent that they were included on providers' cost reports.

## Medicare payments and providers' costs

To maintain Medicare beneficiaries' access to high-quality care while keeping financial pressure on providers to make better use of taxpayers' and beneficiaries' resources, for most sectors we investigate whether payments are adequate to cover the costs of relatively efficient providers, where available data permit such providers to be defined.

Relatively efficient providers use fewer inputs to produce quality outputs. Efficiency is higher if the same inputs are used to produce a higher-quality output or if fewer inputs are used to produce the same-quality output. The Commission's approach is to develop a set of criteria and then examine how many providers meet those criteria. It does not establish a set share of providers to be considered efficient and then define criteria to meet that pool size.

For providers that submit cost reports to CMS-acute care hospitals, SNFs, home health agencies, outpatient dialysis facilities, IRFs, and hospices-we estimate total Medicare-allowable costs and assess the relationship between Medicare's payments and those costs in 2021 (2020 for hospices, due to data lags). We typically express the relationship between payments and costs as a Medicare aggregate margin, which is calculated as aggregate Medicare payments for a sector, minus costs, divided by Medicare payments. By this measure, if costs increase faster than payments, margins will decrease.

The coronavirus pandemic and PHE-related policy changes and their interactions have affected Medicare payments and providers' costs in several ways. For example, during the PHE, Medicare cost per case may have increased due to decreased volume and pandemic-related costs. Provider Relief Fund payments, if accepted, were intended to cover the costs associated with lower Medicare volume. However, relief funds are not counted as Medicare revenue because they are not specifically tied to Medicare per case payments. As a result, Medicare margins could appear lower than they would, all else equal, if relief fund revenue were considered as Medicare payment. In our analysis of Medicare payments, we calculate a Medicare aggregate margin exclusive of relief funds (and assuming all else equal) as well as a Medicare aggregate margin inclusive of relief funds. To make this latter calculation, for most sectors, we allocated to Medicare payments a portion of relief funds received by a provider, using measures of Medicare's market share in 2019 such as the ratio of Medicare to all-payer revenue.

## Use of Medicare aggregate margins

We assess the adequacy of Medicare payments relative to the costs of treating Medicare beneficiaries, and the Commission's recommendations address a sector's Medicare payments, not total payments. We calculate a sector's Medicare aggregate margin to determine whether total Medicare payments cover average providers' costs for treating Medicare patients and to inform our judgment about payment adequacy. ${ }^{5}$ Margins will always be distributed around the average, and a judgment of payment adequacy does not mean that every provider has a positive Medicare margin. To assess whether changes are needed in the distribution of payments, we calculate Medicare margins for certain subgroups of providers that have unique roles in the health care system or that receive special payments. For example, because location and teaching status enter into the payment formula used to pay acute care hospitals under the inpatient prospective payment systems (IPPS), we calculate Medicare margins based on where hospitals are located (in urban or rural areas) and their teaching status (major teaching, other teaching, or nonteaching).

In accordance with our authorizing statute, the Commission also, when feasible, computes a Medicare margin for efficient providers. ${ }^{6}$ The Commission
follows two principles when identifying a set of efficient providers. First, the providers must do relatively well on cost and quality metrics. Second, the performance must be consistent, meaning that the provider cannot have poor performance on any metric over the past three years. For example, in the hospital sector, the variables we use to identify relatively efficient hospitals are risk-adjusted all-condition mortality, risk-adjusted potentially preventable readmissions, and standardized inpatient Medicare costs per case. Our assessment of efficiency is not in absolute terms but, rather, relative to a comparison group-in this example, other IPPS hospitals. (We also make such assessments for the SNF, home health, and IRF sectors.) These assessments of efficient providers help us identify what may be a reasonable level of costs in a sector and hence the relationship between payments and costs that is needed to support Medicare beneficiaries' access to relatively high-quality care in that sector.

Multiple factors can contribute to changes in the Medicare margin, including changes in the efficiency of providers, changes in coding that may change payments, and other changes in the product (e.g., reduced lengths of stay at inpatient hospitals). Knowing whether these factors have contributed to margin changes may inform decisions about whether and how much to change base rate payment.

In sectors where the data are available, the Commission makes a judgment when assessing the adequacy of payments relative to costs. No single standard governs this relationship for all sectors, and margins are only one indicator for determining payment adequacy. Moreover, although payments can be ascertained with some accuracy, there may be no "true" value for reported costs, which reflect accounting choices made by providers (such as allocations of costs to different services) and the relationship of service volume to capacity in a given year. Further, even if costs are accurately reported, they reflect strategic investment decisions of individual providers, and Medicare-as a prudent payer-may choose not to recognize some of these costs or may exert financial pressure on providers to encourage them to reduce their costs.

## Appropriateness of current costs

Our assessment of the relationship between Medicare's payments and providers' costs is complicated by
differences in providers' efficiency, responses to changes in payment systems, product changes, and cost-reporting accuracy. Measuring the appropriateness of costs is particularly difficult in new payment systems because changes in response to the incentives in the new system are to be expected. In other systems, coding may change. As an example, the IPPS introduced a new patient classification system in 2008 to improve payment accuracy. However, for several years after its implementation, it resulted in higher payments because provider coding became more detailed, making patient complexity appear higher-although the underlying patient complexity was largely unchanged. Any kind of rapid change in policy, technology, or product can make it difficult to measure costs per unit.

To assess whether reported costs reflect the efficient provision of service, we examine recent trends in the average cost per unit, variation in standardized costs and cost growth, and evidence of change in the product. Our goal is to pay enough to provide access to high-quality care for Medicare patients. We do not seek to adjust Medicare payments if other payers underor overpay. For example, one issue Medicare faces is the extent to which private payers exert pressure on providers to constrain costs. If private payers do not exert pressure, providers' costs may increase and, all other things being equal, margins on Medicare patients would decrease.

Providers that are under pressure to constrain costs generally have managed to slow their growth in costs more than those who face less pressure (Medicare Payment Advisory Commission 2011, Robinson 2011, White and Wu 2014). Some have suggested that, in the hospital sector, costs are largely outside the control of hospitals and that hospitals shift costs onto private insurers to offset Medicare losses. This belief assumes that costs are immutable and not influenced by whether the hospital is under financial pressure. We find that costs do vary in response to financial pressure and that low margins on Medicare patients can result from a high cost structure that has developed in reaction to high private-payer rates. In other words, when providers (particularly nonprofit providers) receive high payment rates from insurers, they face less pressure to keep their costs low, and so, all other things being equal, their Medicare margins are low because
their costs are high. (For-profit providers may prefer to keep costs low to maximize returns to stockholders and, indeed, often have higher Medicare margins than similar nonprofit providers.)

Lack of pressure is more common in markets where a few providers dominate and have negotiating leverage over payers. This situation is becoming more common as providers continue to consolidate. We do not lower payments because of generous payments from private plans or raise them if other payers (for example, Medicaid) pay less. That said, we do recognize that access to care for Medicare beneficiaries will be affected by payment policies outside of Medicare. Moreover, we recognize that in some sectors, Medicare itself can, and should, exert greater pressure on providers to reduce costs.

Variation in cost growth among a sector's providers can give us insight into the range of performance that facilities can achieve. For example, if some providers' costs grow more rapidly than others in a sector, we might question whether those rapid increases are appropriate. Changes in product can also significantly affect unit costs. In home health care services, for instance, one would expect that substantial reductions in the number of visits per 30-day home health care period would reduce costs per period. If costs per period instead were to increase while the number of visits were to decrease, one would question the appropriateness of the cost growth and not increase Medicare payments in response.

In summary, Medicare payment policy should not be designed simply to accommodate whatever level of cost growth a sector demonstrates. Cost growth can oscillate from year to year depending on factors such as economic conditions and relative market power. Payment policy should accommodate cost growth only after considering a broad set of payment adequacy indicators, including the current level of Medicare payments.

## Considering anticipated payment and cost changes in 2023

For most payment sectors, we estimate Medicare payments and providers' costs for 2023 to inform our update recommendations for 2024.

In general, to estimate payments, we first apply the annual payment updates specified in law for 2022 and 2023 to our base data ( 2021 for most sectors). We then model the effects of other policy changes that will affect the level of payments in 2023. Estimated Medicare payments reflect current law and expected volume.

Next, for each sector, we review evidence about the factors that are expected to affect providers' costs. To estimate 2023 costs, we consider the rate of input price inflation or historical cost growth, and, as appropriate, we adjust for changes in the unit of service (such as fewer visits per episode of home health care) and trends in key indicators (such as changes in the distribution of cost growth among providers). When considering the change in input price inflation, we refer to the price index that CMS uses for that sector. (These indexes are estimated quarterly; we use the most recent estimate available when we do our analyses.) For each sector of facility providers (e.g., hospitals, SNFs), we start with the forecasted increase in a sector-specific index of national input prices, called a "market basket index." For physician services, we start with a CMS-derived weighted average of price changes for inputs used to provide physician services. Forecasts of these indexes approximate how much providers' costs are projected to change in the coming year if the quality and mix of inputs they use to furnish care remained constantthat is, if there were no change in efficiency. Other factors may include the trend in actual cost growth, which could be used to inform our estimate if it differs significantly from the projected market basket.

The Commission's payment update recommendations for 2024 reflect the most recent inflation and other data from 2021, preliminary data from 2022, and projections for 2023. If current projections of input inflation and hospital costs turn out to be inaccurate, these discrepancies will be accounted for in our assessment of payment adequacy in our next recommendation cycle.

## Recommending how Medicare payments should change in 2024

The Commission's judgments about payment adequacy, forthcoming policy changes, and expected cost
changes result in an update recommendation for each payment system. An update is the amount (usually expressed as a percentage change) by which the base payment for all providers in a payment system is changed relative to the prior year. In considering updates, the Commission makes its recommendations for 2024 relative to the 2023 base payment as defined in Medicare's authorizing statute-Title XVIII of the Social Security Act. The Commission's recommendations may call for an increase, a decrease, or no change from the 2023 base payment. For example, if the statutory base payment for a sector were $\$ 100$ in 2023, an update recommendation of a 1 percent increase for a sector means that we are recommending that the base payment in 2024 for that sector be 1 percent greater, or $\$ 101$. If the Congress or the Secretary does not adopt the Commission's recommendation for a payment update, current law will continue to apply unless other actions are taken.

When our recommendations differ from current law or regulation, as they often do, the Congress and the Secretary of Health and Human Services would have to act and change law or regulation to put them into effect. Each year, we look at all available indicators of payment adequacy and reevaluate prior-year assumptions using the most recent data available. The Commission does not start with any presumption that an update is needed or that any increase in costs should be automatically offset by a payment update. Instead, an update (which may be positive, zero, or negative) is warranted only if it is supported by the empirical data, in the judgment of the Commission.

In conjunction with the update recommendations, we may also make recommendations to improve payment accuracy that might in turn affect the distribution of payments among providers. These distributional changes are sometimes, but not always, budget neutral. Our recommendation to shift payment weights from therapy to medically complex skilled nursing facility (SNF) cases is one example of a distributional change that affects providers differentially based on their patients' characteristics (Medicare Payment Advisory Commission 2016a).

The Commission, as it makes its update recommendations, may in some cases take into consideration payment differentials across sectors and make sure the relative update recommendations for
the sectors do not exacerbate existing incentives for providers to choose a site of care based on payment considerations. The difficulty of harmonizing payments across sectors to remove inappropriate incentives illustrates one weakness of FFS payment systems specific to each provider type and highlights the importance of moving beyond FFS to more global and patient-centric payment systems. As we continue to support moving Medicare payment systems toward those approaches, we will also continue to look for opportunities to rationalize payments for specific services across sectors to approximate paying the costs of the most efficient sector and lessen financial incentives that reward one sector over another.

## Consistent payment for the same service across settings

A beneficiary can sometimes receive a similar service in different settings. Depending on which setting the beneficiary or the treating clinician chooses, Medicare and the beneficiary may pay different amounts. For example, when leaving the hospital, patients with joint replacements who require physical therapy might be discharged with home health care or outpatient therapy, or they might be discharged to a SNF or IRF, and Medicare payments (and beneficiary cost sharing) would differ widely as a result.

A core principle guiding the Commission is that Medicare should pay the same amount for the same service, even when it is provided in different settings. Putting this principle into practice requires that the definition of services in the settings and the characteristics of the patients be sufficiently similar. Where these conditions are not met, offsetting adjustments would have to be made to ensure comparability. Because Medicare's payment systems were developed independently and have had different update trajectories, payments for similar services can vary widely. Such differences create opportunities for Medicare and beneficiary savings if payment is set at the level applicable to the lowest-priced setting in which the service can be safely performed. For example, under the current payment systems, a beneficiary can receive the same physician visit service in a hospital outpatient clinic or in a physician's office. In fact, the same physician could see the same patient and provide the same service but, depending on whether the service is provided in an outpatient clinic
or in a physician's office, Medicare's payment and the beneficiary's coinsurance can differ by 80 percent or more.

In 2012, the Commission recommended that payments for $\mathrm{E} \& \mathrm{M}$ office visits in the outpatient and physician office sectors be made equal, recognizing that those services are comparable across the two settings. Specifically, we recommended setting payment rates for E\&M office visits both in the outpatient department and physician office sectors equal to those in the physician fee schedule, lowering both program spending and beneficiary liability (Medicare Payment Advisory Commission 2012). In 2014, we extended that principle to additional services for which payment rates in the outpatient PPS should be lowered to better match payment rates in the physician office setting (Medicare Payment Advisory Commission 2014). In the Bipartisan Budget Act of 2015, the Congress made payment for outpatient departments for the same services equal to the physician fee schedule rates for those services at any new outpatient off-campus clinic beginning in 2018. We also recommended consistent payment between acute care hospitals and long-term care hospitals for certain categories of patients, and the Congress enacted a similar reform in the Pathway to SGR Reform Act of 2013 (Medicare Payment Advisory Commission 2014). In 2016, we recommended elements of a unified PAC PPS that would make payments based on patients' needs and characteristics, generally irrespective of the PAC entity that provides their care (Medicare Payment Advisory Commission 2016a). The Commission is continuing to study the circumstances when it is reasonable to align FFS payment rates for the same service provided at different sites of care.

## Budgetary consequences

The Medicare Prescription Drug, Improvement, and Modernization Act of 2003 requires the Commission to consider the budgetary consequences of our recommendations. Therefore, this report documents how spending for each recommendation would compare with expected spending under current law. We also assess the effects of our recommendations on beneficiaries and providers. Although we recognize budgetary consequences, our recommendations are not driven by any specific budget target but instead reflect our assessment of the level of payment that
efficient providers would need to ensure adequate beneficiary access to appropriate care.

## Payment adequacy in context

As discussed in Chapter 1, it is essential to look at payment adequacy not only within the context of individual payment systems but also in terms of Medicare as a whole. The Commission is concerned by any increase in Medicare spending per beneficiary without a commensurate increase in value such as through higher quality of care or improved health status. Growth in spending per beneficiary, combined with the aging of the baby boomers, will result in the Medicare program absorbing increasing shares of the gross domestic product and federal spending. Medicare's rising costs are projected to exhaust the Hospital Insurance Trust Fund (which funds Medicare Part A) and significantly burden taxpayers. Therefore, moderating growth trends in Medicare spending per beneficiary is necessary and will require vigilance. The financial future of Medicare prompts us to look at payment policy and ask what can be done to develop, implement, and refine payment systems to reward quality and efficient use of resources while improving payment equity.

In many past reports, the Commission has stated that Medicare should institute policies that improve the program's value to beneficiaries and taxpayers. CMS has taken such steps, and we discuss them in the sector-specific chapters that follow. Ultimately, increasing Medicare's value to beneficiaries and taxpayers requires knowledge about the costs and health outcomes of services. Until more information about the comparative effectiveness of new and existing health care treatments and technologies is available, patients, providers, and the program will have difficulty determining what constitutes high-quality care and effective use of resources.

As we examine each of the payment systems, we also look for opportunities to develop policies that create incentives for providing high-quality care efficiently across providers and over time. Some of the current payment systems create strong incentives for increasing volume, and very few of these systems encourage providers to work together
toward common goals. Alternative payment models are meant to stimulate delivery system reform toward more integrated and value-oriented health care systems and may address these issues. In the near term, the Commission will continue to closely examine a broad set of indicators, make sure there is consistent pressure on providers to control their costs, and set a demanding standard for determining which sectors qualify for a payment update each year. In the longer term, pressure on providers may cause them to increase their participation in alternative payment models. We will continue to contribute to the development of those models and to increase their efficacy.

## Endnotes

1 Since CMS began to phase in significant changes to the LTCH PPS in 2016, the number of LTCHs, the number of beneficiaries receiving LTCH services, and Medicare spending on LTCH care have declined considerably. This was the anticipated result of the dual payment-rate system for LTCHs, which mandates higher LTCH payment rates only for cases with an immediately preceding acute care hospital stay or for cases receiving prolonged mechanical ventilation.

2 The Secretary of Health and Human Services may determine that a disease or disorder presents a PHE or that a PHE otherwise exists (Office of the Assistant Secretary for Preparedness and Response 2021).

3 We addressed these temporary telehealth expansions in our March 2021 report, noting that policymakers should use data collected during the PHE before deciding whether any permanent policy changes should be implemented and should consider the effects on access, quality, and cost (Medicare Payment Advisory Commission 2021b).

4 The timing of cost reports affects our analysis of the impact of the PHE on providers' costs and Medicare's payments, especially in 2020.

5 In most cases, we assess Medicare margins for the services furnished in a single sector (e.g., SNF or home health care services) and covered by a specific payment system. However, in the case of hospitals, which often provide services that are paid for by multiple Medicare payment systems, our
measures of payments and costs for an individual sector could become distorted because of the allocation of overhead costs or the presence of complementary services. For example, having a hospital-based SNF or IRF may allow a hospital to achieve shorter lengths of stay in its acute care units, thereby decreasing costs and increasing inpatient margins. For hospitals, we assess the adequacy of payments for the whole range of Medicare services they furnishinpatient and outpatient (which together account for about 90 percent of Medicare payments to hospitals), SNF, home health care, psychiatric, and rehabilitation services-and compute an overall Medicare hospital margin encompassing costs and payments for all the sectors. The hospital update recommendation in Chapter 3 applies to hospital inpatient and outpatient payments; the updates for other distinct units of the hospital, such as SNFs, are covered in separate chapters.

6 Section 1805[11] of the Social Security Act [42 U.S.C. 1395b-6]:
"Specifically, the Commission shall review payment policies under parts $A$ and $B$, including-
(i) the factors affecting expenditures for the efficient provision of services in different sectors, including the process for updating hospital, skilled nursing facility, physician, and other fees, (ii) payment methodologies, and (iii) their relationship to access and quality of care for Medicare beneficiaries."

## References

Appleby, J. 2018. 'Holy cow' moment changes how Montana's state health plan does business. Kaiser Health News, June 20.

Berenson, R. A., J. H. Sunshine, D. Helms, et al. 2015. Why Medicare Advantage plans pay hospitals traditional Medicare prices. Health Affairs 34, no. 8 (August): 1289-1295.

Brunt, C. S., J. R. Hendrickson. 2021. Geographic variation in Part B reimbursement and physician offsetting behavior: A physician matching approach. International Journal of Health Economics and Management 21, no. 2 (June): 115-188.

Carlton, S., J. Kahn, and M. Lee. 2021. Cascade Select: Insights from Washington's public option. Health Affairs blog, August 30. https://www.healthaffairs.org/do/10.1377/ forefront.20210819.347789.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2021. COVID-19 experiences among the Medicare population: Winter 2021. https://www.cms.gov/files/ document/medicare-current-beneficiary-survey-covid-19-data-snapshot-infographic-winter-2021.pdf.

Clemens, J., and J. D. Gottlieb. 2014. Do physicians' financial incentives affect medical treatment and patient health? American Economic Review 104, no. 4 (April): 1320-1349.

Congressional Budget Office. 2020. How CBO analyzes the costs of proposals for single-payer health care systems that are based on Medicare's fee-for-service program. Washington, DC: CBO.

Czeisler, M. E., K. Marynak, K. E. N. Clarke, et al. 2020. Delay or avoidance of medical care because of COVID-19-related concerns - United States, June 2020. Morbidity and Mortality Weekly Report 69, no. 36 (September 11): 1250-1257.

Department of Veterans Affairs. 2019. Veterans Community Care Program. Federal Register 84, no. 108 (June 5): 26278-26310.

Maeda, J., and L. Nelson. 2017. An analysis of private-sector prices for hospital admissions. Congressional Budget Office working paper 2017-02. Washington, DC: CBO.

Medicaid and CHIP Payment and Access Commission. 2019. Report to the Congress on Medicaid and CHIP. Chapter 2: Oversight of upper payment limit supplemental payments to hospitals. Washington, DC: MACPAC.

Medicaid and CHIP Payment and Access Commission. 2016. Report to Congress on Medicaid disproportionate share hospital payments. Washington, DC: MACPAC.

Medicare Payment Advisory Commission. 2021a. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021b. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2020. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2019. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2018. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2016a. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2016b. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2014. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2012. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2011. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Mitchell, J. M., J. Hadley, and D. J. Gaskin. 2002. Spillover effects of Medicare fee reductions: Evidence from ophthalmology. International Journal of Health Care Finance and Economics 2, no. 3 (September): 171-188.

Office of the Assistant Secretary for Preparedness and Response, Department of Health and Human Services. 2021. Renewal of determination that a public health emergency exists. https:// www.phe.gov/emergency/news/healthactions/phe/Pages/ COVID-15April2021.aspx.

Podulka, J., and J. Blum. 2020. Regulatory changes to Medicare in response to COVID-19. Issue brief. Washington, DC:
Commonwealth Fund. https://www.commonwealthfund.org/ publications/issue-briefs/2020/aug/regulatory-changes-medicare-response-covid-19.

Robinson, J. 2011. Hospitals respond to Medicare payment shortfalls by both shifting costs and cutting them, based on market concentration. Health Affairs 30, no. 7 (July): 1265-1271.

White, C., and V. Y. Wu. 2014. How do hospitals cope with sustained slow growth in Medicare prices? Health Services Research 49, no. 1 (February): 11-31.

> CHAPTER

Hospital inpatient and outpatient services

## R E C O M M E N D A T I O N S

3-1 For fiscal year 2024, the Congress should update the 2023 Medicare base payment rates for general acute care hospitals by the amount specified in current law plus 1 percent.

COMMISSIONER VOTES: YES 17 • NO O - NOT VOTING O • ABSENT 0

3-2 In fiscal year 2024, the Congress should:

- begin a transition to redistribute disproportionate share hospital and uncompensated care payments through the Medicare Safety-Net Index (MSNI);
- add $\$ 2$ billion to the MSNI pool;
- scale fee-for-service MSNI payments in proportion to each hospital's MSNI and distribute the funds through a percentage add-on to payments under the inpatient and outpatient prospective payment systems; and
- pay commensurate MSNI amounts for services furnished to Medicare Advantage (MA) enrollees directly to hospitals and exclude them from MA benchmarks.


## Hospital inpatient and outpatient services

## Chapter summary

General acute care hospitals (ACHs) primarily provide inpatient care and various outpatient services. To pay these hospitals for their facility costs, fee-for-service (FFS) Medicare generally sets prospective payment rates under the inpatient prospective payment systems (IPPS) and the outpatient prospective payment system (OPPS). In 2021, the FFS Medicare program and its beneficiaries paid general acute care hospitals \$182.5 billion for inpatient and outpatient services under the IPPS and OPPS, including $\$ 8.3$ billion in uncompensated care payments made under the IPPS.

## Assessment of payment adequacy

In 2021, most indicators of hospital payment adequacy remained positive or improved. However, indicators continued to vary substantially across hospitals, and some indicators remained below prepandemic levels. In 2022, input cost increases for hospitals were higher and more volatile than they have been in recent years.

Beneficiaries' access to care-In 2021 and 2022, the number of general ACHs that closed was the same as the number that opened, hospitals continued to have excess capacity in aggregate, and those with excess capacity continued to have a financial incentive to serve FFS Medicare

## In this chapter

- Are Medicare payments adequate in 2023?
- How should Medicare payments change in 2024 ?
- Supporting Medicare safety-net hospitals
- Appendix: Supplemental information on the Medicare Safety-Net Index
beneficiaries. However, some hospitals faced occupancy and staffing constraints at times. In 2021, IPPS hospitals' marginal profit on IPPS and OPPS services (a measure of whether providers have a financial incentive to expand the number of Medicare beneficiaries they serve) was about 8 percent, which is similar to prepandemic levels.

Quality of care-In 2021, FFS beneficiaries' risk-adjusted hospital readmission rate improved relative to 2019. However, the risk-adjusted hospital mortality rate remained higher than in 2019, and most patient experience measures declined.

Providers' access to capital-Hospitals' access to capital strengthened in 2021, as IPPS hospitals' all-payer operating margin reached a record high of 8.7 percent. However, there was substantial variation in margins across hospitals. Preliminary data indicate that 2022 all-payer operating margins declined relative to 2021 and were mixed relative to prepandemic levels, but most hospitals continued to have strong access to bond markets.

Medicare payments and providers' costs-In 2021, Medicare's payments to hospitals continued to be below hospitals' costs in aggregate but near costs among relatively efficient hospitals and higher than in 2020. IPPS hospitals' Medicare margin increased in 2021 to -6.2 percent when including a share of federal relief funds ( -8.3 percent exclusive of these funds), and the median Medicare margin for relatively efficient hospitals increased to 1 percent (near break-even exclusive of federal relief funds). However, we project that hospitals' Medicare margins in 2023 will be lower than in 2021, driven in part by growth in hospitals' input costs, which exceeded the forecasts CMS used to set Medicare payment rate updates, and in part by the expected expiration of federal relief funds and temporary Medicare payment increases related to the public health emergency. These federal relief funds and Medicare payment increases exceeded hospitals' additional costs related to coronavirus disease 2019 (COVID-19). We anticipate that reductions in net revenue will be partially offset by other factors, including (1) reductions in hospitals' costs related to COVID-19, as cases decline and hospitals become better at managing the disease; and (2) the statutory 0.5 percent increase to inpatient operating payments to remove prior temporary reductions for past documentation and coding changes. We estimate that IPPS hospitals' Medicare margin will decrease in 2023 to about -10 percent (similar to the level in 2017) and that the median Medicare margin for relatively efficient hospitals will decrease to modestly below break-even-similar to prepandemic levels.

## How should Medicare payments change in 2024?

The current-law updates to payment rates for 2024 will not be finalized until summer 2023, but CMS's third-quarter 2022 forecasts would result in the IPPS operating base payment rate and OPPS base payment rate increasing by 2.9 percent and the IPPS capital base payment rate increasing by 2.4 percent.

The Commission anticipates that a 2024 update to hospital payment rates of current law plus 1 percent would generally be adequate to maintain FFS beneficiaries' access to hospital inpatient and outpatient care and keep IPPS and OPPS payment rates close to the cost of delivering high-quality care efficiently. The Commission's payment update recommendation for 2024 reflects the most recent inflation and other data from 2021, preliminary data from 2022, and projections for 2023. If current projections of input inflation and hospital costs turn out to be inaccurate, these discrepancies will be accounted for in our assessment of payment adequacy in our next recommendation cycle.

## Supporting Medicare safety-net hospitals

The recommended update to IPPS and OPPS payment rates of current law plus 1 percent may not be sufficient to ensure the financial viability of some Medicare safety-net hospitals with a poor payer mix. As the Medicare program strives to ensure access to care for all beneficiaries and adequately pay providers for that access, additional Medicare payments to Medicare safety-net providers are warranted. Medicare already provides substantial safety-net funding to hospitals, but there are several problems with the way Medicare distributes these funds, including omitting a hospital's Medicare share from its funding formulas in favor of subsidizing Medicaid payments, making supplemental payments only for inpatient services, and having an uncompensated care payment formula that favors hospitals with few FFS Medicare patients. The Commission's view is that Medicare safety-net payments should be used primarily to support Medicare safety-net hospitals-those that provide care to large shares of low-income Medicare beneficiaries. We note that this definition of "safety-net hospital" is Medicare-centric by design; safety-net definitions used by Medicaid and other payers would likely differ.

The Commission recommends redistributing the current Medicare safetynet payments (disproportionate share hospital and uncompensated care payments) using the Commission-developed Medicare Safety-Net Index (MSNI) for hospitals. Implementation of this index would better target scarce Medicare resources to support hospitals that are key sources of care for low-
income Medicare beneficiaries and may be at risk of closure. In addition to the redistribution, the Commission recommends adding \$2 billion to this MSNI pool of funds to help maintain the financial viability of Medicare safety-net hospitals. The FFS portion of the MSNI pool of funds should be distributed to hospitals as add-on payments to Medicare's IPPS and OPPS payments, with commensurate add-on amounts made to hospitals treating Medicare Advantage enrollees.

While most hospitals will see increases in Medicare revenue due to the $\$ 2$ billion in additional Medicare safety-net spending, there are some hospitals that will see reductions. Material reductions in Medicare revenue could occur for hospitals that currently receive high Medicare uncompensated care payments but serve relatively few FFS Medicare patients. In light of these effects, the Congress could phase in the policy for all hospitals over a set period of time (i.e., transition to the MSNI policy over three to five years). Alternatively, a transition could be managed through a stop-loss policy so that no hospital would experience changes (positive or negative) in Medicare payments of more than 5 percent in any one year due to the transition to the MSNI. Both approaches would also allow time for the hospitals facing the most substantial revenue reductions to try to augment revenues from existing sources and request additional financial support from state and local governments, as warranted. To the extent that these hospitals have high cost structures, a transition also would allow time to improve efficiencies.

## Background

General acute care hospitals (ACHs) primarily provide inpatient care and various outpatient services. To pay these hospitals for their facility costs, fee-for-service (FFS) Medicare generally sets prospective payment rates under the inpatient prospective payment systems (IPPS) and outpatient prospective payment system (OPPS). ${ }^{1}$ (Clinicians who provide services at hospitals are paid separately under the physician fee schedule; Medicare also pays separately for certain hospital units and costs. ${ }^{2}$ ) In setting these prospective rates per inpatient stay or primary outpatient service, CMS adjusts IPPS and OPPS national base payment rates for factors outside of hospitals' control, such as regional wage rates and patient characteristics. Both the IPPS and OPPS also include separate payments not tied to the base payment rates. The IPPS includes uncompensated care payments to help support hospitals' costs of treating the uninsured. The OPPS sets payments for drugs that exceed a cost threshold based on the manufacturer's average sales price. In 2021, the FFS Medicare program and its beneficiaries paid general ACHs $\$ 182.5$ billion for inpatient and
outpatient services under the IPPS and OPPS, including $\$ 8.3$ billion in uncompensated care payments and $\$ 16.4$ billion for separately payable drugs (Table 3-1). ${ }^{3,4}$

Medicare uses different payment methodologies to reimburse certain other general ACHs for their facility costs of providing inpatient and outpatient services to FFS beneficiaries. Most notably, Medicare has designated about 1,350 small rural hospitals as critical access hospitals (CAHs) and pays these hospitals based on their costs. ${ }^{5}$ There are also about 50 general ACHs in Maryland that Medicare pays based on an all-payer global budget. These payment methodologies are beyond the scope of this chapter.

The IPPS and OPPS payment rates affect more than FFS Medicare payments for general ACHs. Within the FFS Medicare program, the OPPS is used to pay for outpatient services at certain specialty hospitals and other facilities. ${ }^{6}$ But more importantly, most Medicare Advantage plans pay IPPS hospitals using rates benchmarked to FFS Medicare rates (Berenson et al. 2015, Maeda and Nelson 2017). In addition, other payers-such as the Department of Veterans Affairs, certain state employee health plans, and some state
 provided to FFS beneficiaries under the IPPS and OPPS, 2021

| Medicare payment system | Number of <br> hospitals | Number of <br> FFS users <br> (in millions) | Number of FFS <br> inpatient stays or <br> outpatient services <br> (in millions) | Payments <br> (in billions) |
| :--- | :---: | :---: | :---: | :---: |
| IPPS—Inpatient stays | 3,170 | 4.6 | 7.1 | $\$ 107.9$ |
| IPPS—Uncompensated care | 2,640 | $\mathrm{~N} / \mathrm{A}$ | $\mathrm{N} / \mathrm{A}$ | 8.3 |
| OPPS—Outpatient services | 3,370 | 17.1 | 135.7 | 49.9 |
| OPPS—Separately payable drugs |  |  | 16.4 |  |
| Total |  | 182.5 |  |  |

[^1]Source: MedPAC analysis of Medicare Provider Analysis and Review data, IPPS final rule, and outpatient claims.
public option plans-also set hospitals' rates based on FFS Medicare payments (Government Accountability Office 2013, Schramm and Aters 2021, Scott 2021). Given the widespread use of FFS Medicare payment rates as a benchmark, any update to the Medicare base payment amount will affect many other payers (White et al. 2013).

## Are Medicare payments adequate in 2023?

In 2021-the most recent year of data for most of our measures-most hospital payment adequacy indicators remained positive or improved, despite the continued coronavirus pandemic. In particular, the number of general ACHs that closed was the same as the number that opened; IPPS hospitals' all-payer operating margin increased to a record high of 8.7 percent; and the median Medicare margin for relatively efficient hospitals increased to near break-even, exclusive of Medicare's share of federal relief funds, and remained at 1 percent when including these funds.

However, hospital payment adequacy indicators continued to vary substantially across hospitals, and some indicators remained below prepandemic levels. For example, some hospitals faced capacity and staffing constraints at times. In addition, FFS beneficiaries' riskadjusted hospital mortality rate remained higher than the rate in 2019.

In addition, in 2022, input cost increases for hospitals were higher and more volatile than they have been in recent years. Preliminary data from 2022 suggest that hospital margins were lower in 2022 than in 2021, driven in part by higher-than-expected input costs.

For 2023, we project IPPS hospitals' Medicare margin will decrease to about -10 percent (similar to the level in 2017), and the median Medicare margin for relatively efficient hospitals will decline to modestly below break-even, similar to prepandemic levels.

## Beneficiaries maintained good access to hospital inpatient and outpatient services, but some hospitals faced constraints at times

FFS Medicare beneficiaries maintained good access to inpatient and outpatient services at general ACHs:

The number of general ACHs that closed was the same as the number that opened in both 2021 and 2022, hospitals continued to have excess capacity in aggregate, and those with excess capacity continued to have a financial incentive to serve FFS beneficiaries. ${ }^{7}$ However, some hospitals faced occupancy and staffing constraints at times.

Hospital care also accelerated its shift from inpatient to outpatient settings. In 2021, inpatient stays per FFS beneficiary declined, remaining below the prepandemic trend, while the number of hospital outpatient services per FFS beneficiary increased, reaching prepandemic levels.

## Supply of hospitals has been steady

In both fiscal years 2021 and 2022, the number of general ACHs that closed was the same as the number that opened: 11 in 2021 and 16 in 2022. ${ }^{8}$ The number of closures was substantially below the levels in 2019 (46) and 2020 (25) and comparable with the number in 2017 and 2018. In contrast, from 2017 through 2022, the number of hospital openings was steadier, ranging from 8 to 18 openings.

Of the 16 hospitals that closed and the 16 that opened in fiscal year 2022, most shared several characteristics. ${ }^{9}$ All were IPPS hospitals, most were in metropolitan areas ( 12 of 16 closures and 13 of 16 openings), and the majority had 100 or fewer beds ( 9 of 16 closures and 11 of 16 openings). In addition, almost all the closures (14 of 16) were within 25 miles of the next nearest hospital, suggesting that most beneficiaries continued to have access to inpatient and emergency services in their region, but some may have faced moderately longer travel times.

Medicare's payment policies were not a main contributor to the financial difficulties of the hospitals that closed. Rather, many hospitals that closed in 2022 cited other financial reasons, such as failing to secure a buyer or low patient volume, as a driving factor for the closure. Rural hospitals often face the greatest challenges with declining admissions, in part due to rural beneficiaries increasingly bypassing their local hospitals to seek care at urban hospitals. However, as the Rural Emergency Hospital (REH) designation began on January 1, 2023, some rural hospitals in financial distress may choose to convert to REHs rather than cease providing all services. ${ }^{10}$


Note: Data are for general acute care hospitals that had a cost report with a midpoint in the fiscal year and the report was complete as of our analysis.
Source: MedPAC analysis of hospital cost report data.

## Hospitals had excess inpatient capacity in aggregate and increased staff in 2021, but some hospitals faced capacity and staffing constraints at times

General ACHs continued to have excess inpatient capacity in aggregate, with about 65 percent of all bed-days occupied during fiscal year 2021, slightly higher than in prior years (Figure 3-1). This increased occupancy resulted from an increase in inpatient days and a decrease in staffed inpatient beds.

However, inpatient capacity continued to vary substantially across hospitals (Figure 3-1). For example, in 2021, 5 percent of hospitals had occupancy rates of over 85 percent, which was slightly higher than prior years. Moreover, as hospitals' occupancy rates varied throughout the year, many of these hospitals likely neared or exceeded their capacity at times, and preliminary data suggest that more hospitals exceeded
their capacity at times during 2022. ${ }^{11}$ At the other extreme, a quarter of hospitals had an occupancy rate of less than 30 percent, and 5 percent had occupancy rates below 15 percent, consistent with prior years. Some of these hospitals, which tended to be small and rural, may not have sufficient inpatient volume to maintain inpatient services, suggesting that they could be good candidates for the new Medicare REH designation.

Another component of hospitals' capacity is their staffing level, which increased slightly in 2021 but was still below prepandemic trends. Prior to the pandemic, hospital employment had been increasing by about 1 percent a year; employment then declined by over 1 percent in fiscal year 2020 and recovered about half of this reduced employment in 2021.

Despite this modest increase in hospital employment, some hospitals reported critical staffing shortages at

## Some hospitals reported critical staffing shortages at times in fiscal year 2021 and, to a lesser extent, in 2022



Note: Hospitals report critical staffing shortages to the Department of Health and Human Services based on their own individual facility needs and staffing ratio policies. The use of temporary staff does not automatically count as having a staffing shortage. Data include all general acute care hospitals and certain specialty hospitals and units.

Source: MedPAC analysis of healthdata.gov hospital capacity data.
times during fiscal year 2021 and, to a lesser extent, in 2022 (Figure 3-2). Throughout fiscal year 2021, hospitals reported a critical staffing shortage for over 10 percent of all hospital days. The share of hospital days with a critical staffing shortage was higher at the start and end of 2021, exceeding 15 percent in aggregate and over 30 percent in some states. Anecdotal reports suggest that these staffing shortages caused some hospitals to temporarily close their emergency departments or intensive care units and to postpone or delay certain services such as surgeries. To address these staffing shortages, many hospitals have increased their use of travel nurses (Adegbesan 2022). However, in fiscal year 2022, reported critical staffing shortages declined; hospitals reported a critical staffing shortage for around 5 percent of all hospital days since March 2022.

## Hospitals with excess capacity continued to have a financial incentive to provide inpatient and outpatient services to FFS beneficiaries

In 2021, IPPS hospitals' marginal profit on IPPS and OPPS services was about 8 percent-similar to prepandemic levels. We calculate hospitals' Medicare marginal profit by comparing Medicare's IPPS and OPPS payments with the variable cost of treating an additional FFS Medicare patient. To make a conservative estimate of hospitals' Medicare marginal profit, we use a broad definition of variable costs that is consistent with our prior estimates of the share of costs that varied over a one-year period. We have found that roughly 80 percent of costs are variable, including in 2021; to the extent that a higher share of hospitals' costs are fixed, the marginal profit would be higher.

In 2021, FFS beneficiaries' inpatient stays at general acute care hospitals declined, remaining well below the prepandemic trend


Note: FFS (fee-for-service). Analysis includes FFS Medicare beneficiaries' stays at hospitals paid under the inpatient prospective payment systems, critical access hospitals, and acute care hospitals in Maryland and U.S. territories.

Source: MedPAC analysis of Medicare Provider Analysis and Review data and the Medicare Trustees report.

As we noted last year, the rapid response to the coronavirus pandemic has demonstrated that-in response to lower volumes-many hospitals can substantially lower their costs over a matter of months. We expect that hospitals will have an even greater ability to adjust costs to patient volume when they have a longer period to adjust to environmental changes and the resulting long-term changes in volume that can be anticipated.

## In 2021, FFS beneficiaries' inpatient stays declined, though their average length of stay increased

From 2020 to 2021, the number of inpatient stays by FFS Medicare beneficiaries at general ACHs declined by 6.1 percent to 7.4 million stays (Figure 3-3, left panel). Controlling for the number of FFS beneficiaries, the number of inpatient stays declined by 1.8 percent, to 208 stays per 1,000 FFS beneficiaries (Figure 3-3, right panel). ${ }^{12}$ Inpatient stays per beneficiary were relatively
steady throughout 2021, at a level similar to the end of fiscal year 2020 (data not shown).

In contrast to the decline in the number of inpatient stays per FFS beneficiary, in 2021, FFS beneficiaries' average length of stay increased by 6.1 percent to 5.5 days (Figure 3-4, p. 64, left panel). The increase in the average length of stay was driven by a 7.3 percent decrease in stays of 2 to 3 days and a 9.9 percent increase in stays of longer than one week (Figure $3-4$, p. 64 , right panel). The increase in length of stay was even larger in stays of over two weeks ( 17.7 percent) and over two months (19.9 percent) (data not shown). Collectively, the decline in inpatient stays per beneficiary and the increase in average length of stay resulted in the total number of days per beneficiary rebounding to near the prepandemic trend.

From 2020 to 2021, the combination of the accelerated drop in inpatient stays per FFS beneficiary and the rise

In 2021, FFS beneficiaries' average length of stay at general acute care hospitals increased, driven by increase in stays of over 1 week


Note: FFS (fee-for-service). Data include FFS Medicare beneficiaries' stays at hospitals paid under the inpatient prospective payment systems, critical access hospitals, and acute care hospitals in Maryland and U.S. territories.

Source: MedPAC analysis of Medicare Provider Analysis and Review data and the Medicare Trustees report.
in average length of stay was driven by the acceleration of two trends related to the shift of certain care from inpatient to outpatient settings:

## - Accelerated decline in less resource-intensive

 inpatient stays and increase in more resourceintensive inpatient stays. From 2020 to 2021, the number of inpatient stays per FFS beneficiary with a Medicare severity-diagnosis related group (MS-DRG) weight of less than 1 declined by 12.3 percent, about twice as fast as prepandemic trends (Figure 3-5, left panel). (The MS-DRG weight reflects CMS's estimate of the relative average resource intensity of a type of stay. In 2021, the most common FFS Medicare inpatient stays with a weight of less than 1 were those for gastrointestinal hemorrhage, esophagitis without major complications or comorbidities (MCCs), and kidney and urinary tract infections without MCCs.) These less resource-intensive conditions can increasingly be treated in hospital outpatientsettings. In contrast, from 2020 to 2021, the number of inpatient stays per beneficiary with a resource weight of greater than 3 increased by 4 percent. (In 2021, the most common FFS inpatient stays with a weight of greater than 3 were stays for infectious diseases with operating room procedures and MCCs, septicemia or severe sepsis with mechanical ventilation for more than 96 hours, and percutaneous cardiovascular procedures with drug-eluting stents and MCCs.)

- Accelerated decline in short inpatient stays for musculoskeletal conditions and an increase in long stays for respiratory conditions. From 2020 to 2021, the number of inpatient stays per FFS beneficiary for musculoskeletal conditions, such as joint replacements, declined 14.5 percent, about four times faster than before the pandemic (Figure $3-5$, right panel). The decline was over three times larger ( -50.5 percent) among the most common type of musculoskeletal stay-major hip or knee

Increasingly, fewer FFS beneficiaries' inpatient stays are for low resource-intensive and musculoskeletal conditions


Note: FFS (fee-for-service). Data include FFS Medicare beneficiaries' stays at hospitals paid under the inpatient prospective payment systems (IPPS), critical access hospitals, and acute care hospitals in Maryland and U.S. territories. Resource weight refers to the diagnosis-related group weight used in the IPPS. Right panel shows the four most common major diagnostic categories in 2021.

Source: MedPAC analysis of Medicare Provider Analysis and Review data and the Medicare Trustees report.
joint replacement without MCCs-which had an average length of stay of two days. Increasingly, these procedures can be safely provided in outpatient settings. In contrast, the number of inpatient stays per beneficiary for respiratory conditions, including COVID-19, increased 11.2 percent. The increase was nearly 14 times larger (156 percent) among the most common type of respiratory stay, respiratory infections and inflammations with MCC, which had an average length of stay of 7 days.

Some of the increase in average length of stay may also stem from staffing constraints at skilled nursing facilities that limited hospitals' ability to discharge patients to post-acute care facilities.

Preliminary data for 2022 suggest that the number of inpatient stays per FFS beneficiary declined at a faster rate than in 2021 and that growth in average length of stay slowed.

## In 2021, FFS beneficiaries' hospital outpatient services increased, with services per beneficiary reaching prepandemic levels

From 2020 to 2021, the number of FFS beneficiaries' hospital outpatient services at hospitals covered under the OPPS, CAHs, and Maryland hospitals increased by 12.9 percent to 159 million (Figure 3-6, p. 66, left panel). Controlling for the number of FFS beneficiaries, the number of hospital outpatient services climbed 18.1 percent to 5.2 services per beneficiary (Figure 3-6, p. 66 , right panel). The volume of outpatient services was lower in January 2021 and February 2021 relative to the rest of the calendar year. From March 2021 through December 2021, outpatient volume was steady.

This increase in FFS Medicare beneficiaries' outpatient hospital services per beneficiary was primarily driven by increases in:

- COVID-19-related services. In 2021, there were 9.7 million services, or 0.3 per beneficiary, for COVID-19-related care, including vaccine administration, per beneficiary increased, the latter nearing prepandemic levels


Note: FFS (fee-for-service). Data include FFS Medicare beneficiaries' outpatient services at hospitals paid under the outpatient prospective payment system, critical access hospitals, and acute care hospitals in Maryland.

Source: MedPAC analysis of outpatient claims data and the Medicare Trustees report.
specimen collection, and chest X-rays. Since many of these services were new, arising from the coronavirus pandemic, the levels were above 2019 levels.

- Clinic services. In 2021, there was a 3.4 million increase in clinic services, or 0.9 increase per beneficiary ( 19.6 percent increase over 2020). Despite this large increase, the level remained below the 2019 level.

Preliminary data for 2022 suggest that outpatient services per FFS beneficiary continued to increase as hospital care continued to shift from inpatient to outpatient settings and hospitals continued to acquire physician practices. The shift of services away from inpatient care is particularly noteworthy because it coincided with a reduction in observation care. From 2019 to 2021, the number of outpatient observation visits per 1,000 Part B FFS beneficiaries
paid under the OPPS declined from 43 to 32 per 1,000 beneficiaries.

## Quality of care in 2021 was mixed relative to 2019

Changes in our hospital quality indicators from 2019 to 2021 were mixed. FFS beneficiaries' risk-adjusted hospital mortality rate increased slightly, while the risk-adjusted hospital readmission rate improved. Patient experience indicators declined.

Quality of care in 2020 was difficult to assess due to effects of the coronavirus pandemic on beneficiaries and providers. The results reflect temporary changes in the delivery of care and data limitations unique to the public health emergency (PHE), so we did not use these results to inform our conclusions about trends in the quality of care provided to Medicare beneficiaries or their relationship to Medicare payment adequacy.


Note: FFS (fee-for-service). Data include hospitals paid under the inpatient prospective payment systems, critical access hospitals, and acute care hospitals in Maryland and U.S. territories. The 2017-2020 risk-adjusted values differ slightly from what was presented in the March 2022 report to the Congress because of a change in the baseline years and version of the $3 \mathrm{M}^{\top \mathrm{M}}$ all-patient refined-diagnosis related group software for calculating expected results. The 2019-2021 values are not connected because we cannot draw conclusions on the quality of care in 2020 due to the effects of the coronavirus pandemic.

Source: MedPAC analysis of Medicare Provider Analysis and Review data.

This year we have updated the mortality and readmission risk-adjustment models to include the COVID-19 diagnosis, which improves our ability to represent the acuity and mix of patients receiving hospital care in 2021. The 2021 patient experience results include a full year of survey results instead of a partial year.

## FFS beneficiaries' risk-adjusted hospital mortality rate increased

In 2021, the overall mortality rate continued to rise nationwide due to deaths from COVID-19. From 2019 to 2021, FFS beneficiaries' unadjusted hospital mortality rate (death during a hospital stay or 30 days after discharge) increased from 8.4 percent to 11.5 percent (data points are not labeled). During that time, the

2021 risk-adjusted mortality rate increased (that is, worsened) from 8.1 percent to 8.6 percent (Figure 3-7). From 2017 to 2019, the risk-adjusted mortality rate had improved (that is, declined) by 0.7 percentage point. Over the three-year period, unadjusted mortality rates were relatively stable, but expected mortality increased because beneficiaries admitted to hospitals in recent years tended to have more comorbidities and thus a higher risk of mortality.

## FFS beneficiaries' risk-adjusted hospital readmission rate improved

Many factors related to the coronavirus pandemic affected hospitalization rates, including both greater demand for beds for patients diagnosed with COVID-19 and lower demand for beds because some patients


Note: FFS (fee-for-service). Data include FFS Medicare beneficiaries ages 65 or older and hospitals paid under the inpatient prospective payment systems, critical access hospitals, and acute care hospitals in Maryland and U.S. territories. The 2017-2020 unadjusted values differ slightly from values presented in the March 2022 report to the Congress because of minor changes to the measure calculation. The 2017-2020 riskadjusted values differ because of a change in the baseline years and version of the $3 \mathrm{M}^{\boldsymbol{T M}}$ all-patient refined-diagnosis related group software for calculating expected results. The 2019-2021 values are not connected because we cannot draw conclusions on the quality of care in 2020 due to the effects of the coronavirus pandemic.

Source: MedPAC analysis of Medicare Provider Analysis and Review data.
avoided hospitals due to fears of infection. Between 2019 and 2021, the unadjusted rate of readmissions (FFS Medicare beneficiaries over age 65 readmitted within 30 days after discharge) increased by 0.1 percentage point (data not labeled) (Figure 3-8). The rate of riskadjusted readmissions decreased (that is, improved) by 0.8 percentage point to 14.9 percent because beneficiaries admitted to hospitals in recent years tended to have more comorbidities and thus a higher expected rate of readmission.

## Patient experience results declined

Between 2019 and 2021, hospital patient experience measures remained high but most declined by 1 percentage point to 4 percentage points (Table 3-2).

Hospitals collect Hospital Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}\left(\mathrm{H}^{-C A H P S}{ }^{\circledR}\right)$ surveys from a sample of admitted patients, which CMS uses to calculate results for 10 measures of patient experience included in hospitals' overall ratings. ${ }^{13}$ The H-CAHPS measures key components of quality by assessing whether something that should happen during a hospital stay (such as clear communication) actually happened or how often it happened. In 2021, 72 percent of surveyed patients rated their overall hospital experience a 9 or 10 on a 10 -point scale, which is a 1 percentage point decrease from 2019. Communication with nurses, communication with doctors, and receipt of discharge information had the highest scores, with at least 80 percent of surveyed patients answering

| H-CAHPS ${ }^{\circledR}$ measure | $\mathbf{2 0 1 7}$ | $\mathbf{2 0 1 8}$ | $\mathbf{2 0 1 9}$ | $\mathbf{2 0 2 0}$ | 2021 <br> Percentage <br> point change, <br> $\mathbf{2 0 1 9 - 2 0 2 1}$ |  |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| Share of patients rating the hospital a <br> 9 or 10 out of 10 | $73 \%$ | $73 \%$ | $73 \%$ | $72 \%$ | $72 \%$ | -1 |

Note: H-CAHPS ${ }^{\oplus}$ (Hospital Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$ ). H-CAHPS is a standardized 32 -item survey of patients' evaluations of hospital care. The survey items are combined to calculate measures of patient experience for each hospital. The H-CAHPS measures included in the table are "top-box," or the most positive, response to H-CAHPS survey items. Each year's results are based on a sample of surveys of hospitals' patients from January to December. Results in 2020 include only surveys from patients discharged July to December 2020 rather than the customary full year.

Source: CMS summary of H-CAHPS public report of survey results tables.
with the most positive response. From 2019 to 2021, responsiveness of hospital staff and communication about medicines dropped by 4 percentage points, and cleanliness of hospital environment dropped by 3 percentage points. In 2021, the care-transition measure continued to get the lowest score, with only 52 percent of surveyed patients responding with "Strongly Agree" that they understood their care plan when they left the hospital.

## Need for a redesign of hospital quality payment programs

In March 2019, the Commission recommended that the Congress replace Medicare's current hospital quality programs (including the penalty-only programs) with a single, outcome-focused quality-based payment program for hospitals-a hospital value incentive
program (HVIP)-that balances rewards and penalties and has the potential to drive further improvement in hospital quality (Medicare Payment Advisory Commission 2019). Initially, the HVIP could incorporate existing quality measure domains such as readmissions, mortality, spending, patient experience, and hospitalacquired conditions (or infection rates). A key feature of the Commission's HVIP design is that it accounts for differences in providers' patient populations by incorporating a peer-grouping methodology. Qualitybased payments would be distributed to hospitals separated into peer groups, defined by their share of beneficiaries who have full dual eligibility for Medicare and Medicaid (as a proxy for income). The grouping of hospitals into peer groups that serve similar populations would make payment adjustments more equitable than existing quality payment programs.

## IPPS hospitals' all-payer operating margin reached a record high in 2021, despite declines in federal relief funds



Note: IPPS (inpatient prospective payment systems). Hospitals' margins are calculated as aggregate payments minus aggregate costs, divided by aggregate payments. "All-payer" margin includes payments from all payers. The "operating" margin is limited to patient care and other operating revenue, and in 2020 and 2021 these margins are reported with and without federal relief funds (Provider Relief Fund payments and forgiven loans from the Paycheck Protection Program). Data are for IPPS hospitals that had a cost report with a midpoint in the fiscal year and that was complete as of our analysis.

Source: MedPAC analysis of hospital cost reports

## Hospitals' access to capital strengthened in 2021 but was mixed in 2022

Hospitals' access to capital strengthened in 2021, with IPPS hospitals' all-payer operating margin reaching a record high despite declining federal relief funds. However, margins continued to vary substantially across hospitals.

Preliminary 2022 all-payer operating margin data were mixed relative to prepandemic levels, but hospitals continued to have strong access to bond markets.

## Hospitals' all-payer operating margin reached a record high in 2021

In 2021, IPPS hospitals' all-payer operating margin increased to 8.7 percent with federal relief funds
and to 7.2 percent without federal relief funds, both of which were higher than the prior all-time high in 2019 (Figure 3-9). ${ }^{14}$ The increase in IPPS hospitals' allpayer operating margin occurred despite a decrease in federal relief funds: In their fiscal year 2021 costreporting period, hospitals reported receiving about $\$ 18$ billion in these funds, down from $\$ 35$ billion in 2020. ${ }^{15}$ In other words, the federal relief funds that hospitals received in 2021 more than offset the additional coronavirus pandemic-related expenses that were not covered by the higher patient revenues associated with COVID-19. Rather, the increase in the operating margin of over 3 percentage points resulted from hospitals' operating revenues growing more than their costs: Operating revenue increased

In 2021, IPPS hospitals' all-payer operating margins continued to vary across hospital groups, including an all-time high among for-profit hospitals

| Hospital group | 2017 | 2018 | 2019 | 2020 |  | 2021 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | With relief funds | Without relief funds | With relief funds | Without relief funds |
| All IPPS | 5.9\% | 5.9\% | 6.4\% | 5.3\% | 1.9\% | 8.7\% | 7.2\% |
| Ownership |  |  |  |  |  |  |  |
| For profit | 10.5 | 17.4 | 12.2 | 12.6 | 10.4 | 15.1 | 13.9 |
| Nonprofit | 5.9 | 5.5 | 6.1 | 4.7 | 1.2 | 8.2 | 6.8 |
| Location |  |  |  |  |  |  |  |
| Metropolitan (urban) | 6.0 | 6.1 | 6.6 | 5.3 | 2.0 | 8.6 | 7.3 |
| Rural micropolitan | 4.9 | 3.9 | 5.2 | 6.2 | 1.9 | 9.2 | 6.8 |
| Other rural | 2.1 | 0.2 | 0.7 | 3.4 | -7.5 | 7.6 | 3.0 |
| Teaching and DSH |  |  |  |  |  |  |  |
| Both | 5.7 | 5.8 | 6.2 | 4.8 | 1.4 | 8.4 | 6.9 |
| DSH only | 5.5 | 5.6 | 6.3 | 6.2 | 2.8 | 8.9 | 7.3 |
| Teaching only | 8.8 | 8.7 | 7.7 | 6.0 | 4.1 | 7.7 | 6.7 |
| Neither | 9.0 | 9.1 | 10.1 | 8.4 | 6.0 | 13.5 | 11.8 |

Note: IPPS (inpatient prospective payment systems), DSH (disproportionate share hospital). Hospitals' margin is calculated as aggregate payments minus aggregate costs, divided by aggregate payments. "All-payer operating margin" includes patient care and other operating revenue from all payers, and, for 2020 and 2021, is reported with and without reported federal relief funds (Provider Relief Fund payments and Paycheck Protection Program forgiven loans). Metropolitan (urban) counties contain an urban cluster of 50,000 or more people; rural micropolitan counties contain a cluster of 10,000 to 50,000 people; all other counties are classified as "other rural." Data are for IPPS hospitals that had a cost report with a midpoint in the specified fiscal year and that were complete as of our analysis.

Source: MedPAC analysis of hospital cost reports and census geographic files.
over 11 percent, while costs increased by only about 7 percent. ${ }^{16}$ Several large hospital systems highlighted the growth in inpatient acuity as contributing to their improved operating margin.

Within hospitals' aggregate all-payer operating margin, there continued to be significant variation: The 2021 operating margin ranged from 0.8 percent to 14.9 percent among the middle half of IPPS hospitals (Figure 3-9, data not labeled). While there was variation within each group of hospitals, in aggregate, the operating margin continued to be higher among forprofit hospitals and those that were neither teaching nor receiving disproportionate share payments (the
latter known as disproportionate share hospitals (DSHs)) (Table 3-3). In contrast, the operating margin continued to be lower among hospitals in rural nonmicropolitan areas. However, rural hospitals received targeted federal relief funds, so the difference in the all-payer operating margin between rural and urban hospitals was smaller than prepandemic levels.

## Preliminary 2022 all-payer operating margin data are mixed relative to prepandemic levels

Preliminary data from several large hospital systems suggest hospitals' all-payer operating margin declined during the first half of 2022 relative to the record high
margins in 2021. Because 2021 was atypical, we also compare these large systems' 2022 all-payer margins with their prepandemic (2019) operating margins. Our sample of partial year data for 2022 is limited to five large systems that represent about 17 percent of all IPPS hospitals. From the fiscal year ending in June 2019 to the fiscal year ending in June 2022, two of the largest nonprofit systems reported a decline in operating margins of 2 percentage points to 4 percentage points (Ascension 2022a, Ascension 2020, Trinity Health 2022a, Trinity Health 2020). In contrast, during the first nine months of 2022 compared with the first nine months of 2019, two of the three largest for-profit systems reported an increase in operating margins of 2 percentage points to 4 percentage points (HCA Healthcare 2022, HCA Healthcare 2020, Tenet Health 2022, Tenet Health 2020); the third reported a 2022 operating margin similar to its 2019 margin (Community Health Systems 2022, Community Health Systems 2020). Aggregating the data from these five systems, all-payer operating margins remained positive and about equal to 2019 levels. ${ }^{17}$ There is still a material level of uncertainty regarding labor costs and overall profitability in the fourth quarter of 2022.

A few factors influenced these large hospital systems' lower operating margins in 2022 relative to those in 2021. Inflation was higher than expected and led to higher operating expenses. Hospital systems also cited a combination of ongoing workforce shortages, high labor costs, a reduction of provider relief funds, and declining patient acuity as some reasons for the downward fiscal pressure on margins. The decline in patient acuity in 2022 was attributed to declining COVID-19 volume, reversing a prior trend of higher acuity due to high COVID-19 volume. ${ }^{18}$ However, several hospital systems reported improvements in financial performance for the second and third quarters of 2022. Those improvements were attributed to near-term favorable trends in patient volume, fewer COVID-19 disruptions, and a decline in the use of contract labor (Ascension 2022b, CommonSpirit 2022, Community Health Systems 2022, Trinity Health 2022b).

## Hospitals continued to have strong access to bond markets

In both fiscal years 2021 and 2022, hospitals have continued to pay a relatively low risk premium to
access the bond market. During the start of the coronavirus pandemic in spring 2020, investors demanded a larger premium to hold hospital bonds, reaching a peak of 3.5 percentage points above the yield on treasury bonds. This peak was well above the premium over the past 10 years, which generally ranged from 1 percentage point to 2.5 percentage points above the yield on treasury bonds. By the start of fiscal year 2021, hospitals' risk premium to access bonds had declined to 2.5 percentage points above the yield on treasury bonds. Throughout most of 2021 and 2022, hospitals' risk premium to access bonds continued to decline, falling to 1 percentage point above the yield on treasury bonds by the end of fiscal year 2022 (S\&P Global 2022).

While investor interest in bonds remained strong, by the end of 2022 S\&P Global Ratings downgraded about 10 percent of nonprofit hospital bonds (S\&P Global Ratings 2022). At the start of fiscal year 2023, the ratings agencies reported a stable outlook for about 80 percent of nonprofit hospitals, a negative outlook for about 15 percent of nonprofit hospitals, and a positive outlook for about 5 percent of nonprofit hospitals (Moody's Investors Service 2022, S\&P Global Ratings 2022).

## IPPS hospitals' Medicare margin improved in 2021 and was near break-even for relatively efficient hospitals

From 2020 to 2021, IPPS hospitals' Medicare margin increased, with the median Medicare margin among relatively efficient hospitals becoming positive when including Medicare's share of federal relief funds and increasing from negative to break-even when excluding these funds.

## IPPS hospitals' Medicare margin remained negative in 2021 but increased above prepandemic levels

In 2021, IPPS hospitals' aggregate Medicare margin across hospital service lines remained negative but increased above prepandemic levels, even before including any federal relief funds (Figure 3-10). ${ }^{19}$ Specifically, IPPS hospitals' Medicare margin increased to -6.2 percent in 2021 when including Medicare's share of federal relief funds-a recent high. ${ }^{20}$ Exclusive of these funds, the Medicare margin was -8.2 percent, which was still higher than prepandemic levels. The

IPPS hospitals' Medicare margin remained negative in 2021 but increased to above prepandemic levels


Note: IPPS (inpatient prospective payment systems). "Relief funds" refers to Provider Relief Fund payments and forgiven loans from the Paycheck Protection Program, as recorded on hospitals' cost reports; Medicare's share of these funds was calculated using fee-for-service Medicare's share of 2019 all-payer operating revenue. Hospitals' "Medicare margin" is calculated as aggregate Medicare payments minus aggregate allowable Medicare costs, divided by aggregate Medicare payments. Payments and costs include multiple hospital service lines (including inpatient, outpatient, swing bed, skilled nursing, rehabilitation, psychiatric, and home health services) as well as direct graduate medical education and uncompensated care payments. Data are for IPPS hospitals that had a cost report with a midpoint in the fiscal year and that was complete as of our analysis.

Source: MedPAC analysis of hospital cost reports.
increase in IPPS hospitals' Medicare margin from 2020 to 2021 of 2 percentage points (about 4 percentage points before including relief funds) resulted from hospitals' Medicare revenues growing while their costs held relatively steady. In other words, in aggregate, the Medicare payment increases during the PHE more than offset hospitals' additional pandemic-related costs and increased the share of hospitals that had a positive Medicare margin. (For a description of the Medicare payment increases, see the text box in our March 2022 report to the Congress, p. 89.)

Within hospitals' aggregate Medicare margin, there continued to be significant variation: The 2021 Medicare margin ranged from -15.2 percent to +8.1
percent among the middle half of IPPS hospitals (Figure 3-10, data not labeled). While there was variation within each group of hospitals, in aggregate, the Medicare margin continued to be higher-and positive-at for-profit hospitals and hospitals in small rural communities (Table 3-4, p. 74). In contrast, the Medicare margin continued to be lower among hospitals that were not disproportionate share hospitals.

## In 2021, aggregate IPPS payments increased while hospitals' aggregate inpatient costs decreased slightly

 In 2021, aggregate IPPS payments to hospitals for FFS Medicare beneficiaries' inpatient stays increased 3.4 percent to $\$ 107.9$ billion (Figure 3-11, p. 75, left panel). hospital groups, including higher margins at for-profit and rural hospitals| Hospital group | 2017 | 2018 | 2019 | 2020 |  | 2021 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | With relief funds | Without relief funds | With relief funds | Without relief funds |
| All IPPS | -9.9\% | -9.3\% | -8.5\% | -8.2\% | -12.3\% | -6.2\% | -8.2\% |
| Ownership |  |  |  |  |  |  |  |
| For profit | -2.2 | -0.3 | 1.3 | 4.3 | 1.6 | 5.3 | 3.7 |
| Nonprofit | -71.1 | -10.6 | -10.0 | -10.3 | -14.8 | -8.2 | -10.2 |
| Location |  |  |  |  |  |  |  |
| Metropolitan (urban) | -10.1 | -9.5 | -8.8 | -8.7 | -12.8 | -6.6 | -8.5 |
| Rural micropolitan | -8.3 | -7.1 | -6.1 | -3.7 | -8.5 | -2.6 | -5.8 |
| Other rural | -5.6 | -5.2 | -2.5 | 1.6 | -4.0 | 4.9 | -0.8 |
| Teaching and DSH |  |  |  |  |  |  |  |
| Both | -8.7 | -8.4 | -7.8 | -7.7 | -71.8 | -5.8 | -7.8 |
| DSH only | -17.2 | -10.3 | -9.1 | -7.9 | -12.2 | -5.7 | -8.0 |
| Teaching only | -14.3 | -12.0 | -17.7 | -14.4 | -16.9 | -71.0 | -12.5 |
| Neither | -17.2 | -15.3 | -14.3 | -13.9 | -17.0 | -10.8 | -13.3 |

Note: IPPS (inpatient prospective payment systems). Hospitals' margin is calculated as aggregate payments minus aggregate allowable costs, divided by aggregate payments. Hospitals' "Medicare margin" is calculated as aggregate Medicare payments minus aggregate allowable Medicare costs, divided by aggregate Medicare payments. Payments and costs include multiple hospital service lines (including inpatient, outpatient, swing bed, skilled nursing, rehabilitation, psychiatric, and home health services) as well as direct graduate medical education and uncompensated care payments. For 2020 and 2021, the margin is reported with and without reported federal relief funds (Provider Relief Fund payments and Paycheck Protection Program forgiven loans). Metropolitan (urban) counties contain an urban cluster of 50,000 or more people; rural micropolitan counties contain a cluster of 10,000 to 50,000 people; all other counties are classified as "other rural." Data are for IPPS hospitals that had a cost report with a midpoint in the specified fiscal year and that were complete as of our analysis.

Source: MedPAC analysis of hospital cost reports and census geographic files.

This increase in payments occurred despite a decrease in FFS beneficiaries because there was a larger growth in Medicare payments per stay, which rose 10.3 percent to about $\$ 15,600$ (Figure 3-11, right panel).

The 10.3 percent growth in IPPS payments per stay in 2021 resulted primarily from:

- Annual update to the IPPS base payment rates and statutory increase. In 2021, the net annual update to IPPS base payment rates-including a statutory increase-was 2.8 percent. This increase
resulted from: (1) a 2.4 percent annual update to the inpatient operating base payment rate; (2) a 0.5 percent statutory increase to the inpatient operating base rate (from phasing out adjustments that were put in place in 2018 to recoup prior coding-induced overpayments); and (3) a 1.1 percent update to the inpatient capital base rate. Because the inpatient operating rate is about 97 percent of total IPPS base rates, the net update was 2.8 percent ((93 percent $\times 2.9$ percent) $+(7$ percent $\times 1.1$ percent)). below the prepandemic level while payments per stay continued to rise rapidly


Note: IPPS (inpatient prospective payment systems), FFS (fee-for-service). IPPS payments exclude payments for uncompensated care because these are not payments for FFS Medicare beneficiaries' inpatient stays. Payments per stay are per transfer-adjusted stay.

Source: MedPAC analysis of Medicare Provider Analysis and Review data for fiscal years 2017 to 2021.

- Growth in case mix. In 2021, there was a 3.4 percent increase of reported inpatient case mix, net of changes from annual updates to relative weights. These weights do not consider patients' COVID-19 status.
- Increases in Medicare payments during the PHE. We estimate that the suspension of the 2 percent sequestration in the Medicare program's share of FFS payments, which began on May 1, 2020, and extended through April 2022, raised IPPS payments per stay by 1.1 percent in $2021 .{ }^{21}$ In addition, we estimate that the mandated 20 percent increase in the resource weight for inpatient stays when patients have a COVID-19 diagnosis increased 2021 IPPS payments per stay by an additional 1.2 percent. We also estimate that add-on payments for new COVID-19 technologies increased 2021 IPPS payments per stay by an additional 1 percent.

Meanwhile, between 2020 and 2021, IPPS hospitals' aggregate costs for inpatient services fell slightly. This decrease was the combination of two factors. First, the number of FFS Medicare inpatient stays declined. Second, IPPS hospitals were able to constrain the growth in costs per inpatient stay to slightly below the increase in input prices and average case mix. This constraint in cost growth is similar to prior years, except for 2020, and indicates that hospitals coded patients more extensively, improved productivity, or both. As the increase in costs per inpatient stay was slightly lower than the decline in the number of FFS Medicare inpatient stays, IPPS hospitals' aggregate inpatient costs declined slightly.

In 2021, uncompensated care payments held steady In 2021, uncompensated care payments-payments that the Medicare program makes to help cover hospitals' costs of bad debt and charity care-held steady at near payments per FFS beneficiary rose above prepandemic levels


Note: OPPS (outpatient prospective payment system). The data include all OPPS payments (including, but not limited to, general acute care hospitals). Data reported by calendar year.

Source: MedPAC analysis of Medicare outpatient claims data and the Medicare Trustees report.
\$8.3 billion and therefore did not materially contribute to the increase in hospitals' Medicare margin in 2021. ${ }^{22}$

In 2021, OPPS aggregate payments and payments per beneficiary increased rapidly, outpacing growth in hospitals' outpatient costs In 2021, OPPS payments for FFS Medicare beneficiaries' outpatient services at general ACHs increased to $\$ 66.9$ billion, which was slightly above prepandemic levels despite a decrease in the number of FFS Medicare beneficiaries (Figure 3-12, left panel). Meanwhile, OPPS payments per Part B FFS beneficiary increased to about $\$ 2,200$, a sharp increase from the 2020 level and above the prepandemic 2019 level (Figure 3-12, right panel).

The 16.5 percent growth in OPPS payments per FFS Medicare beneficiary in 2021 resulted primarily from:

- Annual update to OPPS conversion factor. In 2021, the annual update to the OPPS conversion factor was 2.5 percent. However, the OPPS update does
not affect the payment rates of separately payable drugs and devices, which are based on average acquisition costs and represent 26 percent of OPPS payments. ${ }^{23}$ Therefore, the average effect of the annual update on spending across OPPS services was 1.8 percent ( $(74$ percent $\times 2.5$ percent $)+(26$ percent $\times 0$ percent)).
- Growth in service volume. In 2021, the volume of OPPS services per beneficiary raised OPPS payments per FFS beneficiary by 13.5 percent. This increase was driven by a general increase in all types of hospital outpatient department (HOPD) services and by the provision of 7.7 million COVID-19 vaccine administrations and testing for COVID-19.
- Decline in complexity. In 2021, OPPS payments per service fell 1.8 percent due to the mix of outpatient services, measured by the OPPS relative weights
of the services. This measure decreased because of a sharp increase in relatively low-complexity services, especially administration of the COVID-19 vaccines and testing for COVID-19.
- Continued growth in spending on separately payable drugs. Payments for separately payable drugs grew 9.8 percent per beneficiary. Separately paid drugs are about 26 percent of total OPPS spending, so this increase in drug spending boosted OPPS spending per beneficiary by 2.6 percent.
- Increases in Medicare payments during the PHE. We estimate that the suspension of the 2 percent sequestration in Medicare's share of FFS payments, which began on May 1, 2020, and extended through April 2022, raised OPPS payments per beneficiary by 0.6 percent in 2021. ${ }^{24}$

Meanwhile, hospitals' outpatient aggregate costs and cost per beneficiary increased but at a slower rate. The increase in costs reflects the large increase in outpatient services per beneficiary, a small increase in input prices, a small increase in the cost of separately payable drugs and devices, and a decrease in the resource requirements per OPPS-covered service. One driver of the decreased resource requirements was the large volume of COVID-19 vaccine administrations and COVID-19 sample collections ( 7.7 million), which are low-complexity services. One reason why hospitals' Medicare outpatient costs grew more slowly than Medicare payments in 2021 is that the suspension of the 2 percent sequestration on Medicare program payments was in effect for all of calendar year 2021 compared with only a portion of 2020, which increased payments without affecting costs. A second possible explanation for why hospitals' outpatient costs grew more slowly than Medicare payments is that the costs incurred when providing COVID-19 vaccines and taking sample collections were smaller than the OPPS payments for those services.

## In 2021, relatively efficient hospitals' median Medicare margin was positive after including Medicare's share of federal relief funds

In 2021, the median Medicare margin among the 15 percent of IPPS hospitals we identified as relatively efficient remained at 1 percent when including Medicare's share of federal relief funds and increased from -3 percent in 2020 to break-even excluding these
funds (Table 3-5, p. 78). ${ }^{25}$ These findings are consistent with data over the last several years showing relatively efficient hospitals approximately breaking even on Medicare. ${ }^{26}$ (As in prior years, we identified relatively efficient hospitals as those that were never in the worst third on any quality or cost metrics during the prior three years (we used 2017, 2018, and 2019 to limit the effect of the start of the pandemic) and consistently performed in the top third of either costs or mortality (see text box, p. 79); however, to limit the effect of the start of the pandemic on these measures and hospitals' different cost-reporting periods, we used 2017, 2018, and 2019 to identify relatively efficient hospitals and then looked at their performance in 2021.)

In 2021, the relatively efficient hospitals' lower costs per inpatient stay (91 percent of the national median) allowed them to generate better Medicare margins than the comparison group. The relatively efficient group also had better patient satisfaction, with 71 percent of H-CAHPS respondents rating the hospital a 9 or 10 in 2020, compared with 68 percent for other hospitals. The relatively efficient hospitals (those that had relatively good prepandemic quality metrics) continued to have lower risk-adjusted median mortality and readmission rates than other hospitals during the pandemic. Among our sample of 284 relatively efficient hospitals in 2021, mortality was 7 percentage points below the national median and readmission rates were 4 percentage points below the national median-consistent with comparisons in 2017 to 2019. These results suggest that relatively efficient and other hospitals' mortality and readmission metrics, on average, were equally affected by the pandemic.

As in past years, relatively efficient hospitals were spread across the country and represented diverse categories of hospitals, including teaching, nonteaching, rural, urban, for-profit, and nonprofit hospitals, as well as hospitals serving large shares of low-income patients. On average, the shares of Medicare and Medicaid patients are similar in both groups. While most types of hospitals were represented in the efficient group, a disproportionate share of relatively efficient hospitals had relatively high volumes of admissions. Volume primarily affects our efficiency measures in two ways. First, higher-volume hospitals tended to have lower risk-adjusted mortality. Second, we require some consistency of results over three years and remove from the efficient group any hospital that


[^2]Source: MedPAC analysis of cost report and claims-based quality data from CMS
performed in the bottom third on any metric in a single year. ${ }^{27}$ Thus, random variation in smaller hospitals may make them more likely to be excluded from our efficient group. The efficient group also tends to have lower shares of low-income patients. ${ }^{28}$

This year, as in past years, we have found that for-profit hospitals have been able to break even or generate small profits on Medicare patients (Medicare Payment Advisory Commission 2022a). Given that for-profit
hospitals tend to have lower costs, one might expect them to be in the efficient group. However, between 14 percent and 15 percent of both for-profit and nonprofit hospitals were deemed relatively efficient. The factor that separates the relatively efficient hospitals from other low-cost hospitals is that they perform relatively well on both quality and costs. While forprofit hospitals tended to have lower costs, nonprofit hospitals tended to perform slightly better on our quality metrics.

## Identifying relatively efficient hospitals

The Commission follows two principles when identifying a set of efficient providers. First, the providers must do relatively well on cost and quality metrics. Second, the performance has to be consistent, meaning that the provider cannot have poor performance on any metric over the past three years. In the hospital sector, the variables we use to identify relatively efficient hospitals are hospital-level mortality rates (risk-adjusted, allcondition mortality during an inpatient stay through 30 days after discharge), readmission rates (riskadjusted, all-condition readmission rates within 30 days after an initial stay), and standardized inpatient Medicare costs per case. Our assessment of efficiency is not in absolute terms but, rather, relative to a comparison group of other hospitals paid under Medicare's inpatient prospective payment systems (IPPS). ${ }^{29}$

## Categorizing hospitals as relatively efficient

We assigned IPPS hospitals to the relatively efficient group or the control group according to each hospital's performance relative to the national median on a set of risk-adjusted cost and quality metrics for the three years prior to the most recent cost report year. We then examined the performance of the two hospital groups in the most recent cost report year.

Hospitals were identified as relatively efficient if they met four criteria in each of the three prior years:

- Risk-adjusted mortality rates were not among the worst third in any year.
- Risk-adjusted readmission rates were not among the worst third in any year.
- Standardized costs per inpatient stay were not among the worst third in any year.
- Risk-adjusted mortality or standardized costs per stay were among the best one-third of all hospitals in all years.

The objective was to identify a sample of hospitals that consistently performed at an above-average level on at least one measure (cost or mortality) and that always performed reasonably well on all measures. Because we screen out hospitals that have few Medicaid patients or have poor performance in a single year, our methodology does not seek to identify all efficient hospitals, only a subsample of relatively efficient hospitals. The rationale for this methodology and the details of computing the various measures are discussed in our March 2011 report (Medicare Payment Advisory Commission 2011). As a secondary check on hospital quality, we use the Hospital Consumer Assessment of Healthcare Providers and Systems survey to require that at least 60 percent of the hospital's patients rated it a 9 or 10 on a 10 -point scale (in the year prior to the performance period). ${ }^{30}$

## Hospitals' Medicare margin for 2023 is projected to decline relative to 2021

We project that IPPS hospitals' aggregate Medicare margin for 2023 will decline relative to 2021.
Specifically, we project that their Medicare margin in 2023 will be approximately -10 percent, similar to the level in 2017. Among relatively efficient IPPS hospitals, we project that the median Medicare margin in 2023 will be modestly below break-even, near prepandemic levels. These projections are based on actual payments
and costs from the most recent year of complete data (2021) and policy, inflation, and coronavirus pandemicrelated changes that took place in 2022 and are anticipated in 2023.

The following are key drivers of our projected lower Medicare margin in 2023 relative to 2021:

- Hospitals' input prices growing faster than CMS's forecast. In 2022, CMS underestimated the growth in hospitals' input prices when it set the annual
update for IPPS and OPPS payment rates (Table 3-6). Using data available as of the time of the 2022 final rule (published in 2021), CMS forecast that general ACHs' input prices for a market basket of operating inputs would increase by 2.7 percent from 2021 to 2022. However, CMS's latest forecast (with historical data through the second quarter of calendar year 2022) suggests that input prices in fiscal year 2022 grew 5.7 percent (3.0 percentage points higher than initially forecast). There is even more uncertainty in what hospitals' actual input price inflation will be in 2023 relative to the forecast CMS used when setting the annual IPPS and OPPS updates for 2023, but CMS's latest forecast suggests that the agency may have underestimated 2023 input price inflation as well. The underestimated inflation in 2022 and 2023 contrasts with prior years: From 2012 to 2021, CMS overestimated input price inflation in all but one year, for a cumulative overestimate of 5.5 percent.
- Expected expiration of federal relief funds and Medicare PHE payment changes, which were higher than hospitals' additional costs. In both 2020 and 2021, we found that hospitals' Medicare margins increased in part because the federal relief funds and Medicare payment changes during the PHE exceeded hospitals' additional costs from the PHE. However, these additional payments may expire in 2023. (The last phase of Provider Relief Fund payments-a portion of which supports providers' care of FFS Medicare beneficiaries-began to be distributed in early fiscal year 2022. The 2 percent sequestration of Medicare payments was suspended from May 1, 2020, through March 31, 2022, and then phased in at a 1 percent reduction through June 30, 2022, when the full 2 percent sequestration resumed. The additional 20 percent payment for COVID-19 inpatient stays will be in effect through the end of the PHE, which is currently scheduled to extend through mid-May 2023.)
- Declines in Medicare's uncompensated care payments. In 2021, 2022, and 2023, Medicare's uncompensated care pool declined from $\$ 8.3$ billion to $\$ 7.2$ billion to $\$ 6.9$ billion, respectively. These declines reflect CMS's projected drop in DSH payments and in the national uninsured rate. As Medicare payments for uncompensated care do not
have any corresponding Medicare costs, all declines in uncompensated care payments decrease hospitals' Medicare margins. (On the other hand, a decrease in the uninsured rate generally increases hospitals' all-payer margin.)

We anticipate that these factors which reduce net revenue growth will be partially offset by other factors that reduce cost growth, including reductions in hospitals' COVID-19-related costs as cases decline and hospitals become better at managing the disease, and the continued statutory 0.5 percent increase to inpatient operating payments to reverse prior temporary reductions in payments that recouped prior coding-induced overpayments.

The exact level of hospitals' Medicare margin in 2023 will depend in large part on the duration and severity of the coronavirus pandemic and associated PHE-related payment increases and whether the federal government enacts any additional coronavirus pandemic support. In addition, hospitals' 2023 Medicare margin may be affected by CMS's decisions on how to comply with the Supreme Court's recent ruling requiring the agency to reverse previous cuts to OPPS payments for drugs furnished by hospitals participating in the 340B drug program. ${ }^{31}$

## How should Medicare payments change in 2024?

Our payment adequacy indicators suggest that Medicare payments to general ACHs were broadly adequate in 2021, and we project that they will decline in 2023 but remain broadly adequate.

Under current law, Medicare's base payment rates under the IPPS and OPPS increase annually based on the forecasted increase in the hospital market basket less a forecasted increase in productivity, as well as by any other statutory updates (see Table 3-6).

The final updates for 2024 will not be set until summer 2023, but CMS currently forecasts a 2.9 percent increase in the IPPS operating base payment rate and OPPS base payment rate and a 2.4 percent increase in the IPPS capital base payment rate. These forecasts, based on historical data through June 2022, anticipate a marked slowdown in input price inflation. The final

| $\begin{gathered} \text { TABLE } \\ 3-6 \end{gathered}$ | IPPS and OPPS updates and forecast errors |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2019 | 2020 | 2021 | 2022 | 2023 |
| Updates based on forecasts |  |  |  |  |  |
| IPPS operating |  |  |  |  |  |
| Market basket | 2.9\% | 3.0\% | 2.4\% | 2.7\% | 4.1\% |
| Productivity | -0.8 | -0.4 | 0.0 | -0.7 | -0.3 |
| Subtotal | 2.1 | 2.6 | 2.4 | 2.0 | 3.8 |
| Statutory updates | -0.3 | 0.5 | 0.5 | 0.5 | 0.5 |
| Total | 1.8 | 3.1 | 2.9 | 2.5 | 4.3 |
| IPPS capital |  |  |  |  |  |
| Total (market basket) | 1.4 | 1.5 | 1.1 | 1.1 | 2.5 |
| OPPS |  |  |  |  |  |
| Total (same as IPPS operating subtotal) | 2.1 | 2.6 | 2.4 | 2.0 | 3.8 |
| Actual market basket |  |  |  |  |  |
| IPPS operating |  |  |  |  |  |
| Market basket | 2.4 | 2.0 | 3.1 | 5.7* | 4.3* |
| Forecast error | 0.5 | 1.0 | -0.7 | -3.0* | -0.2 |
| IPPS capital |  |  |  |  |  |
| Market basket | 1.4 | 1.2 | 1.0 | 1.9* | 2.6* |
| Forecast error | 0.0 | 0.3 | 0.1 | -0.8* | -0.7* |

Note: IPPS (inpatient prospective payment systems), OPPS (outpatient prospective payment system). Updates do not include budget neutrality adjustments to base rates. Not all IPPS and OPPS payments are increased by the updates to base rates, such as separately payable drugs. *Data include historical data through the second quarter of calendar year 2022 and forecasts for subsequent quarters.

Source: MedPAC analysis of IPPS and OPPS final rules and data provided by CMS Office of the Actuary.

2024 update will include newer forecasts of growth in input prices and productivity and thus could be lower or higher than the current projected update.

In considering how Medicare payments to general ACHs should change in 2024, the Commission contends that scarce Medicare resources should be used efficiently. To meet this goal, Medicare should aim to balance several objectives:

- maintain payments high enough to ensure beneficiaries' access to care;
- maintain payments close to hospitals' cost of providing high-quality care efficiently;
- maintain fiscal pressure on hospitals to constrain costs;
- minimize differences in payment rates for similar services across sites of care; and
- avoid implementing large, across-the-board payment rate increases to support a subset of hospitals with specific needs.

The Commission's payment update recommendation for 2024 reflects the most recent inflation and other data from 2021, preliminary data from 2022, and projections for 2023. If current projections of input inflation and hospital costs turn out to be inaccurate, these discrepancies will be accounted for in our assessment of payment adequacy in our next recommendation cycle.

## RECOMMENDATION 3-1

For fiscal year 2024, the Congress should update the $\mathbf{2 0 2 3}$ Medicare base payment rates for general acute care hospitals by the amount specified in current law plus 1 percent.

## RATIONALE 3-1

Hospitals' payment adequacy indicators were generally positive in 2021. The number of hospital closures was the same as the number of openings, IPPS hospitals' all-payer operating margin increased to a record high, and IPPS hospitals' Medicare margin increased. In other words, federal relief funds and increased Medicare payments more than offset pandemic-induced costs.

However, indicators continued to vary substantially across hospitals, and some indicators remained below prepandemic levels. For example, some hospitals faced capacity and staffing constraints at times. In addition, FFS beneficiaries' risk-adjusted hospital mortality rate remained higher than the rate in 2019, and patient experience measures declined.

For 2023, we project that IPPS hospitals' Medicare margin will decrease to about -10 percent (similar to the level in 2017) and that relatively efficient hospitals' median Medicare margin will decline to modestly below break-even, similar to prepandemic levels.

The Commission anticipates that a 2024 update to hospital payment rates of current law plus 1 percent would generally be adequate to maintain FFS Medicare beneficiaries' access to hospital inpatient and outpatient care and keep IPPS and OPPS payment rates close to the cost of delivering high-quality care efficiently.

However, this update may not be sufficient for Medicare safety-net hospitals with a poor payer mix. A separate discussion of how to support Medicare safetynet hospitals follows.

IMPLICATIONS 3-1

## Spending

- We expect the recommendation to increase spending relative to current law by over $\$ 2$ billion in 2024 and by over $\$ 10$ billion over five years.


## Beneficiary and provider

- The increase in Medicare payment rates will help maintain hospitals' willingness to treat Medicare beneficiaries and maintain beneficiaries' access to care.


## Supporting Medicare safety-net hospitals

The Medicare program strives to ensure access to care for all beneficiaries and to adequately pay providers for that access. Recommendation 3-1 above is designed to provide adequate payment to the average hospital. However, that level of payment may not be adequate to sustain access for Medicare beneficiaries at certain Medicare safety-net hospitals. Therefore, Medicare's safety-net policies may need to be modified.

Medicare currently makes safety-net payments to hospitals in the form of disproportionate share hospital (DSH) payments and uncompensated care payments. But there are several problems with the formulas currently used to distribute safety-net payments. First, DSH payments are applied only to hospital inpatient rates, so hospitals get no boost to the payments they receive for providing outpatient care. Second, the DSH formula is primarily driven by Medicaid patient shares and does not factor in Medicare patient shares. Thus, Medicare subsidizes Medicaid through its DSH payments and hospitals that serve high shares of Medicare patients may be disadvantaged under the DSH formula. It is important for hospitals that treat large shares of Medicaid patients to be supported, but that cost should be Medicaid's responsibility and not be absorbed by Medicare. Third, Medicare's uncompensated care payments are biased toward providing greater uncompensated care payments to hospitals with few Medicare FFS inpatient stays and more Medicare Advantage (MA) inpatient stays. These issues are discussed in more detail in our June 2022 report to the Congress and the appendix to this chapter. A new Medicare safety-net policy should
improve how safety-net providers are identified by the Medicare program and the mechanisms for distributing Medicare safety-net payments.

## Safety-net payments are warranted for providers serving low-income Medicare beneficiaries

We identify Medicare safety-net hospitals as those that disproportionately serve low-income Medicare patients, uninsured patients, or Medicare patients that are not materially profitable. For ACHs, Medicare patients-in particular, low-income Medicare patientsgenerate lower levels of profitability than hospitals' commercial patients for two reasons:

Lower revenues per service-From 2011 to 2020, IPPS hospitals' aggregate Medicare margin has been negative, ranging between -5 percent and -10 percent, suggesting Medicare is not a profitable payer in aggregate in the hospital sector (Medicare Payment Advisory Commission 2022d). In addition, hospitals serving a high share of low-income Medicare beneficiaries tend to receive less cost sharing because of beneficiaries' lack of supplemental insurance or Medicaid not paying cost sharing for dual-eligible beneficiaries. Receiving less cost sharing results in higher levels of Medicare bad debt at Medicare safetynet hospitals.

Higher costs per service-Research has indicated that hospitals' costs per discharge for low-income Medicare beneficiaries are slightly higher than costs for higherincome beneficiaries with similar diagnoses (Nguyen and Sheingold 2011).

The combination of lower revenue and higher costs can financially strain Medicare safety-net hospitals that have to compete for labor and technology with more profitable hospitals.

In addition, hospitals that serve high shares of Medicare beneficiaries and in particular high shares of low-income beneficiaries may be less able to absorb unforeseen financial challenges. For example, as CMS forecasts input price inflation and then sets payment updates accordingly, it overestimates inflation in some years and underestimates inflation in other years. An unforeseen financial challenge such as an inflation forecast error is not an issue for a hospital with high profit margins and a large endowment. But for a hospital that just covers its expenses and has a large
number of Medicare patients and few commercial patients, an unforeseen deviation in the profitability of Medicare patients may be far more challenging to manage. Medicare may want to provide these safetynet hospitals with higher payments to give them a "cushion" to account for uncertainty regarding the future profitability of their Medicare patients.

Given Medicare safety-net hospitals' greater unpaid coinsurance, higher costs of low-income Medicare beneficiaries, and lack of ability to absorb unforeseen variation in Medicare profits, we maintain that supplemental payments to hospitals disproportionately serving low-income Medicare beneficiaries are warranted. The theoretical frameworks for determining Medicare safety-net status and determining whether supplemental payments are necessary were discussed in detail in our June 2022 report to the Congress (Medicare Payment Advisory Commission 2022c). The Commission's method of gauging hospitals' safetynet status is Medicare-centric by design; safety-net definitions used by Medicaid and other payers likely will differ from our definition.

## A new Medicare Safety-Net Index will direct safety-net payments to hospitals with high shares of low-income Medicare patients

To address the issues with the current DSH and uncompensated care payment metrics and better direct supplemental payments to hospitals that care for a high share of Medicare beneficiaries with low incomes, we developed a new measure called the Medicare Safety-Net Index (MSNI). Each hospital's MSNI is computed using three components: (1) the share of its Medicare volume associated with lowincome beneficiaries (identified as those who receive the Part D low-income subsidy (LIS)-see text box, p. 84, on identifying low-income Medicare beneficiaries and hospitals that serve them); (2) the share of revenue the hospital spends on uncompensated care (bad debts and charity care); and (3) the share of total volume associated with Medicare beneficiaries. Table 3A-1 (p. 97 in the appendix to this chapter) provides more detailed information about how each hospital's MSNI is calculated; the rationale for the MSNI formula is discussed in our June 2022 report to the Congress (Medicare Payment Advisory Commission 2022c). Other payers may define safety-net status for their patients differently.

## Identifying low-income Medicare beneficiaries and the hospitals that care for them

The Commission's definition of low-income Medicare beneficiaries includes all those who receive full or partial Medicaid benefits and those who do not qualify for Medicaid benefits in their states but who receive the Part D low-income subsidy (LIS) because they have limited assets and an income below 150 percent of the federal poverty level. Collectively, we refer to this population as "LIS beneficiaries" because Medicare beneficiaries who receive full or partial Medicaid benefits are automatically eligible to receive the LIS. To identify hospitals' low-income Medicare populations, we use LIS as the proxy for "low income" because it reduces the impact of variation across states in eligibility for Medicaid. However, the LIS definition is limited to beneficiaries who receive the LIS benefit and thus omits some non-dual-eligible beneficiaries who could qualify for the LIS but have not applied for the benefit. This limitation is a result of not having beneficiary income data. To the extent that future Medicare safety-net funding is attached to treating more LIS beneficiaries, that payment policy would encourage providers to make their patients aware of and help them enroll in Medicaid, the Medicare Savings Programs (i.e., programs in which Medicaid helps pay for Medicare premiums, cost sharing, or both), and the Part D LIS. ${ }^{32}$

Compared with the full fee-for-service Medicare population, LIS beneficiaries are three times as likely to be disabled, nearly three times as likely to have end-stage renal disease, more likely to be female, slightly more likely to live in a rural area, and twice as likely to be Black or Hispanic. Given the demographic mix of the LIS population, directing Medicare safety-net funds to LIS patients' providers could promote greater equity in access to care and quality across demographic groups. More detail on LIS beneficiaries is provided in our June 2022 report to the Congress (Medicare Payment Advisory Commission 2022c).

## Hospitals vary in the extent to which they care for low-income Medicare beneficiaries

In 2019, for the quarter of hospitals that treated the highest share of LIS beneficiaries, LIS beneficiaries made up 43 percent or more of the hospitals' Medicare inpatient and outpatient volume. In contrast, for the quarter of hospitals that treated the lowest share of LIS beneficiaries, LIS beneficiaries made up 23 percent or less of the hospitals' total Medicare volume. These data suggest that some hospitals take on a greater responsibility for treating low-income patients than do other hospitals, which could be financially disadvantageous.

The MSNI model and the current uncompensated care policy differ importantly in that the MSNI payments would be structured as add-on payments to Medicare payment rates (meaning a percentage increase to FFS rates for each claim). Providers with more financially challenging patient mixes would receive higher Medicare payment rates. In contrast, the current uncompensated care model is not directly tied to Medicare payment rates. Each hospital receives a fixed share of its uncompensated care costs from FFS Medicare. That in turn sets the add-on amount per FFS claim that is used by MA plans. ${ }^{33}$ The net result is that,
under current policy, MA safety-net payments are not proportional to uncompensated care costs (see Table $3 A-3$, p. 99, in the appendix for details).

A second difference is that DSH payments currently increase as the share of patients insured primarily by Medicaid increases. Thus, Medicare subsidizes Medicaid through DSH payments. Under the MSNI model, Medicaid patients (other than dual-eligible beneficiaries) will not directly affect Medicare payments. While the MSNI does not directly support Medicaid, notably, hospitals with high shares of low-
income Medicare patients will benefit, and those hospitals typically also have high shares of Medicaid patients.

In our June 2022 report to the Congress, we used 2016 data to simulate how Medicare payments would have changed if the MSNI was used to distribute safetynet dollars. We used 2016 data because we wanted to examine hospitals that closed between 2016 and 2020 to determine the extent to which they would have been helped if safety-net payments had been distributed by the MSNI. We found that the MSNI would have directed more dollars toward hospitals with lower all-payer margins and to hospitals that closed from 2016 to 2020.

In this chapter, we update our analysis to simulate what would have happened in 2019 if the MSNI had been used to distribute safety-net payments rather than the DSH and uncompensated care policies that were in effect in 2019. Like the results using 2016 data, the simulation using 2019 data suggests that the MSNI would have helped redirect funds toward hospitals that tended to serve lower-income Medicare beneficiaries and had relatively low 2019 all-payer margins.

## The MSNI is a better indicator of financial status of hospitals serving large shares of low-income Medicare beneficiaries than the DSH metric

To compare how well the DSH metric and the MSNI identify hospitals under financial strain, we examined characteristics of hospitals that were divided into quartiles based on the DSH and MSNI scores. ${ }^{34}$ The DSH metric and the MSNI are moderately correlated (correlation $=0.56$ ). They both have some ability to identify hospitals under financial strain. For example, hospitals in the highest quartile of both the DSH metric and the MSNI tend to have greater uncompensated care costs, larger amounts of unpaid Medicare cost sharing (Medicare bad debts), and lower all-payer total margins. However, the MSNI appears to do a better job differentiating hospitals according to their level of allpayer profitability and financial stress. For example, in 2019, the hospitals in the lowest DSH quartile had an aggregate all-payer total margin that was 5 percentage points higher than hospitals in the highest DSH quartile ( 10.1 percent vs. 5.1 percent). In contrast, hospitals in the lowest MSNI quartile had an aggregate all-payer total margin that was 6.9 percentage points higher than hospitals in the highest MSNI quartile ( 10.0 percent vs. 3.1 percent). As we discussed in our June 2022
report, the MSNI also has the benefit of not directly subsidizing Medicaid and not being inversely correlated with Medicare shares.

## Redistributing DSH and uncompensated care funds using the MSNI would increase high-MSNI hospitals' Medicare revenue by about 3.9 percent in aggregate

We simulated how Medicare and all-payer payments would have changed for each IPPS hospital if we redistributed the $\$ 11.7$ billion of DSH and uncompensated care funds that hospitals received in 2019 using the MSNI. To allocate the MSNI dollars among hospitals, we used a linear model where the percentage add-on (to inpatient and most outpatient rates) increases as the MSNI increases. In this illustrative example, the MSNI add-on starts at zero for hospitals with an MSNI at the 10th percentile or below. These hospitals receive no Medicare safetynet payments. ${ }^{35}$ For hospitals above this threshold, the percentage adjustment of the Medicare safety-net add-on continuously increases according to a linear model. It rises to 3 percent at the 25th percentile of the MSNI distribution, 8 percent at the 50th percentile, 14 percent at the 75th percentile, and 26 percent at the 95th percentile of the MSNI distribution. The maximum MSNI redistribution add-on was set at 26 percent (the 95 th percentile) to avoid extreme add-ons for outlier hospitals.

As noted above, unlike the current DSH and uncompensated care payments, the MSNI payment add-ons would apply to both inpatient and most outpatient services. The one exception is separately payable Part B drugs. The acquisition costs of drugs are unlikely to be higher for Medicare safety-net hospitals, and they are lower than average if those hospitals qualify for 340B status. Therefore, we excluded separately payable Part B drug claims from eligibility for the MSNI add-on to prevent an unlevel playing field where certain safety-net providers could specialize in providing expensive Part B drugs. The exclusion of separately payable Part B drugs is a new refinement in our method that occurred after the June 2022 report to the Congress was published.

Our simulation allows almost all hospitals to receive MSNI payments. The simulation used a graduated linear increase in the MSNI percentage add-on for two reasons. First, as we explained in the June 2022 care policy and simulations of redistributing based on the MSNI, 2019

| Characteristic | DSH quartiles |  |  |  | Medicare Safety-Net Index (MSNI) quartiles |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Q1 | Q2 | Q3 | Q4 | Q1 | Q2 | Q3 | Q4 | Q1 | Q2 | Q3 | Q4 |
| Actual 2019 financial data given current DSH and uncompensated care policy |  |  |  |  |  |  |  |  |  |  |  |  |
| DSH payments / FFS Medicare revenue | 0.5\% | 1.3\% | 2.0\% | 3.4\% | 1.3\% | 1.7\% | 2.1\% | 3.3\% | Current-law estimates are the same as in the center block of data |  |  |  |
| Uncompensated care payments / FFS Medicare revenue | 1.9 | 3.6 | 4.0 | 6.5 | 2.7 | 3.6 | 4.5 | 8.6 |  |  |  |  |
| Unpaid FFS Medicare bad debts / FFS Medicare revenue | 0.5 | 0.6 | 0.7 | 0.8 | 0.3 | 0.5 | 0.7 | 1.0 |  |  |  |  |
| FFS Medicare margin | -71.0 | -7.0 | -8.9 | -7.2 | -72.4 | -9.5 | -5.5 | -0.9 |  |  |  |  |
| All-payer total margin | 10.1 | 8.1 | 8.8 | 5.1 | 10.0 | 8.3 | 6.0 | 3.1 |  |  |  |  |

Illustrative simulations of distributing DSH and uncompensated care pools using MSNI payments

| $l$ |
| :--- |
|  |

Note: DSH (disproportionate share hospital), MSNI (Medicare Safety-Net Index), Q (quartile), FFS (fee-for-service), MA (Medicare Advantage). The DSH quartiles were based on the disproportionate share patient percentage. The unit of analysis is the quartile, with payments and costs of 651 hospitals in each quartile added to create aggregate payment changes and aggregate margins for the quartile. The aggregate margin is equivalent to a dollar-weighted margin for the hospitals. The full sample of 2,604 hospitals represents all hospitals paid through the acute inpatient prospective payment systems (excluding territories) with more than 200 Medicare discharges and complete data. The margins presented are the aggregate margins for each group. This analysis differs from the analysis in the June 2022 report in that it examines 2019 data (in which current-law payments were different) and does not allow any add-ons to Part B drug spending. In addition, we started payments at the 10th percentile of the MSNI distribution rather than the 5th percentile to increase targeting of the payments. We also did not allow any change in payments for hospitals currently choosing Medicare-dependent hospital status or sole community hospital status (and that thus receive payments partially based on historical costs). Despite these changes, the results are directionally consistent with the earlier analysis of how the MSNI would have affected payments in 2016.
*Estimates of change in aggregate all-payer margins assume that changes in Medicare Advantage (MA) payment rates equal changes in FFS Medicare rates (i.e., that MA plans pay FFS rates) and that the ratio of MA inpatient and outpatient volume to FFS volume can be approximated by the ratio of MA discharges to FFS discharges.

Source: MedPAC analysis of claims, cost report, and closure data.
report, we wanted to avoid a cliff where hospitals just below a threshold received no add-on and hospitals above that threshold received a dramatically higher
payment. Second, about 80 percent of IPPS hospitals now receive DSH and uncompensated care payments, and we wanted to limit the share of these hospitals that
would not receive any MSNI payments. In the current simulation, about 7 percent of hospitals would lose their DSH and uncompensated care payments and not receive any of the new MSNI payments. In 2019, these hospitals had an average all-payer total margin of 11.8 percent. At the same time, about 5 percent of hospitals currently do not receive any DSH or uncompensated care payments and would gain MSNI payments. In 2019, the hospitals that would gain Medicare safety-net funding had an average all-payer total margin of 4.5 percent.

We estimate that using the MSNI to redistribute existing DSH and uncompensated care funds would have increased Medicare payments to hospitals in the high-MSNI quartile by 3.9 percentage points, increasing the aggregate FFS Medicare margin from -0.9 percent to 3.0 percent (Table 3-7).

In turn, the higher Medicare margin for high-MSNI hospitals would result in a smaller difference in the all-payer total margin between hospitals in the highest and lowest MSNI quartiles. The difference would fall from 6.9 percentage points ( 10.0 percent to 3.1 percent) under current law to 5.2 percentage points ( 9.2 percent to 4.0 percent) under the MSNI redistribution.

To provide an illustrative example of how changing the pool of dollars would change the add-on payment, we estimated the effect on hospitals if the size of the FFS DSH and uncompensated care pool of dollars were increased from the approximately \$11.7 billion that was disbursed in 2019 to an illustrative $\$ 12.7$ billion. ${ }^{36}$ For every billion dollars added to the MSNI pool, overall Medicare FFS hospital spending would increase by about a half percent. The net effect is that the add-on would grow from zero at the 10th percentile of the distribution to about 29 percent at the 95th percentile and above in the distribution. In 2019, MSNI hospitals in the top quartile (which would receive a disproportionate share of any additions to the MSNI pool) would have seen their FFS Medicare margin increase by about 5.1 percentage points (from -0.9 percent to 4.2 percent). Our simulation assumed that CMS would provide hospitals serving MA patients with a commensurate adjustment; those additional MA payments would have totaled about $\$ 0.5$ billion in 2019. The combination of additional FFS and MA payments would cause high-MSNI hospitals' all-payer total margins to increase by about 1.3 percentage points
(from 3.1 percent to 4.4 percent) (Table 3-7). In 2019, the total cost of increasing FFS MSNI payments by $\$ 1$ billion and a commensurate add-on for hospitals treating MA patients would have been about $\$ 1.5$ billion. We expect that an equivalent percentage add-on to FFS and MA payments in 2024 would cost close to $\$ 2$ billion due to updates in Medicare payment rates and increases in total Medicare enrollment (primarily in MA) from 2019 to 2024.

## The MSNI tends to benefit hospitals with high Medicare shares and reduce payments to hospitals with low Medicare shares and high uncompensated care costs

Shifting safety-net payments from the current DSH and uncompensated care payments to new MSNIbased payments would change the distribution of payments in three important ways. First, because hospitals' dependence on Medicare patients is a factor in computing the MSNI, hospitals with higher shares of Medicare patients would tend to receive higher add-on payments per case. These hospitals also would receive the MSNI add-on payment for a greater share of the services they furnish because Medicare is a large share of their patient mix. Second, because Medicare would no longer directly subsidize Medicaid patients, hospitals with few Medicare patients and large Medicaid patient loads would see a reduction in payments. Third, because Medicare would provide only modest indirect support for uncompensated care, hospitals with low Medicare volume but high levels of uncompensated care would tend to receive less funding. Under the scenario in which current DSH and uncompensated care dollars would be redistributed and $\$ 1$ billion would be added to the FFS pool of safetynet funds, hospitals would still experience a decline in revenue if their current uncompensated care payments from Medicare were larger than the value of the proposed MSNI add-on payments (up to 29 percent). Overall, payments would shift toward hospitals serving high volumes of Medicare patients and, in particular, low-income Medicare patients.

To provide a greater understanding of which types of IPPS hospitals would gain and lose under a shift from the current DSH and uncompensated care payments to payments based on the MSNI, we provide some descriptive statistics on payment changes for 10 categories of hospitals under our MSNI

## Simulated effect of redistributing current DSH and UC payments under the MSNI and adding \$1 billion to the FFS MSNI pool by type of hospital, 2019

| Hospital characteristic | Mean MSNI percentage add-on to FFS Medicare payments* | Aggregate percentage change in: |  | Percentile effect on all-payer total margins in percentage points** |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | FFS Medicare revenue | All-payer total revenue | 5th | 25th | 75th | 95th |
| All IPPS hospitals | 10.4\% | 0.5\% | 0.1\% | -1.7\% | -0.4\% | 1.7\% | 4.6\% |
| Government ( $n=349$ ) | 14.0 | -7.5 | -0.6 | -2.6 | -0.5 | 1.6 | 4.6 |
| For profit ( $n=592$ ) | 11.6 | 2.3 | 0.8 | -1.7 | 0.0 | 2.4 | 5.7 |
| Nonprofit ( $n=1,663$ ) | 9.2 | 0.5 | 0.2 | -1.6 | -0.4 | 1.4 | 4.2 |
| Rural ( $n=611$ ) | 13.7 | 3.3 | 1.1 | -0.4 | 0.0 | 2.6 | 5.7 |
| Urban ( $n=1,990$ ) | 9.3 | 0.2 | 0.1 | -2.0 | -0.6 | 1.4 | 4.2 |
| Teaching ( $n=1,568$ ) | 10.1 | 0.1 | 0.0 | -2.3 | -0.6 | 1.4 | 4.0 |
| Nonteaching ( $n=1,033$ ) | 10.5 | 1.3 | 0.4 | -7.4 | 0.0 | 1.8 | 5.1 |
| MA share of stays |  |  |  |  |  |  |  |
| $<25 \%$ ( $n=1,308$ ) | 9.7 | 0.7 | 0.2 | -1.2 | 0.0 | 1.4 | 5.0 |
| 25\% to 50\% ( $n=949$ ) | 10.2 | 0.5 | 0.2 | -1.7 | -0.4 | 1.9 | 4.3 |
| > 50\% ( $n=347$ ) | 12.5 | -0.3 | -0.1 | -3.1 | -7.0 | 1.6 | 4.4 |

Note: DSH (disproportionate share hospital), UC (uncompensated care), MSNI (Medicare Safety-Net Index), FFS (fee-for-service), IPPS (inpatient prospective payment systems), MA (Medicare Advantage). The table presents unweighted mean values comparing payments that occurred in 2019 with what payments would have been under an MSNI distribution of safety-net dollars. Data include all IPPS hospitals in the United States (excluding territories) with more than 200 discharges and complete cost report data in 2019. The 5th and 95th percentiles on the right-hand side of the table illustrate that 5 percent had a reduction equal to or larger than the 5 th percentile and 5 percent had an increase equal to or larger than the 95th percentile in our 2019 simulation.
*Add-on adjustments are applied to inpatient and outpatient payments excluding Part B drugs.
**Estimates of change in total margins assume that MA plans shift payment rates to equal the shift in FFS payment rates and that the ratio of MA to FFS volume can be estimated using the ratio of MA discharges to FFS discharges.

Source: MedPAC analysis of cost report and claims data.
model and the addition of $\$ 1$ billion to the FFS MSNI pool (Table 3-8). ${ }^{37}$ Most of the hospitals that would gain under the redistribution are smaller hospitals with higher Medicare shares. Most hospitals that would experience a reduction in payments are larger hospitals that currently receive high uncompensated care payments.

On average, government-owned hospitals and rural hospitals would receive the highest MSNI add-on percentages (14.0 percent and 13.7 percent,
respectively) (Table 3-8). Nevertheless, because some government hospitals currently receive high levels of DSH and uncompensated care payments relative to their Medicare volume, under the MSNI, government hospitals in aggregate would see a decline in FFS Medicare payments of 1.5 percent (Table 3-8). ${ }^{38}$ Rural hospitals in aggregate would see an increase in FFS Medicare payments of 3.3 percent. Such hospitals would benefit because they tend to have high Medicare shares that are not factored into
current DSH percentages or uncompensated care payments. Rural hospitals would also tend to benefit from removing the distortion in uncompensated care payments that direct payments to hospitals with high MA shares (see Table 3A-3, p. 99, in the appendix to this chapter). In addition, for-profit hospitals would be slightly more likely to benefit from the policy than nonprofit hospitals because the Medicare patients served by for-profit hospitals are more likely to receive the LIS. In 2019, for-profit hospitals had an LIS share of 36 percent compared with nonprofits' 32 percent share (data not shown). (Government hospitals had an LIS share of 42 percent.)

Shifting to MSNI-based payments would also tend to increase add-on payments for hospitals with low MA shares of Medicare admissions and decrease payments for hospitals with higher shares of MA admissions (Table 3-8). This result could be due to several factors. One factor is that the current method of distributing uncompensated care funds favors hospitals with few FFS Medicare stays and higher numbers of MA stays (see Table 3A-3, p. 99, in the appendix to this chapter). The new MSNI method would address this issue. ${ }^{39}$

In Table 3-8, we present the 5th percentile of hospitals, which would see the largest declines in total margins, and the 95th percentile of hospitals, which would see the largest increases in total margins. The similarity across hospital types in total margin changes at the 5th and 95th percentiles indicates that the distribution of changes in Medicare revenue would be similar across the different types of hospitals. Under the MSNI policy, we expect that about 5 percent of providers in all categories would experience declines of at least 1 percent to 2 percent of all-payer total revenue, while about 5 percent of providers in all categories would experience at least a 4 percent to 5 percent increase in revenue. The percentage increases at the top end of the tail are larger than the decreases at the bottom end of the tail because smaller hospitals tend to gain more with the MSNI. In other words, a 1 percent to 2 percent decline in payments to a larger hospital can fund a 3 percent to 4 percent increase in payments to smaller hospitals.

Most hospitals in our simulation saw increases in Medicare payment rates under the MSNI policy because of the additional $\$ 1$ billion in FFS uncompensated care payments added to the

MSNI pool of funds. About 20 percent of hospitals would increase their total revenue by more than 2 percent, with the largest gains often going to hospitals with high FFS Medicare shares and few MA patients. In contrast, about 4 percent of hospitals would have their total revenue reduced by at least 2 percent. These hospitals tend to have relatively high uncompensated care payments and relatively small shares of FFS Medicare patients. Their revenue would see a decrease as Medicare safety-net payments transitioned away from directly funding uncompensated care to focus on assisting hospitals with high Medicare shares and, in particular, high shares of low-income Medicare patients.

Because there are some hospitals that would face material reductions in revenue under the MSNI policy, the Congress could phase in the policy for all hospitals over a set period of time (e.g., transition to the MSNI policy over three to five years). Alternatively, a transition could be managed through a stop-loss policy so that no hospital would experience changes (positive or negative) in Medicare payments of more than 5 percent in any one year because of the transition. This change would produce a variable transition, with some hospitals fully transitioned to the MSNI payments sooner than others. Both approaches would allow time for the hospitals facing the most substantial revenue reductions to try to augment revenues from existing sources and request additional financial support from state and local governments, as warranted. The portion of these hospitals with high cost structures may also be able to improve efficiencies.

## Incorporating the MSNI across FFS and MA

Nearly half of Medicare beneficiaries are enrolled in MA. ${ }^{40}$ Therefore, the MSNI was calibrated using FFS and MA data (when possible) and should be applied to hospital care provided to both MA and FFS beneficiaries. MA beneficiaries should be included when computing the MSNI because MA plans largely pay hospitals rates similar to FFS Medicare and hospitals likely incur similar costs for treating MA and FFS beneficiaries. ${ }^{41}$

Policymakers may choose different ways to incorporate the FFS MSNI payments (which are structured as claims-based add-ons) into MA per capita payments. Under a preferred pathway, CMS would calculate an

MSNI add-on percentage for each hospital, calculate MSNI add-on payments by applying the add-on percentage to each hospital's encounter claims for MA beneficiaries, and directly provide the add-on payment to hospitals, bypassing the MA plan itself in the transaction. ${ }^{42}$ Because the MSNI funds would be paid directly to hospitals, MSNI payments for FFS beneficiaries would be excluded from MA benchmarks, comparable with the way indirect medical education payments are currently made to hospitals for their FFS and MA patients. We believe there are several benefits to this approach:

- Safety-net payments would flow directly to Medicare safety-net providers and would not simply represent additional funds for MA plans to use at their discretion (which might be the case if MSNI payments were included in benchmarks).
- MA plans would not have an incentive to exclude safety-net providers with high MSNI add-on payments from their networks. Under current regulations, MA plans have an incentive to exclude hospitals with high DSH and uncompensated care add-ons from their networks because MA plans often pay FFS rates.
- Linking funds to encounter data could incentivize providers to encourage MA plans to improve their submission of encounter data.
- A key distortion in the way uncompensated care payments affect MA benchmarks would be removed. Currently, Medicare's uncompensated care add-on payment per FFS discharge varies such that the aggregate additional FFS add-on payments to each hospital equals a common expected percentage (e.g., 20 percent) of all hospitals' historical uncompensated care costs. This add-on can increase FFS payment rates by 30 percent or more (even 100 percent at hospitals with few FFS discharges). These higher FFS payments are incorporated into MA benchmarks. Because the uncompensated care payments are spread only across FFS discharges, the current policy favors hospitals with higher MA penetration (that is, with fewer FFS discharges over which to spread the additional payments). Fewer FFS discharges results in a higher adjustment per FFS discharge and a larger increase in MA benchmarks
(see Table 3A-3, p. 99, in the appendix to this chapter for an example).


## Interactions between the MSNI and other Medicare special payments

The MSNI is intended to compensate hospitals for the higher costs and lower revenues associated with treating a high share of Medicare beneficiaries, particularly low-income Medicare beneficiaries, and patients without insurance. However, many hospitals already receive special payment rates from Medicare that help compensate for these costs (to the extent that hospitals incur them) and help maintain access in certain areas or for specific populations. Such hospitals include sole community hospitals, Medicaredependent hospitals, critical access hospitals, and rural community hospital demonstration hospitals. Policymakers should consider requiring hospitals to choose between retaining their current special payment designations or receiving the IPPS rates with an MSNI supplement. Giving hospitals the option to choose their preferred payment mechanism maximizes flexibility for hospitals while making sure Medicare payments are not excessive (e.g., providing a 20 percent MSNI add-on to a hospital that Medicare already pays on a cost basis). In addition, policymakers may want to cap interactions with other existing IPPS payment adjustments, such as the low-volume hospital adjustment (which increases IPPS payments by up to 25 percent), such that the maximum cumulative add-on to IPPS payments from all special designations could not exceed a specified threshold (e.g., 30 percent).

## Recommendation

To better target hospitals serving low-income Medicare beneficiaries and fix adverse incentives with the current DSH and uncompensated care payments, current safety-net payments should be redirected to hospitals that have high MSNIs. These MSNI-based payments would adjust for the lower cost sharing received by high MSNI hospitals, the higher costs of low-income Medicare patients, and the need for an additional support to absorb any unforeseen costs of serving Medicare beneficiaries. Without additional safety-net funding, unforeseen reductions in the profitability of serving Medicare beneficiaries could be difficult to absorb for hospitals with high Medicare shares and few commercial patients.

RECOMMENDATION 3-2
In fiscal year 2024, the Congress should:

- begin a transition to redistribute disproportionate share hospital and uncompensated care payments through the Medicare Safety-Net Index (MSNI);
- add $\$ 2$ billion to the MSNI pool;
- scale fee-for-service MSNI payments in proportion to each hospital's MSNI and distribute the funds through a percentage add-on to payments under the inpatient and outpatient prospective payment systems; and
- pay commensurate MSNI amounts for services furnished to Medicare Advantage (MA) enrollees directly to hospitals and exclude them from MA benchmarks.

Each hospital's MSNI should be computed using three components: (1) the share of its Medicare volume associated with low-income beneficiaries, (2) the share of its revenue the hospital spends on uncompensated care (bad debts and charity care), and (3) the share of total volume associated with Medicare beneficiaries. Under this computation, Medicare would no longer subsidize Medicaid, as it does through its DSH payments. While the Commission emphasizes that scarce Medicare funds should be used to support care provided to Medicare beneficiaries and not crosssubsidize the care of other patient populations, we also acknowledge that replacing the current DSH and uncompensated care payments with new MSNI-based payments would lead to material changes for certain hospitals. A multiyear transition would provide time for hospitals and other payers to adjust to this new Medicare payment approach. (See text box, pp. 92-93, on the future roles of Medicare and Medicaid payments in supporting Medicare and Medicaid safety-net hospitals.)

CMS should define low-income Medicare beneficiaries as those who receive full or partial Medicaid benefits and those who do not qualify for Medicaid benefits in their states but who receive the Part D LIS because they have limited assets and an income below 150 percent of the federal poverty level. Using this definition would reduce the impact of variation in state Medicaid policies on Medicare payment and could encourage providers to make their patients aware of and help them enroll in Medicaid, the Medicare Savings

Programs (i.e., programs in which Medicaid helps pay for Medicare premiums and cost sharing), and the Part D LIS.

CMS should use a graduated linear increase in the MSNI percentage add-on amount. Using a continuous scale will minimize payment "cliffs" and ensure that most hospitals continue to receive some level of Medicare safety-net funding.

MSNI payments should be structured as add-on payments to Medicare payment rates and should apply to services provided under both the IPPS and the OPPS. However, coinsurance would continue to be based on the pre-MSNI payment amount to ensure that beneficiaries using Medicare safety-net hospitals would not pay more than patients at hospitals with fewer lowincome patients. However, separately payable Part B drugs should not be eligible for MSNI add-on payments because the acquisition costs of these drugs are unlikely to be higher for Medicare safety-net hospitals (and may even be lower for hospitals that qualify for 340B status). Further, including separately payable Part B drugs in this policy would create incentives for certain safety-net providers to specialize in providing expensive Part B drugs.

Policymakers should consider calculating MSNI add-on payments for services provided to MA enrollees by applying the add-on percentage to each hospital's encounter claims for MA beneficiaries and paying the resulting amount directly to hospitals. In doing so, MSNI payments for FFS beneficiaries would be excluded from MA benchmarks. This method would be similar to the way indirect medical education payments are currently made to hospitals for their FFS and MA patients. Making MSNI payments for MA enrollees directly to hospitals would reduce current incentives for MA plans to steer patients away from Medicare safety-net hospitals with high MSNI add-on payments. At the same time, linking funds to encounter data could incentivize hospitals to encourage MA plans to improve their submission of encounter data.

Many hospitals already receive special payment rates from Medicare to help ensure access to care for Medicare beneficiaries, including sole community hospitals, Medicare-dependent hospitals, critical access hospitals, and rural community hospital demonstration hospitals. Policymakers should

## The future roles of Medicare payments and Medicaid payments in supporting Medicare safety-net hospitals and Medicaid safety-net hospitals

To ensure access to care for patients with low incomes, it is important to understand the roles of Medicaid and Medicare in supporting Medicaid patients, Medicare dual-eligible patients, and uninsured patients. In 2019, the Medicaid program made about $\$ 13$ billion of Medicaid disproportionate share hospital (DSH) payments (which differ from Medicare DSH payments) to acute care hospitals (Medicaid and CHIP Payment and Access Commission 2022a). States have broad discretion in how their Medicaid DSH and other safety-net funds are allocated among hospitals. In some states, Medicaid DSH payments are highly concentrated at a few safety-net hospitals, while in other states they are more widely distributed across almost all hospitals. States can choose whether to allocate these funds based on hospitals' uncompensated care burdens. However, states must limit each individual hospital's Medicaid DSH payments to the sum of that hospital's Medicaid shortfall (the difference between the hospital's Medicaid costs and Medicaid revenues) and the uncompensated care costs associated with uninsured patients. ${ }^{43}$

There are three situations under which Medicare and Medicaid can make DSH or uncompensated care payments to help cover the costs of the same uninsured patients. First, uncompensated care costs for the uninsured can both be partially covered by the Medicare uncompensated care pool and be a qualified expense for Medicaid DSH payments. When Medicaid computes uncompensated care costs, the program measures the amount of uncompensated care provided to uninsured patients. These costs are computed prior to any payments by Medicare from its uncompensated care pool and are therefore measured as gross uncompensated care costs and not costs net of Medicare support. Second, some states have also received Section 1115 demonstration authority to make Medicaid uncompensated care pool payments that are similar to DSH payments and may similarly pay for uncompensated care. Third, states can require Medicaid managed care plans to provide "directed payments" to specific hospitals. For example, the state can mandate higher Medicaid rates to safetynet hospitals (Medicaid and CHIP Payment and Access Commission 2022b).
consider requiring such hospitals to choose between retaining their current special payment designations or receiving IPPS rates with an MSNI supplement. Giving hospitals the option to choose their preferred payment mechanism maximizes flexibility for hospitals while ensuring that Medicare payments are not excessive. In addition, policymakers may want to cap interactions with other existing IPPS payment adjustments (e.g., the low-volume hospital adjustment) such that the maximum cumulative add-on to IPPS payments from all special designations could not exceed a specified threshold (e.g., 30 percent).

## RATIONALE 3-2

The Commission's analyses have shown, on average, that Medicare beneficiaries have good access to hospital care, and hospitals' total (all-payer) margins are near record highs as a result of rapidly increasing rates paid by commercial insurers. However, hospitals' aggregate Medicare margin is negative and near zero even for relatively efficient hospitals. For ACHs, Medicare patients-in particular low-income Medicare patients-generate lower revenues per service and may be associated with higher costs. This lower level of profitability may render Medicare safety-net hospitals

The future roles of Medicare payments and Medicaid payments in supporting Medicare safety-net hospitals and Medicaid safety-net hospitals (cont.)

In recent years, Medicaid has shifted away from supporting Medicare dual-eligible patients. Under the Consolidated Appropriations Act, 2021 (P.L. 116260), beginning in October 2021, losses on Medicare dual-eligible beneficiaries can no longer be used to justify Medicaid DSH payments. ${ }^{44}$ Medicaid DSH payments now focus almost exclusively on the costs of Medicaid patients and the uninsured. Consistent with this approach, the Commission's recommendation that Medicare begin to redistribute DSH and uncompensated care payments through the Medicare Safety-Net Index (MSNI) would distinguish Medicare's responsibilities from those of Medicaid. Under the MSNI proposal, the Medicare program would have full responsibility for Medicare patients (including dual-eligible patients) but would no longer provide higher Medicare payments for hospitals with greater Medicaid patient shares. The recommendation would also limit Medicare's support of uncompensated care and tie that support to a hospital's Medicare volume. By contrast, the Medicaid program would have full responsibility for Medicaid patients (excluding dual-eligible
patients) and would continue to directly support the uninsured through Medicaid DSH payments.

If Medicare shifted to providing safety-net support based on the MSNI, direct support for uncompensated care would come only from Medicaid, and Medicaid's uncompensated care support would be limited to covering the costs of the uninsured. The Medicare program would indirectly support uncompensated care, but most Medicare safety-net funding would be focused on supporting the costs of low-income Medicare patients. The Commission takes no position on whether hospitals with high Medicaid patient shares and uncompensated care burdens should receive more or less funding from Medicaid and local governments. However, the Commission asserts that, just as Medicaid DSH payments are focused on hospitals with high uninsured and Medicaid shares, Medicare safety-net payments should be used primarily to support hospitals that provide care to larger shares of low-income Medicare patients rather than the uninsured or Medicaid patients.
less able to absorb unforeseen financial challenges and can undermine their ability to compete with wealthier hospitals for labor and technology.

Medicare already provides substantial safety-net funding to hospitals, but there are several problems with the way Medicare distributes these funds, including omitting a hospital's Medicare share from its funding formulas in favor of subsidizing Medicaid payments and making supplemental payments only for inpatient services. The Commission-developed MSNI better identifies hospitals at financial risk and would better focus scarce Medicare resources to support hospitals that are key sources of care for low-income Medicare beneficiaries.

The MSNI would not only create greater financial stability for hospitals serving high shares of lowincome Medicare patients, it would also increase all hospitals' incentives to serve Medicare patients. The Commission estimates that the marginal profit on Medicare patients was about 8 percent in 2021. This marginal profit is computed by examining marginal revenue from serving Medicare patients compared with marginal costs. Because FFS uncompensated care (UC) payments are not tied to Medicare volume, they do not increase as the hospital serves more Medicare patients. Thus, UC payments are not part of marginal revenue per unit of service. In contrast, if Medicare's UC payments were distributed via the MSNI, they would become add-on payments and increase the marginal revenue of serving Medicare patients. In aggregate,
hospitals' marginal profit on providing inpatient and outpatient services to FFS Medicare beneficiaries would increase from about 8 percent to about 12 percent. ${ }^{45}$

The Commission anticipates that adding a combined \$2 billion in additional Medicare payments for FFS and MA payments would be enough to help maintain the financial viability of Medicare safety-net hospitals. (The magnitude of the $\$ 2$ billion add-on could grow annually by the hospital market basket.)

We expect the additional funds to immediately be distributed through the MSNI in 2024 and future years, thus increasing MSNI hospitals' FFS and MA payments by about $\$ 2$ billion in each year. In addition, over a period of years, the current FFS DSH funds, FFS UC funds, and the share of MA benchmarks derived from those funds would be transferred to the MSNI pool. Eventually the MSNI would replace all DSH funds, UC
funds, and the share of MA benchmarks derived from that spending. With this transition, the MSNI would remove the adverse incentives and inaccurate targeting of Medicare's current safety-net payments. However, DSH computations could still be made to determine eligibility for certain programs, such as the 340B program.

## IMPLICATIONS 3-2

## Spending

- We expect the recommendation to increase spending relative to current law by between $\$ 750$ million and $\$ 2$ billion in 2024 and by over $\$ 10$ billion over five years.


## Beneficiary and provider

- We expect the recommendation to increase hospitals' willingness and ability to treat lowincome Medicare beneficiaries.



## Developing the Medicare Safety-Net Index

Table 3A-1 explains in detail how the MSNI was created. It is designed to target financially vulnerable hospitals and in particular hospitals that serve large shares of low-income Medicare beneficiaries. These hospitals are vulnerable to unforeseen circumstances (such as the underestimate of input price inflation) that cause Medicare program payments to be lower than optimal in some years and too high in other years.

## The new Medicare safety-net payment would continue the evolution of Medicare's hospital safety-net payments away from traditional DSH payments

To put the proposed MSNI change to safety-net payments in context, Table 3A-2 (p. 98) provides a summary of how Medicare safety-net payments have evolved over time. The table explains how the original DSH payments supported hospitals with higher Medicaid shares and higher Medicare inpatient volume, how the program shifted in 2018 away from supporting higher Medicaid and Medicare volumes to more directly supporting uncompensated care, and how the MSNI would shift support to hospitals with higher shares of low-income Medicare patients. Should the MSNI approach be adopted, the program will have evolved from directing higher payments to providers with high Medicaid shares, then to hospitals with high uncompensated care costs, and finally, under the MSNI, to supporting hospitals that serve a disproportionate share of low-income Medicare beneficiaries.

## Medicare's current method of distributing UC payments is biased against hospitals with high FFS volume and low MA volume

The Affordable Care Act of 2010 (ACA) requires CMS to redistribute a portion of DSH payments to fund hospitals' uncompensated care costs. Starting in 2014, the ACA required CMS to reduce operating DSH payments to an amount equal to 25 percent of priorlaw operating DSH payments. The remaining 75 percent is then primarily used to fund a UC pool. (For more information on Medicare's DSH and UC costs, see our June 2022 report to the Congress.) Each DSH hospital receives a share of the FFS UC pool equal to its share of aggregate UC costs at all DSH hospitals. The ACA did not specify the mechanism CMS should use to distribute these UC funds.

In IPPS rulemaking for fiscal year 2014, CMS originally proposed to make interim UC payments on a periodic basis (not associated with any claims). However, in the final rule, CMS implemented a policy that makes interim UC payments as add-on payments to each FFS IPPS discharge. ${ }^{46}$ CMS made this change after hospitals raised concerns that almost all hospitals had contracted with MA organizations to use the Medicare IPPS Pricer software in setting their payment rates, resulting in MA plans generally paying FFS rates (Berenson et al. 2015, Centers for Medicare \& Medicaid Services 2013, Maeda and Nelson 2017). Therefore, if CMS had excluded UC payments from the IPPS payment rate, MA plans would have reduced payments to DSH hospitals (Centers for Medicare \& Medicaid Services 2013). Because CMS decided to include the UC payments in the IPPS Pricer, MA plans make UC payments to hospitals on a per discharge basis similar to FFS UC payments per discharge.

For 2023, CMS established the FFS UC pool at $\$ 6.9$ billion dollars. Since DSH hospitals' historical UC costs were about \$34 billion, each DSH hospital therefore will receive approximately 20 percent of its historical UC costs as FFS add-on payments. These add-on payments are distributed as an interim payment per FFS discharge based on the hospital's historical FFS stays. ${ }^{47}$ In addition, because MA plans generally pay the same rates as those under FFS, hospitals effectively receive UC payments from MA plans for their enrollees on a per discharge basis, similar to FFS UC payments per discharge.

However, as illustrated in Table 3A-3 (p. 99), the current system is inequitable. Because the FFS interim per discharge UC payments are included in the IPPS Pricer used by MA plans, the net UC payments that hospitals will receive from FFS and from MA plans in 2023 are approximately the sum of:

- add-on payments to FFS rates = historical UC costs $\times 0.20$
- add-on payments to MA rates = MA discharges $\times$ (historical UC costs $\times 0.20 /$ historical FFS discharges)

Notably, the MA add-on payment formula can be rewritten as (MA discharge / FFS discharges) $\times$ (historical UC costs x 0.20). The formulas above illustrate how hospitals with larger MA shares (i.e., a

3A-1 The MSNI supports hospitals that treat a high share of low-income Medicare beneficiaries, have high uncompensated care burdens, or serve a high share of Medicare beneficiaries

| MSNI components | Weight | Data | Principle | Considerations |
| :---: | :---: | :---: | :---: | :---: |
| LIS share of FFS Medicare claims (inpatient and outpatient) | 1 | Average of inpatient and outpatient percentages: Inpatient <br> - FFS inpatient claims for LIS beneficiaries (numerator) <br> - FFS inpatient claims for all beneficiaries (denominator) <br> Outpatient <br> - FFS outpatient claims for LIS beneficiaries (numerator) <br> - FFS outpatient claims for all beneficiaries (denominator) | - Treating LIS beneficiaries could entail costs not captured by the MS-DRG or APC systems. <br> - Hospitals that treat a large share of LIS beneficiaries tend to have more Medicare bad debts (i.e., receive a smaller share of allowed cost sharing). Medicare currently pays for 65 percent of these bad debts for FFS Medicare beneficiaries. <br> - Measure is similar to the current DPP measure but includes a broader measure of low-income Medicare beneficiaries and does not explicitly include a measure of Medicaid dependence. While Medicaid is not explicitly in the formula, hospitals with high shares of LIS beneficiaries also tend to have higher Medicaid shares. | - This component could be expanded to include LIS share of MA claims if/ when the encounter data are sufficiently complete. |
| Uncompensated care costs as a share of a hospital's total revenue | 1 | - Uncompensated care costs (nonMedicare bad debt and charity care) (numerator) <br> - Total, allpatient revenue (denominator) <br> - Data pulled from cost reports | - Hospitals that have a high share of uncompensated costs could face more financial pressure than the average hospital. <br> - Uncompensated care costs could stem from treating patients without insurance or patients with insurance who cannot afford to pay their deductibles or cost sharing. | This component implies that Medicare would indirectly subsidize non-Medicare patients, but the effect would be much less direct than the current system and would be tied to Medicare volume. |
| Medicare share of all hospital inpatient days | 0.5 | - MA + FFS hospital acute inpatient days (numerator) <br> - Total, all-payer hospital inpatient days (denominator) <br> - Data pulled from cost reports | - Over the last 25 years, hospitals' Medicare margins have shifted from being substantially positive to substantially negative. <br> - Therefore, hospitals that disproportionately treat Medicare beneficiaries face increased risk of financial pressure or closure. <br> - Weight of 0.5 is based on regression analyses that show the effect of Medicare shares on margins is about half that of the LIS share and uncompensated care cost measures. | - Outpatient volume could be included if/when MA encounter data are more complete. <br> - MA days should be included in determining safety-net status because those hospital patients have similar costs and revenue as FFS patients. |

[^3][^4]
## Characteristics of hospitals that benefit from four different safety-net payment mechanisms

| Safety-net payment policy | Characteristics of hospitals that benefit more | Characteristics of hospitals that benefit less |
| :---: | :---: | :---: |
| Traditional DSH <br> From 1986 to 2013, there was a percentage add-on to IPPS payments based on each hospital's (1) Medicaid share of total inpatient days and (2) SSI beneficiaries' share of Medicare inpatient days. | - High Medicare inpatient volume (the add-on is a Medicare inpatient add-on) <br> - High share of Medicaid days <br> - High share of Medicare patients on SSI | - High level of uncompensated care relative to Medicare revenue <br> - Outpatient-focused hospitals |
| DSH and temporary UC <br> From 2014 to 2017,* CMS paid hospitals add-ons to IPPS payments equal to: <br> - $25 \%$ of the traditional DSH payment <br> - plus a fixed payment per Medicaid or Medicare SSI day (e.g., \$174/day in 2016). Both are add-ons to FFS IPPS payments. | - High number of Medicaid days <br> - High number of Medicare SSI days | - Few Medicaid inpatient days relative to overall Medicare revenue <br> - Outpatient-focused hospitals |
| Current DSH and UC <br> - From 2018 to 2020,* CMS transitioned from the temporary model to the current DSH/UC model. Hospitals currently receive $25 \%$ of traditional DSH. <br> - Hospitals also currently receive approximately $20 \%$ of uncompensated costs as an add-on to FFS inpatient payments. | - High level of UC relative to total revenue <br> - High levels of MA patients relative to FFS patients | - High number of FFS Medicare patients but relatively little UC |
| Illustrative MSNI <br> CMS would pay hospitals add-ons to Medicare IPPS and OPPS payments based on each hospital's (1) Medicare shares, (2) share of their Medicare patients receiving LIS benefits, and (3) UC costs relative to total revenue. | - High Medicare share of days relative to all inpatient days <br> - High share of LIS Medicare claims relative to all Medicare claims <br> - Outpatient-focused hospitals benefit more than in the other models | - High UC burden but few Medicare patients |

[^5]Source: MedPAC.
large MA discharges to FFS discharges ratio) will receive a higher share of their UC costs paid by Medicare and hospitals with low MA shares will receive a lower share of their UC costs paid by Medicare. (For an example, see Table 3A-3.)

As shown in Table 3A-3, Hospitals A and B both have historical UC costs of $\$ 2$ million and will admit 1,000 Medicare beneficiaries in 2023. However, Hospital A will admit 250 FFS beneficiaries and 750 MA enrollees, while Hospital B will admit 750 FFS beneficiaries and

## Example of how uncompensated care payments are biased against hospitals in markets with primarily Medicare fee-for-service patients

|  | Illustrative Hospital A (higher MA share) | Illustrative Hospital B (lower MA share) |
| :---: | :---: | :---: |
| Historical uncompensated care costs | \$2 million | \$2 million |
| Medicare discharges in 2023 |  |  |
| FFS (historical and 2023) | 250 | 750 |
| MA | 750 | 250 |
| Total | 1,000 | 1,000 |
| Uncompensated care payments in 2023 |  |  |
| FFS | $\$ 0.4$ million ( $\$ 2$ million $\times 20 \%$ ) | $\$ 0.4$ million ( $\$ 2$ million $\times 20 \%$ ) |
| MA (pays FFS prices) | $\$ 1.2$ million <br> ( $\$ 0.4$ million / $250 \times 750$ ) | \$0.13 million <br> ( $\$ 0.4$ million $/ 750 \times 250$ ) |
| Total FFS + MA | \$1.6 million | \$0.53 million |
| Share of uncompensated care costs paid by Medicare | 80\% | 27\% |

Note: MA (Medicare Advantage), FFS (fee-for-service). In 2023, disproportionate share hospitals will receive FFS uncompensated care payments equal to approximately 20 percent of their historic uncompensated care costs. Based on the literature and staff discussions with insurers and hospital systems, we assume that MA plans pay hospitals rates approximately equal to FFS rates.

Source: MedPAC.

250 MA enrollees. However-despite having equal UC costs-the second hospital receives about one-third the UC payments received by the first hospital because the second hospital's FFS share of discharges is onethird the first hospital's FFS share. The system is set up to make sure that FFS Medicare pays each DSH hospital an equal share of its UC costs, but current policy's unintended consequence is that MA plans can pay each hospital vastly different shares of their UC costs. Larger ratios of MA discharges to FFS discharges result in higher total UC payments.

To avoid the payment rate distortions and MA benchmark distortions caused by the current system for distributing UC payments, the Commission has repeatedly suggested that CMS pay hospitals directly for a portion of their UC costs and that the MA plans' portion also be paid directly by the Medicare program (Medicare Payment Advisory Commission 2022b, Medicare Payment Advisory Commission 2013).

## Endnotes

1 Throughout this chapter, we use the term "FFS Medicare" as equivalent to the CMS term "Original Medicare."

2 For example, Medicare pays separately for general acute care hospitals' facility costs for services provided in hospitalbased psychiatric units, post-acute care units, and clinics. Medicare also pays separately (outside of the IPPS and OPPS) for hospitals' direct costs of graduate medical education, as well as organ acquisition. These other Medicare payment methodologies are beyond the scope of this chapter.

3 Unless otherwise noted, all years referring to inpatient services refer to fiscal year while those referring to outpatient services refer to calendar year, consistent with when CMS updates these payment systems. For more details on the IPPS and OPPS, see Hospital Acute Inpatient Services Payment System at https://www.medpac.gov/wp-content/ uploads/2021/11/MedPAC_Payment_Basics_22_hospital_ FINAL_SEC.pdf and Outpatient Hospital Services Payment System in our Payment Basics series at https://www.medpac. gov/wp-content/uploads/2021/11/MedPAC_Payment_ Basics_22_OPD_FINAL_SEC.pdf.

4 Under the IPPS and OPPS, FFS Medicare pays the prospective rate minus any beneficiary cost-sharing responsibilities (which the provider collects from the beneficiary or a supplemental insurer). Medicare reimburses hospitals for 65 percent of bad debts resulting from beneficiaries' nonpayment of cost sharing after hospitals have made reasonable efforts to collect the unpaid amounts.

5 For more details on the CAH payment system, see Critical Access Hospitals Payment System in our Payment Basics series at https://www.medpac.gov/wp-content/ uploads/2021/11/MedPAC_Payment_Basics_22_CAH_ FINAL_SEC.pdf.

6 Medicare uses the OPPS to pay for the facility costs of outpatient services at post-acute care hospitals (i.e., longterm care and rehabilitation hospitals), at certain specialized short-term acute care hospitals (i.e., psychiatric, cancer, and children's hospitals), and at community mental health centers.

7 While the focus of this chapter is on assessing the adequacy of IPPS and OPPS payments, we include all general ACHs (defined as those paid under the IPPS as well as CAHs and ACHs in Maryland and in U.S. territories) in our indicators of beneficiaries' access to care because all general ACHs provide a range of acute hospital inpatient and outpatient services to FFS Medicare beneficiaries and therefore can serve as substitutes for care at general ACHs paid under the IPPS and OPPS.

8 Hospital closures are defined as cessation of Medicare beneficiaries' access to inpatient services at a general short-term ACH or CAH in the United States (exclusive of territories). Closures do not include the relocation of inpatient services from one hospital to another under common ownership within 10 miles, nor do closures include hospitals that both opened and closed within a 5-year time period. The number of hospital closures and openings in a given year can change over time as hospitals reopen or dates of closure are updated.

9 We measure closures during each fiscal year (to match the timeframe of Medicare inpatient payment rate changes). Other sources such as the University of North Carolina measure closures during each calendar year.

10 Small rural hospitals are eligible to convert to REHs, which provide 24/7 emergency services and other outpatient services. REHs receive a monthly fixed rate for their standby costs, enhanced outpatient rates, and standard rates for other services.

11 Since mid-2020, hospitals have had to report weekly occupancy data to the Department of Health and Human Services. According to these data, general ACHs' occupancy rates in fiscal years 2021 and 2022 were about 74 percent and 77 percent, respectively, with some hospitals exceeding 90 percent in certain months. These higher occupancy rates may more accurately reflect decreases in staffed beds during part of the year, but they may also reflect inaccurate data from some hospitals.

12 The decline in the number of inpatient stays ( -6.1 percent) was larger than the decline in stays per beneficiary ( -1.8 percent) because there was a 4.3 percent decline in FFS beneficiaries (as a greater share of Medicare beneficiaries enrolled in MA).

13 CAHPS ${ }^{\circledR}$ is a registered trademark of the Agency for Healthcare Research and Quality.

14 The all-payer operating margin at CAHs was also a record high of 10.8 percent ( 6.0 percent exclusive of federal relief funds).

15 The federal relief funds are primarily from the Provider Relief Fund but in 2020 also included forgiven loans from the Paycheck Protection Program.

16 The increase in IPPS hospitals' operating margin in 2021 was even larger prior to the inclusion of relief funds (over 5 percentage points), as hospitals' revenue prior to relief
funds increased faster (over 13 percent). The rapid revenue growth from 2020 reflects the low 2020 level of operating revenue (excluding relief funds). IPPS hospitals' all-payer total margin had an even larger increase in 2021, growing over 4 percentage points (near 6 percentage points excluding relief funds), reflecting strong investment returns.

17 We calculated aggregate operating margins net of interest expense, before taxes and extinguishment of debt, based on hospital systems' financial reports.

18 "Same-hospital net patient service revenue per adjusted admission decreased 4.2 percent year-over-year for third quarter 2022, primarily due to lower COVID-19-related acuity and lower COVID-19 volumes, partially offset by improved pricing yield. COVID-19 admissions were 6 percent of total admissions in the third quarter of 2022 versus 10 percent in the third quarter of 2021" (Tenet Health 2022).

19 Given that hospitals with distinct units can affect the margin of inpatient and outpatient service lines based on where they treat patients (e.g., having a SNF in the hospital may allow earlier discharges from the inpatient unit), we focus our Medicare margin discussion on hospitals' aggregate Medicare margin across multiple hospital service lines (including inpatient, outpatient, swing bed, skilled nursing, rehabilitation, psychiatric, and home health services) as well as direct graduate medical education and uncompensated care payments.

20 Because federal relief funds were intended to help cover lost revenue and payroll costs-including lost revenue from Medicare patients and the cost of staff who help treat these patients-we include a portion of these relief funds (based on FFS Medicare's share of 2019 all-payer operating revenue) in our Medicare margins. Using this method, we allocated $\$ 3.5$ billion of the $\$ 18$ billion in federal funds that hospitals reported on their cost reports with midpoints in fiscal year 2021 toward hospitals' care of FFS Medicare beneficiaries.

21 We estimated that the effect of the suspension of the 2 percent sequestration on IPPS payments per stay in fiscal year 2021 was a 1.1 percent increase relative to 2020 for two reasons. First, the suspension was in effect for all of fiscal year 2021, compared with five months of fiscal year 2020. Second, the 2 percent sequestration does not apply to FFS Medicare beneficiary cost sharing, which is about 20 percent of all IPPS payments.

22 Under current law, aggregate uncompensated care payments are set prospectively by CMS as the product of two estimates for the upcoming payment year: 75 percent of DSH payments under prior law and the uninsured rate as a percentage of the rate in 2013. Like other Medicare payments, uncompensated care payments are subject to sequestration (when it is in
effect). In 2021, estimated DSH payments decreased about 9 percent while uninsured rates increased by slightly less. However, as sequestration was suspended for all of 2021 but only part of 2020, the net effect was a minimal change in Medicare's uncompensated care payments to IPPS hospitals.

23 The OPPS also applies budget-neutrality factors to the base rate; however, these offset the estimated effects of other policy changes (such as updated geographic adjustments and pass-through payments) and therefore should not affect total payments.

24 We estimated that the effect of the suspension of the 2 percent sequestration on Medicare program OPPS payments per beneficiary in calendar year 2021 was a 0.6 percent increase relative to 2020 for two reasons. First, the suspension was in effect for all of calendar year 2021, compared with eight months of calendar year 2020. Second, the 2 percent sequestration does not apply to FFS Medicare beneficiary cost sharing, which is about 20 percent of all OPPS payments.

25 If costs would have been reduced more in the absence of relief funds, the margin decline would have been smaller.

26 We have also found that hospitals under financial pressure (those that do not have material profits on non-Medicare patients) have a stronger incentive to control costs and roughly broke even in Medicare in recent years. For-profit hospitals, which have an incentive to maximize shareholder returns, have also roughly broken even in Medicare in recent years (Medicare Payment Advisory Commission 2021).

27 The objective of this analysis is to find a subset of the relatively efficient hospitals rather than to identify all efficient hospitals. For example, we exclude from our analysis small hospitals with less than 500 inpatient stays, not because we know they are inefficient but because we have an insufficient volume of claims to know whether they performed at a relatively efficient level.

28 We use medians rather than means to limit the influence of outliers on our set of efficient providers.

29 We do not adjust our costs per inpatient stay for economies of scale. However, we excluded all hospitals with fewer than 500 Medicare inpatient stays from our analysis. For the remaining hospitals, economies of scale are not a material factor when evaluating costs per discharge because costs are roughly proportionate to the volume of stays for hospitals with over 500 Medicare stays per year (generally over 1,000 all-payer stays). Teaching hospitals tend to have higher costs per stay, but we standardize costs per stay by adjusting for the effect of case mix, outlier cases, and the cost of training residents. After these adjustments, teaching hospital costs,
on average, are similar to nonteaching hospital costs. For a more complete description of the methodology, see online Appendix 3-B from our 2016 report to the Congress, available at http://www.medpac.gov.

30 We adjust costs per stay for the share of Medicare patients that are on Supplemental Security Income (SSI). However, we do not adjust readmission or mortality metrics for patient income, in keeping with our policy of not adjusting quality metrics for income. The efficient group of hospitals tends to have a smaller share of low-income Medicare beneficiaries. The median share of Medicare patients on SSI for efficient hospitals is 6.3 percent and the median share for other hospitals is 7.8 percent. In 2022, we also developed a measure of Medicare safety-net status called the Medicare Safety-Net Index (MSNI) (see the appendix to this chapter). Hospitals in the highest quartile of the MSNI metric (the sum of the share of Medicare beneficiaries receiving Part D's low-income subsidy (LIS) benefit, one-half the Medicare patient share, plus uncompensated care costs divided by total revenues) are half as likely to be in our efficient-provider group. These hospitals tend to have low costs, but they perform worse on mortality and readmission metrics, possibly due to their small size and the fact that high-MSNI hospitals have higher shares of low-income Medicare beneficiaries.

31 CMS is still evaluating how to apply the Supreme Court's decision in American Hospital Association v. Becerra, 142 S . Ct. 1896 (2022) to 2018-2012. In the 2023 OPPS final rule, CMS addressed the court ruling only for 2023 by reverting the payments for 340B drugs back to average sales price plus 6 percent (the rate prior to 2018 , when CMS lowered the rate to average sales price minus 22.5 percent).

32 Our low-income definition (those receiving the LIS in Part D) is much more inclusive than the current definition of lowincome patients used in the current disproportionate share formula (those receiving Supplemental Security Income (SSI)). Our prior work indicated that the LIS variable was a better predictor of closure and margins than the SSI variable, but they are positively correlated (correlation coefficient of 0.81).

33 The add-on amount determines the amount in the FFS Pricer and thus most MA payment amounts. The add-on is seen as an interim payment amount. At the end of the year, CMS makes additional adjustments to uncompensated care payments so that each hospital receives a share of uncompensated care payments equal to that hospital's share of all DSH hospitals' uncompensated care costs. Thus, the FFS Pricer amount (the Pricer is software CMS uses to set interim FFS Medicare prices and that MA plans in turn base their prices on) does not determine the final amount of uncompensated care payments received by DSH hospitals. In contrast, MA payments are determined by the FFS Pricer and are not reconciled at the end of the year.

34 The DSH metric we use is called the DSH patient percentage, which is the sum of two ratios: Medicare Supplemental Security Income (SSI) days (for MA and FFS patients) as a share of all Medicare days, and days in which Medicaid is a primary payer as a share of all inpatient days.

35 Starting at the 10th percentile would result in about 170 hospitals that currently receive DSH and uncompensated care payments not receiving any Medicare safety-net payments. Alternatively, the policy could start at the 5th percentile to reduce the number of hospitals that currently receive DSH payments but would then receive no MSNI payments.

36 While the total amount of DSH and uncompensated care payments distributed to hospitals in 2019 (after accounting for sequestration) was about $\$ 11.7$ billion, the amount distributed to the hospitals in our simulation was $\$ 11.2$ billion. Not all hospitals were included in our simulation because some hospitals had incomplete data to create the MSNI or did not meet our simulation requirement of having a minimum of 500 FFS discharges.

37 Under this model of the MSNI, certain hospitals that currently are paid based on historical costs as a sole community hospital (SCH) or partially based on historical costs as a Medicare-dependent hospital (MDH) would not see an FFS shift in revenue. Under an MSNI policy, these hospitals would receive the higher of the current MDH or SCH payments based on historical costs or the benefit of the MSNI adjustment. Therefore, the benefits to rural hospitals are conservatively stated in this chapter.

38 Currently, government-owned hospitals' DSH and uncompensated care payments in some cases can result in an 80 percent or larger increase in their Medicare payments relative to standard Medicare rates.

39 We tested to see if the difference was due to rural areas, but even limiting the analysis to urban hospitals, hospitals in markets with lower MA penetration tended to benefit more from the transition to the MSNI.

40 In 2021, about 46 percent of beneficiaries with Part A and Part B were enrolled in MA plans, up from 26 percent in 2010 (Medicare Payment Advisory Commission 2021).

41 Hospital representatives have said that MA plans typically pay FFS rates for hospital care but that hospitals (1) receive lower total payments from MA plans because of increased rates of medical necessity denials by MA plans and (2) incur higher administrative costs for MA beneficiaries relative to FFS beneficiaries because of prior authorization processes put in place by MA plans. We cannot quantify these effects.

42 The claims could be priced using FFS prices.
43 The Medicaid program does not have a definition of "safetynet" hospital. However, hospitals with a Medicaid inpatient utilization rate at least one standard deviation above the mean for the state are "deemed DSH hospitals" and states are required to provide some Medicaid DSH payments to those hospitals (Medicaid and CHIP Payment and Access Commission 2022a).

44 The law exempts the 3 percent of hospitals with the highest number and share of patients who are eligible for Medicare and receive Supplemental Security Income (SSI) from this change (Medicaid and CHIP Payment and Access Commission 2022a).

45 There is also a secondary effect. As FFS inpatient stays increase, UC payments per stay decrease, which creates a decrease in MA prices paid per unit of service. Shifting to the MSNI would remove this distortion.

46 In each year's IPPS final rule, CMS first computes the FFS UC pool as an amount equal to 75 percent of what DSH payments would have been under prior law (reduced by an
amount to reflect declines in the share of the population that is uninsured). This computation yields a fixed pool of FFS UC dollars to be distributed among DSH hospitals. Each DSH hospital's share of that pool of dollars is equal to that hospital's historical UC costs divided by the aggregate of all DSH hospitals' historical UC costs.

The uncompensated care payments due to each hospital are then divided by that hospital's historical number of FFS discharges to arrive at a per discharge add-on amount. That hospital-specific add-on amount is added to each hospital's inpatient payment rate. To the extent that actual FFS discharges differ from this historical number, the difference is reconciled in the final cost report settlement each year, to ensure that each hospital receives exactly the amount it is due as published in that year's final IPPS rule.

47 For 2023, the historical UC costs are based on the average of 2018 and 2019 cost reports, and historical FFS discharges are the average of 2018, 2019, and 2021 FFS discharges. In addition, starting in 2023, DSH hospitals in Puerto Rico and hospitals administered by the Indian Health Service will receive supplemental UC payments.

## References

Adegbesan, A. 2022. Hospitals to lean on more expensive travel nurses even after Covid. Bloomberg News, March 15. https://www.bloomberg.com/news/articles/2022-03-15/ budget-busting-travel-nurses-to-rack-hospitals-even-aftercovid?leadSource=uverify\%20wall.

Ascension. 2022a. Consolidated financial statements and supplementary information years ended June 30, 2022 and 2021, with reports of independent auditors. https://ascension. org/-/media/Files/Ascension/About/Community-Investor-Relations/2022/Consolidated-Ascension-Financial-Statements-Q4-FY22.pdf?la=en\&hash=17A905C173689E9F8323F399A83A85B7 6DF61117.

Ascension. 2022b. Management's discussion and analysis of financial condition and results of operations for Ascension, as of and for the years ended June 30, 2022 and 2021. https:// ascension.org/-/media/Files/Ascension/About/Community-Investor-Relations/2022/Ascension-Management-Discussion-and-Analysis-Q4-FY22.pdf?la=en\&hash=81465554EBD0A72F3FF0 DB91EC6B8954CD8A61FC.

Ascension. 2020. Consolidated financial statements and supplementary information years ended June 30, 2020 and 2019, with reports of independent auditors. https://ascension. org/-/media/Files/Ascension/About/Community-Investor-Relations/2020/Consolidated-Ascension-Financial-Statements-Q4-FY20-updt.pdf?la=en\&hash=83394A82F76D24CF069CF2ECD2 388F24AE8747B2.

Berenson, R. A., J. H. Sunshine, D. Helms, et al. 2015. Why Medicare Advantage plans pay hospitals traditional Medicare prices. Health Affairs 34, no. 8 (August): 1289-1295.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2013. Medicare program; hospital inpatient prospective payment systems for acute care hospitals and the long term care; hospital prospective payment system and fiscal year 2014 rates; quality reporting requirements for specific providers; hospital conditions of participation; payment policies related to patient status. Final rule. Federal Register 78, no. 160 (August 19): 50495-51040.

CommonSpirit. 2022. Unaudited annual report for the years ended June 30, 2022 and 2021. https://www.commonspirit.org/ content/dam/commonspirit/pdfs/2022-CommonSpirit-Health-MDA-and-Financial-Statements-SECURED.pdf.

Community Health Systems. 2022. Community Health Systems, Inc. announces third quarter ended September 30, 2022 results. October 26. https://chsnet.gcs-web.com/news-releases/news-release-details/community-health-systems-inc-announces-third-quarter-ended.

Community Health Systems. 2020. Quarterly report (Form 10-Q). Filing submitted to the Securities and Exchange Commission. https://chsnet.gcs-web.com/node/20561/html.

Government Accountability Office. 2013. VA health care: Management and oversight of fee basis care need improvement. GAO-13-441. Washington, DC: GAO.

HCA Healthcare. 2022. Quarterly report (Form 10-Q). Filing submitted to the Securities and Exchange Commission. https:// s23.q4cdn.com/949900249/files/doc_financials/2022/ q3/39af3594-88b0-4b14-934f-bf578787127f.pdf.

HCA Healthcare. 2020. Quarterly report (Form 10-Q). Filing submitted to the Securities and Exchange Commission. https:// sec.report/Document/0001193125-20-281070/.

Maeda, J., and L. Nelson. 2017. An analysis of private-sector prices for hospital admissions. Congressional Budget Office working paper 2017-02. Washington, DC: CBO.

Medicaid and CHIP Payment and Access Commission. 2022a. Report to the Congress on Medicaid and CHIP. March. Washington, DC: MACPAC.

Medicaid and CHIP Payment and Access Commission. 2022b. Report to the Congress on Medicaid and CHIP. June. Washington, DC: MACPAC.

Medicare Payment Advisory Commission. 2022a. A data book: Health care spending and the Medicare program. Washington, DC: MedPAC. https://www.medpac.gov/wp-content/ uploads/2022/07/July2022_MedPAC_DataBook_SEC_v2.pdf.

Medicare Payment Advisory Commission. 2022b. MedPAC comment on CMS's proposed rule on the hospital inpatient prospective payment system and the long-term care hospital prospective payment system for FY 2023. June 16. https:// www.medpac.gov/wp-content/uploads/2022/06/06162022_ FY2023_IPPS_LTCH_MedPAC_COMMENT_v2_SEC.pdf.

Medicare Payment Advisory Commission. 2022c. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2022d. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2019. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2013. Comment letter to CMS on the proposed rule entitled: Medicare program; hospital inpatient prospective payment systems for acute care hospitals and the long-term care hospital prospective payment system and proposed fiscal year 2014 rates; quality reporting requirements for specific providers; hospital conditions of participation, June 25. https://www.medpac.gov/wp-content/ uploads/import_data/scrape_files/docs/default-source/ comment-letters/medpac-s-comment-on-cms-s-acute-and-long-term-care-hospitals-proposed-rule.pdf.

Medicare Payment Advisory Commission. 2011. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Moody's Investors Service. 2022. 2023 Outlook: Negative as inflation, labor costs continue to drive expenses higher. December 7. https://www.moodys.com/research/Not-For-Profit-and-Public-Healthcare-US-2023-Outlook-Negative-PBC_1342403.

Nguyen, N. X., and S. H. Sheingold. 2011. Indirect medical education and disproportionate share adjustments to Medicare inpatient payment rates. Medicare \& Medicaid Research Review 1, no. 4: E1-E19.

S\&P Global. 2022. S\&P municipal bond hospital index. November 10. https://www.spglobal.com/spdji/en/indices/fixed-income/ sp-municipal-bond-hospital-index/\#overview.

S\&P Global Ratings. 2022. Outlook for U.S. not-for-profit acute health care: A long road ahead. December 1. https://www. spglobal.com/ratings/en/research/articles/221201-outlook-for-u-s-not-for-profit-acute-health-care-a-long-road-ahead-12573554.

Schramm, S., and Z. Aters. 2021. Estimating the impact of reference-based hospital pricing in the Montana state employee plan. National Academy for State Health Policy. https://www. nashp.org/wp-content/uploads/2021/04/MT-Eval-Analysis-Final-4-2-2021.pdf.

Scott, D. 2021. The public option is now a reality in 3 states. Vox, June 17. https://www.vox.com/policy-and-politics/22535267/ public-option-health-insurance-nevada-colorado-washington.

Tenet Health. 2022. Tenet reports third quarter 2022 results; announces $\$ 1$ billion share repurchase program. https://s23. q4cdn.com/674051945/files/doc_financials/2022/q3/THC-2022.09.30-EarningsRelease.pdf.

Tenet Health. 2020. Quarterly report (Form 10-Q). Filing submitted to the Securities and Exchange Commission. https:// sec.report/Document/0000070318-20-000043/.

Trinity Health. 2022a. Consolidated financial statements as of and for the years ended June 30, 2022, and 2021, supplemental consolidating schedules as of and for the year ended June 30, 2022, and independent auditor's reports. https://www.trinity-health.org/assets/documents/financials/trinity-health-fy22-financial-statements-long-form-final.pdf.

Trinity Health. 2022b. Trinity Health's proactive response to healthcare pandemic aftershocks significantly mitigated operating losses and strengthens the system for strategic growth for the year ended June 30, 2022. https://www.trinity-health. org/assets/documents/financials/trinity-health-mda-ye-jun-fy22-final-posted-2022.09.30.pdf.

Trinity Health. 2020. Consolidated financial statements as of and for the years ended June 30, 2020, and 2019, supplemental consolidating schedules as of and for the year ended June 30, 2020, and independent auditor's reports. https://www.trinity-health.org/assets/documents/financials/trinity-health-fy20-financial-statement-with-exhibits.pdf.

White, C., A. M. Bond, and J. D. Reschovsky. 2013. High and varying prices for privately insured patients underscore hospital market power. HSC research brief no. 27. Washington, DC: Center for Studying Health System Change.


## Physician and other health professional services

## R E C O M M E N D A T I O N S

4-1 For calendar year 2024, the Congress should update the 2023 Medicare base payment rate for physician and other health professional services by 50 percent of the projected increase in the Medicare Economic Index.

4-2 The Congress should enact a non-budget-neutral add-on payment, not subject to beneficiary cost sharing, under the physician fee schedule for services provided to low-income Medicare beneficiaries. These add-on payments should equal a clinician's allowed charges for these beneficiaries multiplied by:

- 15 percent for primary care clinicians and
- 5 percent for non-primary care clinicians.


## Physician and other health professional services

## Chapter summary

Medicare's physician fee schedule pays for about 8,000 different types of medical services provided across a variety of care settings. These services range from office visits to surgical procedures, imaging, and tests and are delivered in physician offices, hospitals, nursing homes, and other settings. The clinicians who are paid to deliver these services include not only physicians, nurse practitioners, and physician assistants but also podiatrists, physical therapists, psychologists, and other types of health professionals. In 2021, the Medicare program and its beneficiaries paid $\$ 92.8$ billion for services provided by almost 1.3 million clinicians, accounting for just under 18 percent of spending in Medicare's traditional fee-for-service (FFS) program.

## Assessment of payment adequacy

In 2021 and 2022, most physician payment adequacy indicators remained positive or improved, but clinicians' input costs grew at rates not seen for many years.

## Beneficiaries' access to care-In the 2022 fielding of the Commission's

 annual survey, Medicare beneficiaries continued to report access to clinician services that was equal to, or better than, that of privately insured people. Other national surveys and our annual focus groups with
## In this chapter

- Are Medicare payments adequate in 2023?
- How should Medicare payments change in 2024 ?
- Supporting Medicare safety-net clinicians
- Appendix: Key findings from the Commission's 2022 access-to-care survey
beneficiaries and privately insured people also suggest that beneficiaries have relatively good access to care. Surveys also indicate that the share of clinicians accepting Medicare is comparable to the share accepting private insurance, despite private health insurers paying higher rates. An extremely high share of the clinicians who bill Medicare accept physician fee schedule amounts as payment in full and do not seek to obtain higher payments from patients.

The supply of most types of clinicians has been growing in recent years, although the composition of the clinician workforce continues to change. Over the last several years, there has been a rapid increase in the number of advanced practice registered nurses and physician assistants, a steady increase in the number of specialists, and a slow decline in the number of primary care physicians. This has coincided with our annual survey finding that both Medicare beneficiaries and privately insured people report more problems obtaining a new primary care provider than a new specialist.

While the overall number of clinicians has grown in recent years, the number of clinicians per Medicare beneficiary (including those in FFS Medicare and Medicare Advantage) has remained steady due to beneficiary enrollment growth.

The number of clinician encounters per beneficiary dropped sharply in the early months of the coronavirus pandemic (causing an 11 percent decline in 2020). The overall number of encounters then increased in 2021 but did not return to its prepandemic level.

Quality of care-The quality of care provided by clinicians is difficult to assess in the best of circumstances. In 2021, those difficulties were compounded by the pandemic. While we report 2021 rates of ambulatory care-sensitive hospitalizations and emergency department visits and 2021 patient experience data, we have not used these results to assess the quality of care provided to Medicare beneficiaries.

Medicare payments and providers' costs-In 2021, total spending on clinician services (by the Medicare program and beneficiaries) was $\$ 8.1$ billion higher than it was in 2020 but $\$ 4.4$ billion lower than in 2019. In 2021, per beneficiary spending on evaluation and management (E\&M) services and on treatments was higher than it was in 2019, while spending on tests, imaging, procedures, and anesthesia was lower. The increase in E\&M spending primarily reflects large increases to the payment rates for certain E\&M services in 2021, while
changes in other service categories were driven by a combination of smaller changes in payment rates and reductions in service volume.

In 2021, payment rates paid by preferred provider organization (PPO) health plans for clinician services were 134 percent of FFS Medicare's payment rates, down from 138 percent in 2020. Between 2017 and 2021, physicians' median all-payer compensation grew by an average of 3 percent per year. However, compensation remained much lower for primary care physicians than for most specialists-underscoring our long-standing concerns about the mispricing of physician fee schedule services and its impact on the number of physicians choosing to practice primary care.

Clinicians' input costs-as measured by the Medicare Economic Index (MEI)grew by 2.6 percent in 2021 and are estimated to have grown 4.7 percent in 2022, substantially higher than the recent historical norm of 1 percent to 2 percent per year. Growth in clinicians' input costs is projected to remain high in 2023 ( 3.9 percent) and 2024 ( 2.9 percent), though these projections are subject to change.

## How should payment rates change in 2024?

Given the recent growth in inflation, cost increases could be difficult for clinicians to absorb. However, current payments to clinicians appear adequate on the basis of our indicators. Therefore, for calendar year 2024, the Commission recommends that the Congress update the 2023 Medicare base payment rate for physician and other health professional services by 50 percent of the projected increase in the MEI. Because clinicians' practice expenses account for about half of the MEI, this recommendation would help ensure that payment rates keep pace with the growth of clinicians' practice costs. Based on CMS's MEI projections at the time of publication, the recommended update for 2024 would be equivalent to 1.45 percent. Our recommendation would be a permanent update that would be built into subsequent years' payment rates, in contrast to the temporary update specified in current law, which will increase payment rates in 2024 by 1.25 percent and then expire at the end of that year. In addition, under our second recommendation, payments would increase for clinicians to the extent that they provide care for low-income beneficiaries (described next).

## Supporting Medicare safety-net clinicians

To promote adequate access to care for all Medicare beneficiaries, the Commission has determined that providing additional financial support for
clinicians who furnish care to Medicare beneficiaries with low incomes is warranted. Clinicians often receive less revenue when treating low-income beneficiaries because of the way Medicare's cost-sharing policies interact with state Medicaid payment policies, which likely makes beneficiaries with low incomes less profitable to care for and could put some clinicians at financial risk. At the same time, low-income beneficiaries report having more difficulty accessing needed care than other beneficiaries. The Commission recommends that Medicare make targeted add-on payments of 15 percent to primary care clinicians and 5 percent to all other clinicians for physician fee schedule services provided to Medicare beneficiaries enrolled in the Part D low-income subsidy program.

## Background

Clinicians who bill under Medicare's physician fee schedule deliver a wide range of services, including office visits, surgical procedures, and diagnostic and therapeutic services, in a variety of settings. (When clinician services are provided in certain settings, such as hospitals or skilled nursing facilities, CMS also makes payments to these facilities through other Medicare payment systems, which are discussed in separate chapters of this report.) In 2021, the Medicare program and its beneficiaries paid $\$ 92.8$ billion for clinician services, which is $\$ 8.1$ billion more than was paid in 2020 but $\$ 4.4$ billion less than was paid in 2019. Physician fee schedule spending constitutes just under 18 percent of spending in traditional fee-forservice (FFS) Medicare (Boards of Trustees 2022). ${ }^{1}$ In 2021, almost 1.3 million clinicians, including physicians, nurse practitioners, physician assistants, therapists, chiropractors, and other practitioners, billed FFS Medicare for at least one beneficiary.

To determine Medicare payment rates for clinician services, CMS uses a fee schedule, known as the physician fee schedule, which consists of relative values for about 8,000 services. These relative values are multiplied by the physician fee schedule's conversion factor (a fixed dollar amount equal to $\$ 33.89$ in 2023) to produce a total payment amount. ${ }^{2}$

The Medicare Access and CHIP Reauthorization Act of 2015 (MACRA) established a schedule of annual updates to the physician fee schedule's payment rates and replaced the sustainable growth rate (SGR) formula for updating payments to clinicians. Under MACRA's original framework, payment rates were to be updated by zero percent from 2020 to 2025, but this was coupled with (1) an annual 5 percent bonus for clinicians who participate in advanced alternative payment models (A-APMs), available through 2024, and (2) an annual performance-based payment adjustment for non-A-APM clinicians under the Merit-based Incentive Payment System (MIPS), which does not expire (Table 4-1, p. 114). ${ }^{3,4}$ MACRA specified updates to payment rates starting in 2026 of 0.75 percent per year for clinicians in A-APMs and 0.25 percent for clinicians not in A-APMs.

Subsequent legislation has amended MACRA's framework, providing temporary increases to the fee
schedule's payment rates in 2021 through 2024 (shown in the second-to-last row of Table 4-1, p. 114). These increases differ from traditional updates in that they each apply for one year only and are not built into subsequent years' base payment rates. The Congress provided these temporary increases to partially offset a 10.2 percent reduction to the fee schedule's conversion factor that was scheduled to take effect in 2021. The conversion factor reduction was required to offset the cost of increasing payment rates for certain evaluation and management (E\&M) visits and of adding a new E\&M add-on payment (which the Congress later delayed). ${ }^{5}$ Subsequent legislation also provided a 3.5 percent bonus for clinicians who participate in A-APMs in 2025.

Focusing on 2024, current law calls for the fee schedule's payment rates to be increased by 1.25 percent that year. This increase is relative to what payment rates would have otherwise been that year, including budget-neutrality adjustments that have been implemented in recent years and not including temporary one-year payment rate increases in 2021, 2022, and 2023.

In 2024, clinicians qualifying for the A-APM incentive payment will also receive a lump-sum payment worth 5 percent of their annual Medicare professional services payments. (As a point of reference, about 240,000 clinicians received this bonus in 2022.) Meanwhile, non-A-APM clinicians subject to MIPS will receive adjustments to their Medicare payment rates; historically, these adjustments have never exceeded 2 percent. (In 2022, about 850,000 clinicians received a positive MIPS adjustment of up to 1.87 percent, depending on their performance.) A very small proportion of clinicians will receive negative adjustments under MIPS (e.g., because they failed to report MIPS measure data). (In 2022, about 19,000 clinicians received negative MIPS adjustments of up to -9 percent.) And hundreds of thousands of clinicians will receive no bonuses and no payment adjustments because they do not participate in an A-APM and are exempt from MIPS (e.g., because they are a newly enrolled clinician or an ineligible clinician type) (Centers for Medicare \& Medicaid Services 2022d, Centers for Medicare \& Medicaid Services 2019).

Figure 4-1 (p. 115) shows the cumulative effect of legislated changes in the fee schedule's payment rates since 2017. (The figure does not show additional increases or decreases to the fee schedule's conversion bonuses, adjustments, and sequestration reductions

## A-APM clinicians

| Update | $0 \%$ | $0 \%$ | $0 \%$ | $0 \%$ | $0 \%$ | $0.75 \%$ |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| A-APM bonus (one time) | $5 \%$ | $5 \%$ | $5 \%$ | $5 \%$ | $3.5 \%$ | N/A |

Other clinicians

| Update | 0\% | 0\% | 0\% | 0\% | 0\% | 0.25\% |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| MIPS adjustments (one time)* | ( $-7 \%$ to $+7 \%$ ) | (-9\% to +9\%) | (-9\% to +9\%) | (-9\% to +9\%) | (-9\% to +9\%) | (-9\% to +9\%) |
| Additional MIPS adjustments for "exceptional" performance (one time) | \$500 million | \$500 million | \$500 million | \$500 million | N/A | N/A |
| All clinicians |  |  |  |  |  |  |
| Payment increase (one time) | 3.75\% | 3.0\% | 2.5\% | 1.25\% | N/A | N/A |
| Sequestration (one time) | 0\% | 0\% (3 months), <br> -1\% (3 months), <br> $-2 \%$ (6 months) | -2\% | -2\% | -2\% | -2\% |

Note: A-APM (advanced alternative payment model), MIPS (Merit-based Incentive Payment System), N/A (not applicable). One-time adjustments apply in a given year only and are not included in subsequent years' payment rates. The annual change to the conversion factor (a fixed dollar amount) for Medicare's physician fee schedule is based on the statutory payment updates listed above and an adjustment to ensure that changes to the fee schedule's work relative value units are budget neutral (not shown). A-APM bonuses and MIPS adjustments are based on clinicians' A-APM participation and quality-measure performance from two years prior.

* Although CMS is legally allowed to apply MIPS adjustments of up to +7 percent in 2021 and +9 percent from 2022 on, CMS's actual MIPS adjustments have never exceeded +2 percent.

Source: MedPAC analysis of the Medicare Access and CHIP Reauthorization Act of 2015; the Coronavirus Aid, Relief, and Economic Security (CARES) Act; the Consolidated Appropriations Act, 2021; An Act to Prevent Across-the-Board Direct Spending Cuts, and for Other Purposes; the Protecting Medicare and American Farmers from Sequester Cuts Act; and the Consolidated Appropriations Act, 2023.
factor that are implemented by CMS to maintain budget neutrality when it revalues payment rates for individual services.) In 2020, in response to the pandemic, the Congress suspended Medicare's "sequestration" policy that reduces Medicare's payments to providers by 2 percent. In 2021, the Congress continued to suspend sequestration and provided a temporary 3.75 percent increase to payment rates (to help offset the reduction to the conversion factor prompted when CMS increased payment rates for $\mathrm{E} \& \mathrm{M}$ services that year). In 2022, the Congress reinstated the 2 percent sequester and provided a 3.0 percent temporary increase to payment rates. ${ }^{6}$

The Congress then provided a 2.5 percent temporary increase to 2023 payment rates and a 1.25 percent temporary increase to 2024 payment rates.

Although payment rates for most services in the fee schedule will decline from 2020 to 2025, payment rates for a small set of widely used services-E\&M office/ outpatient visits-were substantially increased by CMS in 2021. As a result, we expect Medicare payments to clinicians who primarily deliver E\&M services to increase, payments to other clinicians to decline, and the income gap between specialists and primary care providers to be reduced. The Commission strongly


Note: A-APM (advanced alternative payment model). Figure shows changes to payment rates in nominal terms. Figure does not show CMS changes to payment rates to ensure that changes to the values of individual billing codes are budget neutral. Figure also does not show Merit-based Incentive Payment System (MIPS) adjustments or A-APM bonuses because these are not built into subsequent years' payment rates.

Source: MedPAC analysis of the Medicare Access and CHIP Reauthorization Act of 2015; the Bipartisan Budget Act of 2018; the Coronavirus Aid, Relief, and Economic Security (CARES) Act of 2020; the Consolidated Appropriations Act, 2021; An Act to Prevent Across-the-Board Direct Spending Cuts, and for Other Purposes; the Protecting Medicare and American Farmers from Sequester Cuts Act; and the Consolidated Appropriations Act, 2023.
supports this rebalancing of the fee schedule since it helps correct a mispricing of E\&M services relative to other types of services in the fee schedule (Medicare Payment Advisory Commission 2022b, Medicare Payment Advisory Commission 2018a, Medicare Payment Advisory Commission 2011).

## Are Medicare payments adequate in 2023?

To assess whether FFS Medicare payments for clinician services are adequate, we examine indicators in three categories: beneficiaries' access to care, the quality of care, and clinicians' revenues and costs. In 2021 and 2022, most physician payment adequacy indicators remained positive or improved, but clinicians' input costs grew at rates not seen for many years.

## Beneficiaries' access-to-care indicators remain positive

Medicare beneficiaries continued to report access to clinician services that was equal to, or better than, that of privately insured people. The share of clinicians accepting Medicare is comparable to the share accepting private insurance, despite private health insurers paying higher rates, and almost all clinicians who bill Medicare accept physician fee schedule amounts as payment in full. The overall supply of clinicians has grown in recent years, although the number of clinicians per Medicare beneficiary (including those in FFS Medicare and Medicare Advantage) has remained steady due to beneficiary enrollment growth. The composition of the clinician workforce continues to change, with the number of advanced practice registered nurses and physician assistants growing rapidly and the number of primary care physicians slowly declining. After dropping sharply in the early
months of the coronavirus pandemic, the number of clinician encounters per beneficiary increased in 2021 but did not return to its prepandemic level.

## Most beneficiaries report good access to clinician services

One way we assess Medicare beneficiaries' access to care is by examining data from national surveys and local focus groups that have asked beneficiaries about their experiences obtaining health care. ${ }^{7}$ According to these sources, the vast majority of beneficiaries report good access to clinician services. For example, our analysis of CMS's 2020 Medicare Current Beneficiary Survey (MCBS) finds that 93 percent of beneficiaries reported having a usual source of care that was not a hospital emergency department or an urgent care center, 94 percent felt their usual care provider usually or always spent enough time with them, and 93 percent were satisfied with the availability of care by specialists. A relatively small share of beneficiaries (8 percent) reported experiencing trouble getting health care in the past year-primarily due to the cost of care, as opposed to clinicians not accepting Medicare. Beneficiaries who report trouble accessing care are disproportionately non-elderly disabled beneficiaries. ${ }^{8}$

Other surveys have found that Medicare-aged people report better access to care than non-elderly adults, which could mean that gaining Medicare coverage makes it easier for some people to afford health care. For example, the Medical Expenditure Panel Survey has found that around age 65 , when most people gain eligibility for Medicare, there is a reduction in reports of being unable to get necessary care and being unable to get needed care because of cost (Jacobs 2021).
The National Health Interview Survey has found that delaying or forgoing needed care due to cost was more common among adults under the age of 65 than adults over the age of 65 (National Center for Health Statistics 2021). And the Behavioral Risk Factor Surveillance System survey has found that, compared with people with employer-sponsored or individually purchased health insurance, Medicare beneficiaries are more likely to have a personal physician, less likely to have medical debt, and more likely to be very satisfied with their care (Wray et al. 2021).

Consistent with these findings, the Commission's annual survey (fielded in August 2022) found that Medicare beneficiaries ages 65 and over reported
access to care that is as good as, or better than, access reported by privately insured people ages 50 to 64 . It also found that among those Medicare beneficiaries and privately insured people looking for a new clinician, higher shares reported problems finding a new primary care provider than a new specialist. These results are consistent with Commission survey results since 2004, although this year higher shares of respondents reported negative experiences accessing careparticularly among the privately insured (see Table 4A-1 in this chapter's appendix, p. 144). These shifts may be caused by recent changes to our survey methodology. ${ }^{9}$ They may also be due to real changes in the U.S. health care delivery system; for example, some beneficiaries in our focus groups this year described longer wait times during the coronavirus pandemic for access to specialty care than before the start of the pandemic. ${ }^{10}$ Our 2023 survey results will be of particular interest, in that they will help us understand whether the care experiences observed in our 2022 survey should be thought of as anomalous findings caused by the pandemic or a new baseline caused by the change in our survey methodology.

## Nearly all Medicare beneficiaries have a primary care

 provider In the Commission's 2022 survey, 96 percent of Medicare beneficiaries reported having a primary care provider (higher than the 92 percent of privately insured people who reported this). This is consistent with our focus group findings, in which nearly all beneficiaries reported having a usual source of primary care.Our 2022 survey also found that Medicare beneficiaries were slightly less likely to receive most or all of their primary care from a nurse practitioner (NP) or a physician assistant (PA) compared with privately insured people ( 17 percent of Medicare beneficiaries reported this, compared with 20 percent of privately insured people). ${ }^{11}$ Among both Medicare beneficiaries and privately insured people, higher shares of rural and low-income respondents reported receiving most or all of their care from an NP or PA. ${ }^{12}$ (Use of NPs and PAs is one of the few substantive differences our survey finds between urban and rural Medicare beneficiaries' experiences accessing care; see Table 4A-2 in the appendix, p. 145, for a comparison of other survey results for urban and rural Medicare beneficiaries.)

More problems finding a new primary care provider than a new specialist This year's survey found that 11 percent of Medicare beneficiaries looked for a new primary
care provider in the past year. The most common reason beneficiaries gave for looking was that their primary care provider had retired or stopped practicing, which about half of the beneficiaries looking reported (equivalent to 5 percent of all Medicare beneficiaries). Among Medicare beneficiaries who tried to find a new primary care provider, about half of this subset reported a problem finding one (equivalent to 6 percent of all Medicare beneficiaries). Compared with Medicare beneficiaries, higher shares of privately insured people reported looking for a new primary care provider and experienced problems finding one in 2022.

In our focus groups, several Medicare beneficiaries had sought a new source of primary care in recent years, and their experiences varied in terms of their ease in identifying a new clinician. Some privately insured individuals in our focus groups also reported challenges finding a new primary care provider and long wait times to schedule a first appointment. Across clinicians in our focus groups, most were accepting new patients, including Medicare patients. Among those who were not, the reason was full patient panels, and generally their practices would open to new patients again when capacity allowed.

Both Medicare beneficiaries and privately insured people reported fewer problems finding a specialist than a primary care provider. In our 2022 survey, 26 percent of Medicare beneficiaries reported looking for a new specialist, and a third of these beneficiaries reported a problem finding one (equivalent to 8 percent of all beneficiaries). Compared with Medicare beneficiaries, higher shares of privately insured people reported problems finding a specialist. We also found that urban respondents were more likely to look for a new specialist than rural respondents, and higherincome respondents were more likely to look for a new specialist than lower-income respondents. In our focus groups, beneficiaries' access to specialty care varied, with wait times to see a new specialist ranging from a few days to months. Clinicians in our focus groups reported that some patients could wait up to six months to see certain specialists.

One of the only statistically significant differences in the care experiences of Medicare beneficiaries of different races and ethnicities in our 2022 survey related to the use of specialists: we found that White beneficiaries were more likely to see multiple
specialists compared with Black and Hispanic beneficiaries. (See Table 4A-3 in the appendix, p. 146, for other survey results broken out by race/ ethnicity.) We also found that more urban respondents reported seeing multiple specialists compared with rural respondents, and more higher-income Medicare beneficiaries reported seeing multiple specialists compared with lower-income beneficiaries.

## Shorter waits for appointments for an illness or

 injury compared with routine care Among Medicare beneficiaries who needed appointments for regular or routine care in the past year, nearly half (45 percent) reported ever having to wait longer than they wanted to get this type of appointment. ${ }^{13}$ Medicare beneficiaries were less likely to report unwanted waits for appointments for an illness or injury (with only 33 percent of those needing this type of appointment reporting such waits). Most of the beneficiaries who reported unwanted waits for appointments said they only "sometimes" experienced such waits-it was rare for a beneficiary to report that they "usually" or "always" waited longer than they wanted to get an appointment. ${ }^{14}$ For both appointments for routine care and appointments for an illness or injury, higher shares of privately insured people reported waiting longer than they wanted for these appointments compared with Medicare beneficiaries.In our focus groups, most beneficiaries described having timely access to primary care, especially when they had an acute care issue. Beneficiaries said that for acute issues, they could usually be seen quicklysometimes the same day, and usually within a few days.

Patients sometimes forgo care, but not necessarily due to difficulties accessing care In this year's Commission survey, 18 percent of Medicare beneficiaries reported that they had had a health problem or condition in the past year that they thought they should have seen a doctor for but did not (less than the 24 percent of privately insured people who reported this). A fifth of the beneficiaries who reported forgoing care did so because they couldn't get an appointment soon enough (equivalent to 4 percent of all Medicare beneficiaries)suggesting that beneficiaries' access to appointments with clinicians is sufficient to meet the vast majority of beneficiaries' care needs. Other common reasons survey respondents gave for not obtaining care were that they didn't think their problem was serious or they increased and the mix of clinicians changed, 2016-2021

| Number (in thousands) |  |  |  |  |  | Number per 1,000 beneficiaries |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Physicians |  |  |  |  |  | Physicians |  |  |  |  |
| Year | Primary care specialties | Other specialties | APRNs and PAs | Other practitioners | Total | Primary care specialties | Other specialties | APRNs and PAs | Other practitioners | Total |
| 2016 | 142 | 446 | 198 | 162 | 948 | 2.7 | 8.6 | 3.8 | 3.1 | 18.2 |
| 2017 | 141 | 454 | 218 | 168 | 981 | 2.6 | 8.5 | 4.1 | 3.1 | 18.4 |
| 2018 | 140 | 461 | 237 | 174 | 1,012 | 2.6 | 8.4 | 4.3 | 3.2 | 18.5 |
| 2019 | 139 | 467 | 258 | 180 | 1,045 | 2.5 | 8.3 | 4.6 | 3.2 | 18.7 |
| 2020 | 136 | 467 | 268 | 172 | 1,044 | 2.4 | 8.1 | 4.7 | 3.0 | 18.2 |
| 2021 | 135 | 471 | 286 | 180 | 1,073 | 2.3 | 8.1 | 4.9 | 3.1 | 18.4 |

Note: APRN (advanced practice registered nurse), PA (physician assistant). "Primary care specialties" includes family medicine, internal medicine, pediatric medicine, and geriatric medicine, with an adjustment to exclude hospitalists. Hospitalists are counted in "other specialties." "Other practitioners" includes clinicians such as physical therapists, psychologists, social workers, and podiatrists. The number of clinicians shown in this table includes only those with a caseload of more than 15 beneficiaries in the year. Beneficiary counts used to calculate clinicians per 1,000 beneficiaries include those enrolled in fee-for-service Medicare Part B and those in Medicare Advantage, based on the assumption that clinicians generally furnish services to beneficiaries in both programs. Numbers exclude nonperson providers, such as clinical laboratories and independent diagnostic testing facilities.

Source: MedPAC analysis of Medicare claims data for 100 percent of fee-for-service beneficiaries and 2022 annual report of the Boards of Trustees of the Medicare trust funds.
"just put it off," which half of care forgoers reported (equivalent to 9 percent of all Medicare beneficiaries).

In our focus groups, many beneficiaries reported delayed or canceled primary care appointments during the coronavirus pandemic, though most have since received that care.

## The number of clinicians billing Medicare has increased

From 2016 to 2019, the total number of clinicians billing the fee schedule per Medicare beneficiary grew commensurate with growth in the overall Medicare population, which suggests that clinicians had sufficient incentive to serve Medicare beneficiaries. After declining in 2020 (likely due to the pandemic), the total number of clinicians per beneficiary increased in 2021, although it has not fully returned to prepandemic levels. The mix of clinicians has changed over time.

We limited this part of our analysis of clinicians to those who billed for more than 15 Medicare
beneficiaries in a given year. This minimum threshold helps us (1) better measure clinicians who substantially participate in Medicare and are therefore likely critical to ensuring beneficiary access to care and (2) avoid year-to-year variability in clinician counts (i.e., because we exclude clinicians who billed for one or two beneficiaries in one year but may not have billed for any beneficiaries the following year). ${ }^{15}$ (As a point of reference, studies suggest that primary care physicians' patient panels range from 1,200 to 2,500 patients per physician (Dai et al. 2019, Raffoul et al. 2016).)

We found that the number of clinicians billing the fee schedule between 2016 and 2021 grew from about 948,000 to 1,073,000, after declining somewhat in 2020 (Table 4-2). Over the 2016 to 2019 period, the total number of clinicians per 1,000 beneficiaries increased from 18.2 to 18.7 before falling to 18.2 in 2020 and increasing again to 18.4 in $2021 .^{16}$ We also see a decline and then rebound during the pandemic in Bureau of Labor Statistics employment data for physician offices


Note: FFS (fee-for-service). Clinicians entering Medicare are defined as clinicians who billed the physician fee schedule for more than 15 beneficiaries in a year who did not bill the fee schedule for any beneficiaries in the prior year. Clinicians exiting Medicare are defined as clinicians who did not bill the fee schedule for any beneficiaries in a year but who billed for more than 15 beneficiaries in the prior year. The number of entering clinicians declined in 2020 due to the coronavirus pandemic.

Source: MedPAC analysis of Medicare claims data for 100 percent of fee-for-service beneficiaries.
(which is just one care setting where clinicians work); these data indicate that the number of employed workers in these offices (including support staff) declined by about 10 percent in the first few months of the pandemic but had returned to prepandemic levels one year into the pandemic and was 5 percent higher than prepandemic levels by August 2022 (Frogner 2022).

While the total number of clinicians billing the fee schedule rose between 2016 and 2021, trends varied by type and specialty of clinicians. Since 2016, the number of primary care physicians billing the fee schedule has slowly declined-yielding a net loss of about 7,000 primary care physicians by 2021. As such, the number of primary care physicians per Medicare beneficiary declined from 2.7 to 2.3. Over the same five-year period, the number of advanced practice registered nurses (APRNs) and PAs billing the fee schedule grew rapidly from about 198,000 to $286,000 .{ }^{17}$ On a per beneficiary basis, the number of APRNs and PAs billing
the fee schedule increased from 3.8 in 2016 to 4.9 in 2021. Meanwhile, the number of specialist physicians and other practitioners, such as physical therapists and podiatrists, also increased.

The number of clinicians entering Medicare exceeded the number of clinicians exiting Medicare between 2016 and 2021 Annual changes in the number of clinicians who stop billing the physician fee schedule (exiting clinicians) and start billing the fee schedule (entering clinicians) could signal future access problems for beneficiaries if the number of exiting clinicians exceeds the number of entering clinicians or if there is a large increase in exiting clinicians. For each year between 2016 and 2021, the number of entering clinicians, as a share of all clinicians, was larger than the number of exiting clinicians (Figure 4-2). ${ }^{18}$ In addition, the number of clinicians exiting Medicare did not sharply increase during this period. Net growth in the number of clinicians suggests that there is an adequate supply of clinicians to treat beneficiaries (Table 4-2).

## Trends in the share of clinicians entering and exiting FFS Medicare, by type of clinician, 2016-2021



Note: FFS (fee-for-service), APRN (advanced practice registered nurse), PA (physician assistant). Clinicians entering Medicare are defined as clinicians who billed the physician fee schedule for more than 15 beneficiaries in a year but did not bill the fee schedule for any beneficiaries in the prior year. Clinicians exiting Medicare are defined as clinicians who did not bill the fee schedule for any beneficiaries in a year but who billed for more than 15 beneficiaries in the prior year. "Primary care specialties" includes family medicine, internal medicine, pediatric medicine, and geriatric medicine, with an adjustment to exclude hospitalists. Hospitalists are counted in "specialist physicians." "Other practitioners" includes clinicians such as physical therapists, psychologists, social workers, and podiatrists. Numbers exclude nonperson providers, such as clinical laboratories and independent diagnostic testing facilities.

Source: MedPAC analysis of Medicare claims data for 100 percent of fee-for-service beneficiaries.

Compared with all clinicians, entering and exiting clinicians billed for fewer beneficiaries, on average. In 2019, for example, all clinicians billed for 327 beneficiaries, on average, compared with 109 beneficiaries for entering clinicians and 133
beneficiaries for exiting clinicians (data not shown). ${ }^{19}$ This difference suggests that entering clinicians are ramping up their practice during their first year billing Medicare while exiting clinicians are scaling back their practice during their final year billing Medicare.

Although entering clinicians billed for a lower average number of beneficiaries than exiting clinicians, the number of entering clinicians exceeded the number of exiting clinicians, so the total number of beneficiaries treated by entering clinicians was higher than the total number of beneficiaries treated by exiting clinicians during the prior year. In 2019, for example, entering clinicians billed for a total of 7.2 million beneficiaries, while exiting clinicians billed for a total of 5.3 million beneficiaries in 2018.

Trends in clinician exit and entry varied by type of clinician (Figure 4-3). For each type of clinician, the share of clinicians who were entering Medicare exceeded the share who were exiting Medicareexcept for primary care physicians, for whom exiting physicians exceeded entering physicians in each year except for 2017. This trend is consistent with the decline in the total number of primary care physicians between 2016 and 2021 (shown earlier in Table 4-2, p. 118). APRNs and PAs had the largest gap between the share who were entering clinicians and the share who were exiting clinicians during this period, which corresponds with rapid growth in the total number of APRNs and PAs (Table 4-2, p. 118). Among specialists, the gap between the share of physicians who were entering Medicare and the share who were exiting Medicare narrowed between 2016 and 2021, a trend that we will continue to monitor (Figure 4-3).

## Most clinicians accept Medicare

Although Medicare payment rates are usually lower than private health insurers' payment rates, several data sources suggest that the share of clinicians who accept Medicare is comparable to the share who accept private health insurance. From 2014 to 2019, the share of nonpediatric office-based physicians who accepted Medicare was only 0 to 2 percentage points lower than the share who accepted private health insurance, according to the CDC's National Electronic Health Records Survey (Ochieng et al. 2022). Meanwhile, the 2020 National Ambulatory Medical Care Survey found that among nonpediatric office-based physicians who reported accepting new patients, 86 percent said they accepted new Medicare patients while only 84 percent said they accepted new privately insured patients (Myrick and Schappert 2022). And in the Commission's 2022 survey of patients, only 1 percent of Medicare beneficiaries encountered a primary care provider or
a specialist's office that did not accept Medicare, while 2 percent of privately insured people encountered a primary care provider's office that did not accept their insurance and 4 percent encountered a specialist's office that did not accept their insurance. ${ }^{20}$

Clinicians may choose to accept Medicare, despite payment rates that are usually lower than commercial rates, for several reasons. For example, a substantial share of most clinicians' patients are covered by Medicare, and if these clinicians opted to accept only commercially insured patients, they would lose revenue due to having fewer patients. In addition, while Medicare has lower payment rates, commercial insurers often impose burdensome requirements on clinicians that take time to complete, such as requiring clinicians to complete insurers' prior authorization paperwork and requiring them to use insurers' provider directories to identify in-network providers when making patient referrals. In contrast, the administrative simplicity of billing Medicare helps offset the program's lower payment rates.

There are several different ways for clinicians to bill Medicare, which yield different payment amounts. In 2021, 98 percent of clinicians billing the physician fee schedule were participating providers, meaning they agreed to accept Medicare's fee schedule amount as payment in full. Clinicians who wish to collect somewhat higher payments (of up to 109.25 percent of Medicare's payment rates) can "balance bill" patients for additional cost sharing if they sign up as a nonparticipating provider and choose not to "take assignment" on a claim, but very few clinicians choose to do this: in 2021, 99.7 percent of fee schedule claims were paid at Medicare's standard payment rate. If they elect to opt out of the program, clinicians can charge patients any price and bill beneficiaries directly for their services. The number of clinicians who opted out of Medicare as of September 2022, 29,000, was comparable to the number of clinicians who opted out in previous years; these clinicians were concentrated in the specialties of behavioral health ( 43 percent), ${ }^{21}$ oral health ( 29 percent), ${ }^{22}$ and primary care ( 11 percent) $)^{23}$ (Centers for Medicare \& Medicaid Services 2022c).

## The number of clinician encounters per beneficiary grew from 2020 to 2021

We use the quantity of beneficiaries' encounters with clinicians as another measure of access to care. We use with 2016 and the mix of clinicians furnishing them changed

|  | Encounters per FFS beneficiary |  |  |  | Percent change |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Specialty and clinician category | 2016 | 2019 | 2020 | 2021 | Average annual (2016-2019) | 2019-2021 |
| Total (all clinicians) | 21.4 | 22.3 | 19.8 | 21.6 | 1.3\% | -2.8\% |
| Primary care physicians | 3.8 | 3.5 | 3.1 | 3.2 | -2.6 | -9.3 |
| Specialists | 12.7 | 12.9 | 11.4 | 12.3 | 0.4 | -4.7 |
| APRNs/PAs | 1.8 | 2.5 | 2.4 | 2.7 | 17.0 | 17.0 |
| Other practitioners | 3.1 | 3.4 | 2.9 | 3.5 | 3.4 | 1.1 |

Note: FFS (fee-for-service), APRN (advanced practice registered nurse), PA (physician assistant). We define "encounters" as unique combinations of beneficiary identification numbers, claim identification numbers (for paid claims), and national provider identifiers of the clinicians who billed for the service. We use the number of FFS Medicare beneficiaries enrolled in Part B to define encounters per beneficiary. Numbers do not account for "incident to" billing, meaning, for example, that encounters with APRNs/PAs that are billed under Medicare's "incident to" rules are included in the physician totals. Components may not sum to totals due to rounding, and percent change columns were calculated on unrounded data.

Source: MedPAC analysis of Medicare claims data for 100 percent of FFS beneficiaries and 2022 annual report of the Boards of Trustees of the Medicare trust funds.
a claims-based definition of encounters. ${ }^{24}$ Clinicians submit a claim when they furnish one or more services to a beneficiary in FFS Medicare. For example, if a physician billed for an evaluation and management (E\&M) visit and an X-ray on the same claim, we would count that as one encounter. About 97 percent of beneficiaries enrolled in FFS Medicare had at least one encounter in 2021. ${ }^{25}$

The total number of encounters per FFS Medicare beneficiary grew modestly from 2016 to 2019, when it peaked at 22.3, before dropping 11.1 percent in 2020 to 19.8 encounters per beneficiary in response to the coronavirus pandemic (Table 4-3). Encounters per beneficiary rebounded somewhat the next year, rising to 21.6 in 2021 (a 9.4 percent increase). The overall decline in encounters from 2019 to 2021 is largely related to the pandemic, and some effects are likely to be temporary.

Change in the number of encounters per beneficiary varied by specialty and type of provider Between 2016 and 2021, the number of encounters furnished by primary care physicians and specialist physicians
declined and the number of encounters provided by other types of clinicians increased (with encounters with APRNs and PAs growing the fastest) (Table 4-3).

Slightly different trends have emerged during the pandemic, however. Between 2019 and 2021, the number of encounters per beneficiary with APRNs or PAs increased by an average of 11 percent per year, and encounters with other practitioners (e.g., physical therapists) grew by an average of 1.1 percent per year. The number of encounters per beneficiary with primary care physicians fell by an average of 9.3 percent per year, while the number of encounters with specialist physicians (who account for a majority of all encounters) fell by an average of 4.7 percent per year.

The decline in beneficiary encounters with primary care physicians occurred across a broad range of services. From 2016 to 2021, the average annual change in the number of encounters per beneficiary with primary care physicians for E\&M services, other procedures, treatments, imaging services, and tests was -3.3 percent, -4.1 percent, -7.8 percent,

|  | Encounters per FFS beneficiary |  |  |  | Percent change |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Type of service | 2016 | 2019 | 2020 | 2021 | Average annual (2016-2019) | 2019-2021 |
| Total (all services) | 21.4 | 22.3 | 19.8 | 21.6 | 1.3\% | -2.8\% |
| Evaluation and management | 12.3 | 13.1 | 11.9 | 12.7 | 0.9 | -3.0 |
| Major procedures | 0.2 | 0.2 | 0.2 | 0.2 | 1.1 | -5.5 |
| Other procedures | 2.3 | 2.4 | 2.0 | 2.3 | 1.3 | -4.9 |
| Treatments | 2.4 | 2.7 | 2.3 | 2.7 | 4.0 | 0.4 |
| Imaging | 4.0 | 4.2 | 3.6 | 4.0 | 1.1 | -4.7 |
| Tests | 2.1 | 2.1 | 1.8 | 2.0 | 1.1 | -6.7 |
| Anesthesia | 0.5 | 0.6 | 0.5 | 0.5 | 4.2 | -5.0 |

Note: FFS (fee-for-service). We define "encounters" as unique combinations of beneficiary identification numbers, claim identification numbers (for paid claims), and national provider identifiers of the clinicians who billed for the service. We use the number of FFS Medicare beneficiaries enrolled in Part B to define encounters per beneficiary. Values by type of service do not sum to the total because encounters with multiple service types are counted separately for each type of service but counted only once for the total. For example, if an imaging service and a test were billed in the same encounter, we count that as one encounter for imaging and one for tests (for a total of two encounters), but we count the services as one encounter for the total row. All numbers in the table are rounded, but unrounded data are used for calculations.

Source: MedPAC analysis of Medicare claims data for 100 percent of FFS beneficiaries and 2022 annual report of the Boards of Trustees of the Medicare trust funds.
-5.6 percent, and -9.8 percent, respectively (data not shown). ${ }^{26}$ Recent research has documented that similar drops in encounters with primary care physicians also occurred among the privately insured population (Ganguli et al. 2019). This trend suggests that primary care physicians have not filled their patient panels with privately insured patients in lieu of Medicare beneficiaries.

Despite the rapid growth in encounters with APRNs and PAs, we are likely undercounting the number of fee schedule encounters provided by these clinicians due to "incident to" billing. ${ }^{27}$ The Commission has previously recommended that the Congress require APRNs and PAs to bill Medicare directly, eliminating "incident to" billing for services they provide, which would allow us to more accurately report the number of beneficiary encounters with different types of clinicians (Medicare Payment Advisory Commission 2019). These changes would also enable us to better understand whether services provided by APRNs and PAs are disproportionately substituting for primary
care services or are substituting for both primary care and specialty care services to an equal degree.

Examining beneficiary encounters with clinicians by service type, E\&M encounters per beneficiary rose by an annual average of 0.9 percent from 2016 to 2019 before declining in 2020 (Table 4-4). E\&M encounters increased in 2021 but were still 3 percent below prepandemic levels. Similar patterns were observed for other types of services except in beneficiaries' use of treatments (which includes physical therapy, treatment for cancer, and dialysis), which declined in 2020 but was back to its prepandemic level in 2021.

## Quality of care is difficult to assess

Quality of care provided by clinicians is difficult to assess even in the best of circumstances. We are limited in our ability to assess the quality of clinicians' care because Medicare does not collect FFS beneficiary-level clinical information (e.g., blood pressure, lab results) or patient-reported outcomes (e.g., improving or maintaining physical and mental

## Distribution of risk-adjusted rates of ambulatory care-sensitive hospitalizations

 and emergency department visits across hospital service areas, 2021|  | Risk-adjusted rate per 1,000 FFS beneficiaries |  |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  | ```10th percentile (high performing)``` | 50th percentile | $\begin{gathered} \text { 90th } \\ \text { percentile } \\ \text { (low performing) } \end{gathered}$ | Ratio of 90th to 10th percentile |
| Ambulatory care-sensitive hospitalizations | 22.1 | 31.6 | 43.3 | 2.0 |
| Ambulatory care-sensitive ED visits | 33.5 | 60.5 | 88.4 | 2.6 |

Note: FFS (fee-for-service), ED (emergency department). Lower rates are better. To measure population-based outcomes for FFS Medicare beneficiaries, we calculated the risk-adjusted rates of admissions and ED visits tied to a set of acute and chronic conditions per 1,000 FFS Medicare beneficiaries in hospital service areas (HSAs). There are about 3,400 Dartmouth-defined HSAs. The average population of FFS Medicare beneficiaries in each HSA is about 10,000 beneficiaries. We excluded any hospital service area with fewer than 1,000 FFS Medicare beneficiaries.

Source: Analysis of 2027 fee-for-service Medicare claims data
health). CMS measures the performance of clinicians using the Merit-based Incentive Payment System, which, in March 2018, MedPAC recommended eliminating because it is fundamentally flawed (Medicare Payment Advisory Commission 2018b). In 2020 and 2021, difficulties assessing quality were compounded by the effects of the coronavirus pandemic on beneficiaries and providers. In previous years, we tracked changes in quality measures and determined whether they had improved, worsened, or stayed the same. While we report 2021 results for these quality measures, we have not used the results to inform our conclusions about trends in the quality of care provided to Medicare beneficiaries. The 2021 results may reflect temporary changes in the delivery of care and data limitations unique to the coronavirus pandemic rather than trends in quality of care.

We report on the quality of the ambulatory care environment for beneficiaries in FFS Medicare using outcome measures assessing ambulatory caresensitive (ACS) hospitalizations and emergency department visits, as well as patient experience measures (measured using the Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}\left(\right.$ CAHPS $\left.^{\circledR}\right)$ ). ${ }^{28}$ This approach is consistent with the Commission's principles for quality measurement (Medicare Payment Advisory Commission 2018a).

## Effectiveness and timeliness of care outside the hospital: Ambulatory care-sensitive hospitalizations and emergency department visits

Many factors related to the coronavirus pandemic affected rates of hospitalizations, including both higher demand for beds by patients diagnosed with COVID-19, which strained hospital capacity at times, and lowered demand for beds by other patients as nonemergency surgeries were canceled or delayed and patients avoided visiting emergency departments due to fears of infection. Further, the Commission's quality metrics rely on risk-adjustment models that use performance from previous years to predict beneficiary risk. COVID-19 is a new diagnosis and is not included in the current risk-adjustment models, though many associated conditions are. As a result, our models may not adequately represent the acuity and mix of patients receiving care in 2021. Therefore, we report 2021 quality measure results but do not draw conclusions about whether overall quality has improved, worsened, or stayed the same.

The Commission developed two claims-based outcome measures-ACS hospitalizations and emergency department (ED) visits-to compare quality of care within and across different populations (i.e., FFS Medicare in different local market areas), given the adverse impact on beneficiaries and high cost of these
events. Two categories of ACS conditions are included in the measures: chronic (e.g., diabetes, asthma, hypertension) and acute (e.g., bacterial pneumonia, cellulitis). Conceptually, an ACS hospitalization or ED visit refers to hospital use that could have been prevented with timely, appropriate, high-quality care. For example, if a diabetic patient's primary care physician or specialist has an effective system to allow for urgent visits, the patient may be able to avoid a visit to the ED. If a diabetic patient's primary care physician and overall care team work effectively to control the patient's condition, an ED visit for a diabetic crisis could be avoidable.

In 2021, the distribution of risk-adjusted rates of avoidable hospitalizations and ED visits per 1,000 FFS Medicare beneficiaries varied widely across Dartmouth-defined hospital service areas (HSAs). This variation signals opportunities to improve the quality of ambulatory care, even with the measurement issues related to the pandemic (Table 4-5). ${ }^{29}$ The HSA at the 90th percentile of ACS hospitalizations had a rate that was two times the HSA at the 10th percentile. The HSA at the 90th percentile of ACS ED visits had a rate that was 2.6 times the HSA in the 10th percentile. Relatively poor performance on a local market's ACS hospitalization and ED visit measures can identify opportunities for improvement in those ambulatory care systems, while relatively good performance on the measures can identify best practices for ambulatory care systems.

Although the 2021 ratios of HSAs at the 90th to 10th percentiles are about the same as for prepandemic years, the risk-adjusted rates per 1,000 FFS beneficiaries went down (improved) substantially in 2021 compared with 2019. For example, in 2019 the median HSA ACS ED visit rate was 98.6 per 1,000 FFS beneficiaries (Medicare Payment Advisory Commission 2021) compared with a median rate of 60.5 per 1,000 FFS beneficiaries in 2021 (Table 4-5). There has been an overall decline in ED visits for non-COVID-19-related services since the start of the coronavirus pandemic, so we would expect some accompanying decline in ACS ED visits. Also, the national influenza rate during the 2020-2021 flu season was lower than prepandemic years because of isolating and social distancing, so there were likely fewer ED visits for the flu (which is an ambulatory care-sensitive ED visit). It is difficult to
untangle whether and how much of the decline in ACS ED visit rates is because of these and other changes in ED use versus improved quality of care.

## Patient experience scores

The Agency for Healthcare Research and Quality's CAHPS ${ }^{\circledR}$ surveys initiative develops a variety of standardized patient surveys that ask well-tested questions using a consistent methodology across a large sample of respondents. CAHPS surveys generate standardized and validated measures of patient experience that enable health care providers, purchasers, and policymakers to track, compare, and improve patients' experiences in different health care settings. CAHPS surveys measure a key component of quality of care because they assess whether something that should happen in a health care setting (such as clear communication with a provider) actually happened or how often it happened. When patients have a better experience, they are more likely to adhere to treatments, return for follow-up appointments, and engage with the health care system by seeking appropriate care.

CMS annually fields a CAHPS survey among a subset of FFS beneficiaries. The survey questions relate to the beneficiary's experience of care with Medicare and their FFS providers. The getting needed care and seeing specialists measure score based on 2021 FFS CAHPS survey responses was 81 (score on a scale of 0 to 100) and the score for getting appointments and care quickly was 75 (Table 4-6, p. 126). These scores have decreased since 2017. The rating of health plan (FFS Medicare) measure score was 83 , which has been stable. The rating of health care quality score was 87 , which has improved since 2017. In 2021, 77 percent of beneficiaries reported receiving an annual flu vaccine, which was an increase from 74 percent in 2017 (Table 4-6).

## Clinicians' revenues and costs

We report on changes in clinicians' Medicare payments, all-payer compensation, and input costs to understand clinicians' financial incentives to provide services to Medicare beneficiaries.

## Allowed charges per beneficiary grew over the 2016 to 2021 period

Allowed charges are the total payments a clinician receives (including beneficiary cost sharing)

| $\begin{gathered} \text { TABLE } \\ 4-6 \end{gathered}$ | Medicare FFS CAHPS ${ }^{\circledR}$ performance scores, 2017-2021 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| CAHPS composite measure | 2017 | 2018 | 2019 | 2020 | 2021 |
| Getting needed care and seeing specialists | 84\% | 83\% | - | 83\% | 81\% |
| Getting appointments and care quickly | 77 | 77 | - | 78 | 75 |
| Care coordination (e.g., personal doctor always or usually discusses medication, has relevant medical record, helps with managing care) | 86 | 85 | - | 85 | 85 |
| Rating of health plan (FFS Medicare) | 83 | 83 | - | 84 | 83 |
| Rating of health care quality | 85 | 85 | - | 86 | 87 |
| Annual flu vaccine | 74 | 74 | - | 77 | 77 |

Note: FFS (fee-for-service), CAHPS ${ }^{\circledR}$ (Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$ ). Questions in rows 1 to 3 have responses of "Never," "Sometimes," "Usually," and "Always." CMS converts these to a linear mean score on a 0 to 100 scale. Questions in rows 4 and 5 have responses of 7 to 10 , which CMS converts to a linear mean score on a 0 to 100 scale. The question in row 6 is a yes/no response. "Plan" in row 4 refers to the Medicare FFS program. CMS halted collection of the 2019 beneficiary experience survey at the start of the coronavirus pandemic.

Source: FFS CAHPS mean scores provided by CMS.
from providing physician fee schedule services to beneficiaries enrolled in FFS Medicare. Allowed charges are a function of the physician fee schedule's relative value units (RVUs), the fee schedule's conversion factor, and other payment adjustments, such as those determined by geographic practice cost indexes. Allowed charges per beneficiary grew modestly from 2016 to 2019 (at an average of 2.4 percent per year) before dropping sharply in 2020 as beneficiaries put off care in the early months of the pandemic (Table 4-7). With a large increase in 2021, average spending per beneficiary recovered in 2021 and exceeded the 2019 level (Figure 4-4).

To ensure that clinicians remained viable sources of care during the pandemic, the Congress provided clinicians with an estimated $\$ 40$ billion in 2020 and $\$ 13.5$ billion in 2021 through the Provider Relief Fund and the Paycheck Protection Program-more than offsetting clinicians' pandemic-related revenue losses (Centers for Medicare \& Medicaid Services 2022a, Hartman et al. 2022, Martin et al. 2023).

We typically observe changes in spending on different categories of services over time, as particular services' utilization rates and/or payment rates change. ${ }^{30}$ Between 2019 and 2021, allowed charges per beneficiary rose by 6.1 percent for E\&M services and by 4.8 percent for treatments. Meanwhile, allowed charges for tests fell by 10.3 percent; for anesthesia services, by 7.3 percent; for major procedures, by 6.9 percent; for imaging services, by 2.4 percent; and for other procedures, by 1.5 percent (Table 4-7).

We also present changes in units of service (i.e., service volume as opposed to spending) per beneficiary. The number of units of service per beneficiary had been growing across all service categories before the pandemic-overall annual growth was 1.6 percent from 2016 to 2019. Volume declined sharply in 2020 in response to the pandemic, with the number of units for all services falling by 11.8 percent that year (data not shown). Volume across all service categories increased in 2021, but the total number of service units per capita was 1.7 percent lower in 2021 compared with 2019. Some variation existed across different types of service.


Source: MedPAC analysis of Medicare claims data for 100 percent of fee-for-service beneficiaries

Allowed charges per FFS beneficiary varied by type of service, 2016-2021

| Type of service | Change in units of service per beneficiary |  | Change in allowed charges per beneficiary |  | Share of 2021 allowed charges |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Average annual 2016-2019 | 2019-2021 | Average annual 2016-2019 | 2019-2021 |  |
| All services | 1.6\% | -1.7\% | 2.4\% | 2.4\% | 100.0\% |
| Evaluation and management | 0.5 | -3.4 | 2.1 | 6.1 | 51.8 |
| Imaging | 0.3 | -3.8 | 2.4 | -2.4 | 10.5 |
| Major procedures | 0.8 | -4.7 | 3.0 | -6.9 | 7.4 |
| Other procedures | 1.6 | -3.1 | 2.5 | -7.5 | 12.8 |
| Treatments | 5.4 | 5.3 | 4.2 | 4.8 | 9.7 |
| Tests | 1.6 | -6.4 | 1.2 | -10.3 | 4.5 |
| Anesthesia | 1.9 | -5.2 | 1.8 | -7.3 | 2.6 |

[^6]Source: MedPAC analysis of Medicare claims data for 100 percent of FFS beneficiaries and 2022 annual report of the Boards of Trustees of the Medicare trust funds.

# Allowed charges per unit of service grew for E\&M services in 2021 

## Type of service

## Change in allowed charges per unit of service (on a per beneficiary basis), 2020-2021

| All services | $\mathbf{2 . 9 \%}$ |
| :--- | :---: |
| Evaluation and management | 10.3 |
| Imaging | -0.8 |
| Major procedures | -2.8 |
| Other procedures | 0.8 |
| Treatments | -4.8 |
| Tests | -2.4 |
| Anesthesia | 0.7 |

Note: E\&M (evaluation and management). We use the number of beneficiaries enrolled in fee-for-service Medicare Part B to define units of service and allowed charges per beneficiary.

Source: MedPAC analysis of Medicare claims data for 100 percent of fee-for-service beneficiaries and 2022 annual report of the Boards of Trustees of the Medicare trust funds.

For example, between 2019 and 2021, service volume for E\&M services fell by 3.4 percent while it grew for treatments by 5.3 percent (Table 4-7, p. 127)

Changes in volume can cause increases or decreases in allowed charges, as can changes in the intensity of certain services (e.g., substituting computed tomography for standard X-rays), and movement of services from freestanding offices to hospitals. Given the complex nature of factors that contribute to changes in allowed charges, it can be challenging to explain why spending has changed over time. One way to better understand changes in spending trends is to calculate changes in allowed charges per unit of service. When calculated on a per beneficiary basis, such an approach removes changes in volume (but not changes in intensity) as a factor driving changes in spending. From 2020 to 2021, spending per unit of services across all types of service increased by 2.9 percent (Table $4-8$ ). The change in total spending per unit of service varies across different types of service. Overall growth in spending per service is largely attributable to E\&M services, which grew by 10.3 percent. Charges per unit of service in other service categories experienced small growth or declined in 2021.

The growth in spending per unit of service within the E\&M category was largely driven by increases in Medicare payment rates for a relatively small number of services that account for a large proportion of spending within that category. For instance, in 2021, Medicare's payment rates for several types of office/outpatient E\&M visits for established patients (which accounted for almost 40 percent of total E\&M spending) increased by between 20 and 25 percent. These higher rates are attributable to substantial increases in the RVUs of these services. Owing to budget neutrality requirements, CMS offset the increase to rates for E\&M office/outpatient visits by reducing rates for all fee schedule services, which at least partly explains the reductions in spending per unit of service among other services.

## Private PPO payment rates remain higher than Medicare payment rates for clinician services, but the gap diminished in 2021

We compare rates paid by private insurance plans with Medicare rates for clinician services because extreme disparities in payment rates might create an incentive for clinicians to focus primarily on patients with private insurance and avoid those with FFS Medicare. For this
analysis, we used data on paid claims for enrollees of preferred provider organization (PPO) health plans that are part of a large national insurer that covers a wide geographic area across the United States. ${ }^{31}$ In 2021, the PPO payment rates for clinician services were 134 percent of FFS Medicare's payment rates, down from 138 percent in 2020 . This decline was driven by a drop in the ratio of private insurance rates to Medicare rates for E\&M office/outpatient visits; private insurance rates were 127 percent of Medicare rates for these services in 2020 but 114 percent of Medicare rates in 2021. This change was probably due to CMS's substantial increase in Medicare payment rates for E\&M office/outpatient visits in 2021, which appears to have not yet been matched by private plans.

The ratio in 2021, as in prior years, varied by type of service. For example, private insurance rates were 106 percent of Medicare rates for annual wellness visits but 201 percent of Medicare rates for CT scans of the chest.

Despite the decline in 2021, the gap between private insurance rates and Medicare rates has grown over the last decade as private insurance rates have risen while Medicare rates have remained relatively stable (except for the growth in rates for E\&M office/outpatient visits in 2021). In 2011, private insurance rates were 122 percent of Medicare rates. Nevertheless, as we note earlier, the vast majority of clinicians continue to participate in the Medicare program.

The growth in private insurance prices is probably a result of greater consolidation of physician practices and hospitals' acquisition of physician practices, which gives providers greater leverage to negotiate higher prices for clinician services with private plans. In recent years, the number of physicians joining larger groups, hospitals, and health systems has risen sharply. For example, between 2016 and 2018, the share of all physicians who were vertically affiliated with health systems climbed from 40 percent to 51 percent (Furukawa et al. 2020).

Studies show that private insurance prices for physician services are higher in markets with larger physician practices and in markets with greater physician-hospital consolidation (Capps et al. 2018, Clemens and Gottlieb 2017, Neprash et al. 2015). Similarly, our own research has found that independent practices with larger market shares and hospital-
owned practices received higher private insurance prices for E\&M visits than other practices in their market (Medicare Payment Advisory Commission 2017).

## Median physician compensation grew 3 percent per year from 2017 to 2021; compensation remains much higher for certain specialties than for primary care

To examine the compensation that clinicians receive from all payers, we analyze data from SullivanCotter's Physician Compensation and Productivity Survey; most of the clinician practices in this survey are affiliated with a large hospital or health system. From 2017 to 2021, median compensation across all physician specialties grew at an average annual rate of 3.0 percent and in 2021 was $\$ 315,000$. From 2017 to 2021, median compensation for primary care physicians increased at an average annual rate of 3.6 percent, faster than nonsurgical, procedural specialties (3.4 percent), nonsurgical, nonprocedural specialties (2.6 percent), surgical specialties ( 2.4 percent), and radiology ( 2.3 percent). ${ }^{32}$

Compensation is much higher for certain specialties than for primary care As in prior years, compensation was much higher for many specialists than for primary care physicians in 2021. Specialties with the highest median compensation were radiology ( $\$ 482,000$ ); nonsurgical, procedural specialties ( $\$ 450,000$ ); and surgical specialties ( $\$ 441,000$ ) (Figure 4-5, p. 130). ${ }^{33}$ Median compensation for radiology was 83 percent higher than median compensation for primary care ( $\$ 264,000$ ), and median compensation for nonsurgical, procedural specialties was 71 percent higher than that for primary care. ${ }^{34}$ Psychiatry-which is in the nonsurgical, nonprocedural group-had median compensation of $\$ 262,000 .{ }^{35}$ By comparison, nurse practitioners had median compensation of $\$ 125,000$ and physician assistants had median compensation of \$123,000 (data not shown).

## There is no consistent relationship between

 compensation and practice ownership Due to the growth in hospital employment of physicians and hospitals' acquisition of physician practices, we examined whether physicians in hospital-owned practices earn more or less than physicians in physician-owned practices. In our review of the literature, we did not find a consistent relationship much lower than for most specialists, 2021

Physician specialties

Note: Figure includes all physicians who reported their annual compensation in the survey ( $n=106,522$ ). The primary care group includes family medicine, internal medicine, and general pediatrics. The nonsurgical, nonprocedural group includes psychiatry, emergency medicine, endocrinology, hospital medicine, nephrology, neurology, physical medicine, rheumatology, and other internal medicine/pediatrics. The nonsurgical, procedural group includes cardiology, dermatology, gastroenterology, pulmonary medicine, and hematology/oncology.

Source: SullivanCotter's Physician Compensation and Productivity Survey, 2022.
between practice ownership and physician compensation, however. According to 2020 data from the Medical Group Management Association, primary care physicians who worked at physicianowned practices received higher compensation than their counterparts who worked at practices owned by hospitals or health systems, regardless of compensation method (e.g., 100 percent salary, 100 percent productivity, mix of productivity and quality metrics) (Medical Group Management Association 2022). Meanwhile, the relationship between practice ownership and compensation for surgical and nonsurgical specialists varied depending
on compensation method. For example, nonsurgical specialists who were employed by hospital-owned practices earned higher compensation than those employed by physician-owned practices if they were salaried but not if their compensation was based on productivity metrics. Similarly, Whaley and colleagues found that practice ownership did not have a consistent impact on physician compensation (Whaley et al. 2021). Employment in practices owned by hospitals or health systems was associated with slightly lower income for nonsurgical specialists, slightly higher income for surgical specialists, and no difference in income for primary care physicians.

Medicare's physician fee schedule influences differences in physician compensation from all payers Physician compensation from all payers reflects the structure of Medicare's physician fee schedule because many private insurers base their payment rates on the fee schedule's relative prices (Clemens and Gottlieb 2017, Congressional Budget Office 2018). Therefore, physician compensation from all payers likely reflects the fee schedule's historical underpricing of ambulatory E\&M visits relative to other services, such as procedures (Medicare Payment Advisory Commission 2018a). ${ }^{36}$ Ambulatory E\&M visits make up a large share of the services provided by primary care clinicians and certain other specialties (e.g., psychiatry, endocrinology, and rheumatology). The fee schedule's underpricing of these services has contributed to an income disparity between primary care physicians and certain specialists, which may be a substantial factor in the decline of primary care physicians since 2016.

For many years, the Commission has expressed concern about the accuracy of the physician fee schedule, the underpricing of primary care services relative to other services, and the impact of these problems on the pipeline of future primary care physicians (Medicare Payment Advisory Commission 2022b). We have made several recommendations to improve the accuracy of the fee schedule and increase payments for primary care services (Medicare Payment Advisory Commission 2022b, Medicare Payment Advisory Commission 2018a, Medicare Payment Advisory Commission 2011).

In 2021, CMS substantially increased the payment rates for E\&M office/outpatient visits-the most common type of ambulatory E\&M visit. The Commission strongly supported this action because it is an important first step in addressing the long-term devaluation of these services (Medicare Payment Advisory Commission 2020). We also supported CMS's decision to implement this change in a budget-neutral manner because doing so will help to rebalance the fee schedule from services that have become overvalued (e.g., procedures, imaging, and tests) to services that have become undervalued-thus improving payment accuracy (Centers for Medicare \& Medicaid Services 2020). Maintaining budget neutrality could also help to reduce the large gap in compensation between primary care physicians and certain specialists, which could increase the supply of primary care physicians.

Input costs for clinicians are projected to increase at rates not seen for many years
The Medicare Economic Index (MEI) measures the average annual price change for the market basket of inputs used by clinicians to furnish services, after adjusting for economy-wide productivity. The MEI consists of two main categories: (1) physicians' compensation and (2) physicians' practice expenses (e.g., compensation for nonphysician staff, rent, equipment, and professional liability insurance). The index's cost categories (e.g., physician compensation, medical equipment) and cost weights (each category's share of total costs) were previously based on data on physicians' expenses from 2006. ${ }^{37}$ However, CMS recently updated the MEI's cost categories and cost weights using data on physician offices from 2017 from the Census Bureau's Services Annual Survey, along with data from other sources (Centers for Medicare \& Medicaid Services 2022b).

Between 2010 and 2022, the MEI increased cumulatively by 23 percent-far exceeding the 6 percent cumulative increase in annual updates to physician fee schedule payment rates (Figure 4-6, p. 132). However, the volume and intensity of clinician services delivered each year has increased, which has resulted in fee schedule spending per FFS beneficiary keeping pace with growth in the MEI through 2021 (Boards of Trustees 2022).

Clinicians are now experiencing higher growth in their input costs than in recent years. After growing by 1 to 2 percentage points per year in recent prepandemic years, the MEI grew by 2.6 percent in 2021 and is estimated to have grown by 4.7 percent in 2022. CMS projects continued high growth in clinicians' input costs in the next few years, with the MEI currently projected to grow by 3.9 percent in 2023 and by 2.9 percent in $2024 .{ }^{38}$

## How should Medicare payments change in 2024?

The Commission's deliberations on payment adequacy for clinicians are informed by data assessing beneficiaries' access to clinicians' services, the quality of beneficiaries' care, and clinicians' revenues and costs. We find that, on the basis of these indicators,

## The MEI grew faster than updates to physician payment rates, but spending

 per FFS beneficiary largely kept pace with MEI growth, 2010-2022

Note: FFS (fee-for-service), MEI (Medicare Economic Index). The MEI measures the change in clinician input prices. Spending per FFS beneficiary is based on incurred spending under the physician fee schedule. Figure shows increases to payment rates in nominal terms. Figure does not show annual Merit-based Incentive Payment System (MIPS) adjustments, which can increase or decrease payments to individual clinicians based on performance measures, or advanced alternative payment model bonuses, because these adjustments are one-time and not built into subsequent years' payment rates. Figure also does not show adjustments to payment rates to ensure that changes to the relative values of individual billing codes are budget neutral. Figure shows the temporary 3.75 percent increase to fee schedule rates in 2021 and the temporary 3.0 percent increase in 2022 . The MEI and spending per beneficiary numbers for 2022 are projected.
 of 2015.
aggregate payments appear adequate. However, clinicians' input costs grew at a faster rate in 2021 than in previous years and are projected to continue rising rapidly through 2024.

## RECOMMENDATION 4-1

For calendar year 2024, the Congress should update the $\mathbf{2 0 2 3}$ Medicare base payment rate for physician and other health professional services by 50 percent of the projected increase in the Medicare Economic Index.

## RATIONALE 4-1

Overall, access to clinician services for Medicare beneficiaries appears stable and comparable to-or
even better than-that of privately insured individuals. Quality of care has always been difficult to assess in the clinician sector; these difficulties have been exacerbated by the coronavirus pandemic. Although physician fee schedule spending per beneficiary dropped sharply in 2020 due to the pandemic, spending largely recovered in 2021 and was higher than in 2019. However, clinicians' input costs grew faster in 2021 than in previous years and are projected to continue rising rapidly through 2024. We are concerned that clinicians may not be able to absorb these cost increases at current payment levels. However, aggregate payments appear adequate on the basis of our indicators. Therefore, we recommend
that the Congress raise the base payment rate in 2024 by half of the projected increase in the MEI. Because clinicians' practice expenses account for about half of the MEI, this recommendation would help ensure that payment rates keep pace with the growth of clinicians' practice costs.

The MEI is currently projected to grow by 2.9 percent in 2024 , so our recommendation is currently estimated to yield an increase in payment rates of 1.45 percent ( 50 percent $\times 2.9$ percent $=1.45$ percent). The MEI is updated quarterly, and the MEI at the time CMS finalizes the 2024 physician fee schedule payment rates could be larger or smaller than the current projection. The Consolidated Appropriations Act, 2023, provides a temporary increase to base payment rates of 1.25 percent in 2024, which will expire after 2024. By contrast, the Commission's recommendation would be factored into payment rates beyond 2024.

In addition to this recommendation for an across-theboard increase to the base payment rate for services paid under the physician fee schedule, the Commission contends that it is important to provide additional financial support to clinicians who furnish care to low-income beneficiaries. A separate discussion of how Medicare can better support safety-net clinicians follows.

## IMPLICATIONS 4-1

## Spending

- This recommendation would increase program spending relative to current law by $\$ 750$ million to $\$ 2$ billion in 2024 and by $\$ 5$ billion to $\$ 10$ billion over five years.


## Beneficiary and provider

- The Commission's recommendation should maintain beneficiaries' access to care and providers' willingness and ability to furnish care.


## Supporting Medicare safety-net clinicians

The Commission has undertaken a body of work to examine safety-net providers and develop ways that the Medicare program can best support their mission. In our June 2022 report to the Congress,
we described frameworks that could be used across multiple health care sectors to identify safety-net providers and applied those frameworks to acute care hospitals (Medicare Payment Advisory Commission 2022a). Specifically, we identified safety-net providers as those that disproportionately serve (1) low-income Medicare beneficiaries who are less profitable to care for than the average beneficiary, or (2) uninsured patients or patients with public insurance who are not materially profitable to treat, meaning-without supplemental payments-the profit margins for these patients are negative or too low to sustain a health care organization. Next, we developed a conceptual framework for determining whether the Medicare program should allocate new funding to support identified safety-net providers. We asserted that Medicare should spend additional funds to support safety-net providers only if:

- Low-income Medicare beneficiaries are at risk of negative effects (e.g., access problems due to provider closures) without additional funding;
- Medicare is not a materially profitable payer in the sector; and
- Current payment adjustments cannot be redesigned to adequately support safety-net providers.

As described in Chapter 3 of this report, the Commission has determined that additional Medicare payments to Medicare safety-net hospitals are warranted and recommends adding \$2 billion to Medicare's current safety-net payments (disproportionate share hospital and uncompensated care payments) and then redistributing those funds using a Commission-developed Medicare Safety-Net Index for hospitals. This recommendation would better target scarce Medicare resources to support hospitals that are key sources of care for low-income Medicare beneficiaries and are at high risk of closure.

In this chapter, we consider a new Medicare safety-net policy to support clinicians who care for low-income beneficiaries. As in Chapter 3, our definition of lowincome Medicare beneficiaries includes all those who receive full or partial Medicaid benefits and those who do not qualify for Medicaid benefits in their state but who receive the Part D low-income subsidy (LIS)


Share of NPI's claims associated with LIS beneficiaries

Note: LIS (low-income subsidy), NPI (national provider identifier). "LIS beneficiaries" includes all beneficiaries who receive full or partial Medicaid benefits, as well as those who do not qualify for Medicaid benefits in their state but who receive the Part D LIS because they have limited assets and an income below 150 percent of the federal poverty level. Nurse practitioners (NPs) and physician assistants (PAs) who practiced in primary care are included in the primary care category; the remaining NPs and PAs are included in the non-primary care category.

Source: MedPAC analysis of claims for 100 percent of fee-for-service beneficiaries.
because they have limited assets and an income below 150 percent of the federal poverty level. (Collectively, we refer to this population as "LIS beneficiaries" because those who receive full or partial Medicaid benefits are automatically eligible to receive the LIS.) We find that certain clinicians treat a disproportionate share of LIS beneficiaries, and that doing so can generate reduced revenues, even though the costs required to treat them likely are the same as for other beneficiaries, if not more.

The combination of lower revenues and potentially higher treatment costs can put a financial strain on safety-net clinicians and make it more difficult for low-income beneficiaries to access needed care. Given that FFS Medicare does not have an existing
set of policies that support safety-net clinicians, the Commission contends that Medicare should provide additional financial support to clinicians who care for low-income beneficiaries. Specifically, for covered services furnished to LIS beneficiaries, the Commission supports a policy that would increase Medicare physician fee schedule payment rates by 15 percent for primary care clinicians and 5 percent for non-primary care clinicians. Medicare safety-net add-on payments would be available to any clinician who furnishes services to LIS beneficiaries under the physician fee schedule, but clinicians who provide care for more LIS beneficiaries would receive relatively more in safety-net payments-thus providing an incentive for all clinicians to maintain or improve access for lowincome beneficiaries.

Nurse practitioners in primary and specialty care, as well as other primary care clinicians, had a higher share of allowed charges associated with LIS beneficiaries, 2019

| Type of beneficiary | Share of allowed charges by type of clinician |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Primary care |  |  | Specialty care |  |  | Other APRNs | Other clinicians |
|  | Physicians | NPs | PAs | Physicians | NPs | PAs |  |  |
| All LIS | 28\% | 41\% | 28\% | 25\% | 36\% | 25\% | 23\% | 23\% |
| Non-LIS | 72 | 59 | 72 | 75 | 64 | 75 | 78 | 77 |
| Total | 100 | 100 | 100 | 100 | 100 | 100 | 100 | 100 |

Note: LIS (low-income subsidy), APRN (advanced practice registered nurse), NP (nurse practitioner), PA (physician assistant). "All LIS" beneficiaries includes all beneficiaries who receive full or partial Medicaid benefits, as well as those who do not qualify for Medicaid benefits in their state but who receive the Part D LIS because they have limited assets and an income below 150 percent of the federal poverty level. "Other APRNs" predominantly comprises certified registered nurse anesthetists but also includes certified nurse midwives and clinical nurse specialists. "Other clinicians" includes practitioners such as podiatrists, physical and occupational therapists, psychologists, and chiropractors.

Source: MedPAC analysis of claims for 100 percent of fee-for-service beneficiaries and enrollment data.

## Certain clinicians treat a disproportionate share of low-income beneficiaries

Certain clinicians treat a large share of low-income beneficiaries. ${ }^{39}$ In 2019, 9 percent of primary care clinicians and 8 percent of non-primary care clinicians who billed the physician fee schedule had more than 80 percent of their claims associated with LIS beneficiaries (Figure 4-7). ${ }^{40}$ The majority of clinicians had less than 40 percent of their claims associated with LIS beneficiaries.

To better understand the extent to which these patterns varied across different types of clinicians, we analyzed billing patterns by clinician specialty across the full range of clinicians who billed the physician fee schedule, including sorting nurse practitioners (NPs) and physician assistants (PAs) into primary care and specialty care categories. We used allowed charges to measure how low-income beneficiaries are distributed among different types of providers (as opposed to measuring the number of clinicians) to prevent clinicians who treat relatively few beneficiaries from skewing the results.

We found that, among all clinician types, NPs on average had the highest share of allowed charges associated with LIS beneficiaries (Table 4-9). In 2019,

41 percent of the allowed charges billed by NPs who practiced in primary care were for LIS beneficiaries, as were 36 percent for NPs who practiced in specialty care compared with 28 percent for primary care physicians and PAs and 25 percent for specialty care physicians and PAs.

While specialist physicians had slightly lower shares of their allowed charges associated with LIS beneficiaries compared with primary care physicians, they still billed for a majority ( 64 percent) of LIS beneficiaries' allowed charges (latter not shown). This higher percentage reflects the fact that specialist physicians bill for a large majority of all fee schedule services.

The share of specialist physicians' allowed charges associated with LIS beneficiaries varied substantially among specialists. Among the top 20 specialist physician specialties (ranked by allowed charges), nephrologists had the highest share (49 percent) and dermatologists had the lowest share ( 6 percent).

We also examined the extent to which clinicians in rural or urban areas disproportionately treated LIS beneficiaries. We found that rural clinicians billed for a slightly higher share of LIS beneficiaries' allowed charges ( 10 percent) in 2019 compared with urban clinicians ( 8 percent). ${ }^{41}$ Rural providers were also more
likely to have LIS beneficiaries account for a moderate share of their fee schedule claims compared with urban providers who were more likely to treat very low shares of LIS beneficiaries. In 2019, about 22 percent of urban clinicians had fewer than 10 percent of their claims associated with LIS beneficiaries compared with only 12 percent of clinicians practicing in rural micropolitan areas.

## Treating beneficiaries with low income often generates less revenue for clinicians

For most fee schedule services, the Medicare program pays 80 percent of the fee schedule rate, and the beneficiary (or their supplemental insurer) is responsible for the remaining 20 percent. However, clinicians are prohibited from seeking cost-sharing payments from most LIS beneficiaries. Clinicians generally cannot collect cost sharing from beneficiaries who have full Medicaid benefits or for most beneficiaries who receive partial Medicaid benefitsspecifically, those eligible for the Qualified Medicare Beneficiary (QMB) program. ${ }^{42}$ These two groups of beneficiaries accounted for about 85 percent of the LIS population in 2019.

For beneficiaries who are enrolled in full Medicaid benefits or the QMB program and are exempt from paying cost sharing, clinicians can seek payment for the 20 percent coinsurance from state Medicaid programs. However, state Medicaid programs are allowed to pay less than the full Medicare costsharing amount if paying the full Medicare cost sharing would lead a provider to receive more than the state's Medicaid payment rate for the service (Medicaid and CHIP Payment and Access Commission 2015). These policies are referred to as "lesser-of" policies because state Medicaid programs pay the lesser of (1) Medicare's cost-sharing amount or (2) the difference between the state Medicaid fee schedule and the Medicare program's payment for a service. Due to the prohibition on collecting costsharing payments from most Medicaid beneficiaries and widespread adoption of policies that reduce or eliminate state payment of cost sharing for those beneficiaries, clinicians who care for low-income beneficiaries are often paid effective rates that are 20 percent below Medicare's standard physician fee schedule rates.

Most states have Medicaid payment rates for clinician services that are below Medicare rates and have implemented "lesser-of" policies. One study found that in 2019, state Medicaid rates for clinician services averaged 72 percent of Medicare rates for 27 common procedures, and this ratio was even lower (67 percent) for primary care services (Zuckerman et al. 2021). Another study found that, between 2004 and 2018, the number of states that limited Medicaid payments of Medicare cost sharing when Medicaid's fee schedule was lower than Medicare's rate increased from 36 states to 42 states (Roberts et al. 2020). These studies find that clinicians are routinely paid substantially less for furnishing the same care to dualeligible beneficiaries than they are for other Medicare beneficiaries.

To estimate the magnitude of a lack of cost-sharing payments, we calculated the total physician fee schedule-allowed charges billed for services furnished to beneficiaries eligible for full Medicaid benefits or the QMB program in 2019. Using the state Medicaid payment rates published by Zuckerman et al. and the "lesser-of" state policies published by Roberts et al., we then estimated the dollar amount of cost sharing that clinicians did not collect.

We estimate that in 2019, providers did not collect about $\$ 3.6$ billion in physician fee schedule-allowed charges for beneficiaries eligible for full Medicaid benefits and those in the QMB program due to the combination of the prohibition on collecting costsharing payments and state "lesser-of" Medicaid policies. While this estimate has limitations, the magnitude of our estimate-which amounts to nearly 15 percent of all allowed charges billed for fee schedule services furnished to LIS beneficiaries-strongly suggests that treating LIS beneficiaries is less profitable than treating other beneficiaries.

Clinicians are not prohibited from collecting costsharing payments from beneficiaries who receive the Part D LIS but are not dually eligible for Medicaid in their state of residence, nor are clinicians prohibited from collecting cost-sharing payments from partially dual beneficiaries who are not in the QMB program. However, these patients may have difficulty meeting their cost-sharing requirements, so providers may be less likely to collect cost sharing from them. Medicare
does not pay clinicians for bad debt associated with an inability to collect cost-sharing payments. Since clinicians do not submit cost reports, it is difficult to quantify the magnitude of any bad debt.

Similarly, without cost reports it is difficult to assess clinicians' treatment costs, but there is little reason to believe that the costs of treating low-income beneficiaries are less than the costs of treating higherincome beneficiaries. Indeed, studies have shown that patients with lower income tend to be sicker and more costly to treat compared with higher-income patients (Cunningham et al. 2018, Kabir et al. 2022). Given the combination of lower revenue for lowincome beneficiaries and treatment costs that are at least as much as for other beneficiaries, we believe it is reasonable to infer (despite the lack of cost report data) that LIS beneficiaries are less profitable for clinicians than non-LIS patients.

## LIS beneficiaries report having greater difficulty accessing care than other beneficiaries

As outlined earlier in this chapter, the Commission has consistently found that Medicare beneficiaries have good access to clinician care overall. However, our analysis of the Medicare Current Beneficiary Survey (MCBS) suggests that low-income beneficiaries face greater challenges accessing care than other beneficiaries. While many low-income beneficiaries are exempt from the financial burden of cost sharing, challenges in accessing care can arise from a variety of other factors. These could include difficulty finding an available provider, the cost of transportation, and difficulty taking time away from work or caring for family members. Among FFS beneficiaries in 2019, we found that LIS beneficiaries were three times more likely to not receive care for a health problem (18 percent for LIS beneficiaries compared with 6 percent of non-LIS beneficiaries) (Table 4-10, p. 138). Lowincome beneficiaries also reported having more trouble getting needed health care and higher rates of not being satisfied with the ease with which they can get to a doctor from where they live. We analyzed 2018 MCBS data and found similar results (data not shown).

The MCBS also asks a series of questions about the reasons beneficiaries had difficulty accessing care. Beneficiaries commonly reported that the cost of care created difficulties for them in accessing care.

For example, in 2019, MCBS data suggest that about 8 percent of non-LIS FFS beneficiaries delayed care in the past year because of cost compared with 10 percent of those eligible for full Medicaid benefits, 19 percent of those with partial Medicaid benefits, and 29 percent of LIS-only beneficiaries. (LIS-only beneficiaries do not qualify for full or partial Medicaid benefits in their state but receive the Part D LIS because they have limited assets and an income below 150 percent of the federal poverty level.)

One recent study also found that low-income beneficiaries who do not qualify for cost-sharing assistance had greater challenges accessing care. The study compared the service use of beneficiaries for whom Medicaid paid their cost sharing with those who had low incomes but who just missed the income threshold to qualify for cost-sharing assistance. The research found that beneficiaries who were just above the income threshold used 55 percent fewer outpatient E\&M services (Roberts et al. 2021). Another study found that in states that reduced cost-sharing payments by implementing "lesser-of" payment policies, there were significant reductions in the number and intensity of visits to physicians among dual-enrolled Medicare beneficiaries (Hayford et al. 2023). The reductions were larger for new patient visits than for visits with established patients and larger for primary care physicians than for other clinicians, which suggests that reducing total clinician revenue through "lesser-of" policies has a deleterious effect on access to care, especially among duals seeking care from a new primary care clinician.

## A new Medicare safety-net add-on payment for clinicians treating beneficiaries with low incomes

Given that lower revenues and potentially higher treatment costs may create financial strain on clinicians who care for beneficiaries with low incomes and may make it difficult for such beneficiaries to access needed care, the Commission supports instituting a new Medicare safety-net (MSN) add-on payment for clinicians who treat LIS beneficiaries. Specifically, clinicians should receive add-on payments based on a percentage of allowed charges for physician fee schedule services furnished to LIS beneficiaries. The Commission supports options that would provide a higher add-on percentage for services furnished by

|  | Non-LIS | Fully dual-eligible | Partially dual-eligible | LIS-only |
| :---: | :---: | :---: | :---: | :---: |
| Share of FFS beneficiaries | 76\% | 17\% | 4\% | 3\% |
| Had a health problem that they thought they should see a doctor for but didn't | 6 | 10* | 14* | 18* |
| Had trouble getting needed health care | 6 | 12* | 18* | 18* |
| Not satisfied with ease with which they can get to a doctor from where they live | 4 | 8* | 8* | 8* |
| Not satisfied with the quality of medical care in the past year | 4 | 7* | 7* | 4 |
| Had problem paying medical bill | 7 | 13* | 28* | 30* |
| Delayed care because of cost in the past year | 8 | 10* | 19* | 29* |

Note: FFS (fee-for-service), LIS (low-income subsidy). "Non-LIS" beneficiaries do not receive any Medicaid benefits or Part D's LIS. "Fully dual-eligible" Medicare beneficiaries receive full Medicaid benefits. "Partially dual-eligible" Medicare beneficiaries receive partial Medicaid benefits. "LIS-only" beneficiaries do not qualify for full or partial Medicaid benefits in their state but receive the Part D LIS because they have limited assets and an income below 150 percent of the federal poverty level.
*Statistically significantly different $(p=0.05)$ compared with non-LIS beneficiaries.
Source: MedPAC analysis of Medicare Current Beneficiary Survey data.
primary care clinicians than for services furnished by non-primary care clinicians. This approach recognizes that all clinicians who furnish care to beneficiaries with lower income are in need of additional financial support, but that primary care clinicians generally receive less total compensation than specialists and have an even greater need for safety-net payments.

For primary care clinicians (including NPs and PAs who practice as primary care providers), the add-on should equal 15 percent of fee schedule-allowed charges for LIS beneficiaries, while the add-on for other clinicians (including NPs and PAs who do not practice as primary care providers) should equal 5 percent of allowed charges. Because Medicare does not have an existing program to provide financial support to safety-net clinicians, and clinician payments are subject to relatively low statutory annual updates in the near term, the Commission asserts that the MSN add-on
should be funded with new spending and not offset by reductions in fee schedule payment rates.

The approach for including a clinician safety-net add-on payment in FFS Medicare offers several benefits. The add-on would be relatively easy for clinicians to understand and for CMS to administer. Total add-on payments received by a clinician would be a simple function of total fee schedule-allowed charges for all services furnished to LIS beneficiaries multiplied by a fixed percentage. There are no cliffs, cutoffs, or complex exclusions that would affect add-on payments in unexpected ways. Clinicians who furnish care to more LIS beneficiaries would tend to receive higher total MSN add-on payments than clinicians who see fewer LIS beneficiaries. As such, the policy would provide predictable financial support for safety-net clinicians whose revenues are reduced by state payment policies for dually eligible beneficiaries
and a straightforward financial incentive for clinicians to provide access to care for beneficiaries with lower incomes.

MSN add-on payments would not increase administrative burdens on clinicians; Medicare administrative contractors (the entities that process FFS claims) would calculate the add-on payments based on standard claims submissions and make payments to clinicians without the need for clinicians to complete additional forms or paperwork. Add-on payments themselves would not be subject to beneficiary cost sharing and could be paid to clinicians on a periodic lump-sum basis rather than adjusting payments for each eligible claim. Quarterly MSN payments would be consistent with the way payments under the Health Professional Shortage Area (HPSA) program are administered. Lump-sum payments are likely to be less burdensome for CMS to administer, and easier for clinicians to understand, than adjustments made on a claim-by-claim basis.

Applying a higher add-on adjustment to payments for services furnished by primary care clinicians will necessitate definitive classification of clinicians. In our analyses, we used the specialty designation that appears on a plurality of each clinician's claims. We classified physicians whose specialties are internal medicine, family medicine, geriatric medicine, or pediatric medicine (with an adjustment to exclude clinicians who are serving as hospitalists) as "primary care clinicians." Claims data do not indicate the specialty in which nurse practitioners or physician assistants practice. Therefore, we developed an algorithm to sort these clinicians into primary care or specialty care categories based on (1) the location and types of services they billed, (2) the specialties of the physicians with whom they practiced, and (3) the types of conditions they treated. All clinicians who did not meet any of the criteria for primary care were designated as "non-primary care." Other methodologies could also be used to designate primary care clinicians and identify specialties for nurse practitioners and physician assistants.

We considered whether an MSN add-on policy should be extended to services furnished by federally qualified health centers ( FQHCs ) and rural health clinics (RHCs). FQHCs are outpatient clinics that predominantly furnish primary care and must offer free or reduced-
cost care to low-income individuals, among other requirements. RHCs are outpatient clinics that mainly furnish primary care but also offer specialist care. RHCs must initially be located in an area that is considered underserved, but they are not required to offer free or reduced-cost care to patients. RHCs can be physician owned or owned by a larger entity and are very similar to traditional physician offices. In 2020, Medicare spending for services furnished in FQHCs and RHCs totaled $\$ 1.4$ billion and $\$ 1.6$ billion, respectively.

There are two important differences between traditional physician offices and FQHCs and RHCs that should be considered when evaluating whether supplemental safety-net payments are needed. First, FQHCs and RHCs are already paid substantially higher rates than clinicians in office-based settings. Medicare's payment systems for FQHCs and RHCs generally bundle all professional services furnished in a single day into one payment, with limited exceptions. Most claims are for E\&M visits. On average, Medicare's payment rates for FQHCs and RHCs are higher than if the same services were billed under the physician fee schedule, although the exact rates vary. For example, in 2022 Medicare paid approximately $\$ 92$ for a mid-level office visit in a freestanding physician office compared with $\$ 180$ for the same service in a FQHC and $\$ 263$ in certain types of provider-based RHCs. ${ }^{43}$

The second difference is that if the RHC or FQHC does not receive cost sharing for a visit, they can declare what would have been received through cost sharing as bad debt on their cost report and be paid 65 percent of those bad debts by Medicare. For example, if a state Medicaid program does not pay cost sharing for its dual-eligible Medicare beneficiaries, that cost sharing would be fully lost by a clinician who practices at a traditional physician clinic, but that clinician would recoup 65 percent of their bad debt if the physician owned and operated their practice as an RHC. The higher payment rates for RHCs and FQHCs, coupled with the differences in bad-debt treatment, suggest that the payment rates received by RHCs and FQHCs are sufficient without additional Medicare safety-net funds. ${ }^{44}$

## Impact of Medicare safety-net add-on payments for clinicians

We have estimated the high-level impact of MSN add-on payments for all fee schedule services and a 5 percent add-on for non-primary care clinicians, 2019

| Clinician type | FFS add-on <br> (in billions) | Percent of <br> total add-on | Annual mean add-on <br> per clinician |
| :--- | :---: | :---: | :---: |
| Primary care (15\% add-on) | $\$ 0.7$ | $40 \%$ | $\$ 2,870$ |
| Non-primary care (5\% add-on) | 1.0 | 60 | 990 |
| All clinicians | 1.7 | 100 | 1,340 |

Note: FFS (fee-for-service). Estimates were calculated using 2019 data. Nurse practitioners (NPs) and physician assistants (PAs) who practiced in primary care are included in the primary care category; the remaining NPs and PAs are included in the non-primary care category.

Source: MedPAC analysis of claims for 100 percent of fee-for-service beneficiaries and enrollment data.
furnished to LIS beneficiaries enrolled in FFS Medicare (Table 4-11). The estimate shows that a 15 percent add-on for primary care clinicians and a 5 percent add-on for non-primary care clinicians would increase Medicare spending by about $\$ 1.7$ billion annually, about 40 percent of which would go to primary care clinicians and 60 percent to other clinicians. On a per clinician basis, primary care providers would receive an average safety-net payment of $\$ 2,870$ per year and other clinicians would receive an average of $\$ 990$ per year.

Since some clinicians furnish a disproportionate amount of care to LIS beneficiaries (Figure 4-7, p. 134), we show how MSN add-on payments would be distributed among clinicians depending on how many LIS beneficiaries they care for (Table 4-12). We classified clinicians billing the fee schedule in 2019 into five equally sized cohorts, depending on how many unique LIS beneficiaries they furnished services to that year. For each quintile, we estimated what the average annual MSN add-on payment would be. Primary care clinicians in the highest quintile (i.e., those who treated an average of 171 LIS beneficiaries) would receive an estimated average MSN add-on payment of \$10,467 per year. Among non-primary care clinicians treating the highest number of LIS beneficiaries, safety-net add-on payments would average $\$ 3,304$. Primary care and non-primary care clinicians with the smallest number of LIS beneficiaries would receive average MSN payments of $\$ 62$ and $\$ 34$, respectively.

## Recommendation

To promote adequate access to care, additional financial support for clinicians who furnish care to Medicare beneficiaries with low incomes is warranted. Medicare should make add-on safety-net payments for physician fee schedule services provided to lowincome beneficiaries, with a higher percentage add-on for primary care clinicians.

## RECOMMENDATION 4-2

The Congress should enact a non-budget-neutral add-on payment, not subject to beneficiary cost sharing, under the physician fee schedule for services provided to low-income Medicare beneficiaries. These add-on payments should equal a clinician's allowed charges for these beneficiaries multiplied by:

## - $\mathbf{1 5}$ percent for primary care clinicians and

- 5 percent for non-primary care clinicians.

Clinicians should receive an MSN add-on payment for all physician fee schedule services furnished to Medicare beneficiaries who are dually enrolled in Medicaid and/or the LIS program. MSN payments would be based on applying an add-on rate to the allowed charge (also known as the Medicare payment amount) for fee schedule services furnished to those beneficiaries. Clinicians who are designated as primary care providers should receive a higher MSN add-on rate ( 15 percent) than non-primary clinicians number of LIS beneficiaries a clinician treats increases

|  | Primary care clinicians | Non-primary care clinicians |
| :--- | :---: | :---: | :---: | :---: |

Note: LIS (low-income subsidy). "LIS beneficiaries" includes all beneficiaries who receive full or partial Medicaid benefits, as well as those who do not qualify for Medicaid benefits in their state but who receive the Part D LIS because they have limited assets and an income below 150 percent of the federal poverty level. Estimates were calculated using 2019 data. Nurse practitioners (NPs) and physician assistants (PAs) who practiced in primary care are included in the primary care category; the remaining NPs and PAs are included in the non-primary care category.

Source: MedPAC analysis of claims for 100 percent of fee-for-service beneficiaries and enrollment data.
(5 percent). Policymakers would need to determine how best to define "primary care providers." ${ }^{45}$

MSN add-on payments could be made quarterly on a lump-sum basis, similar to the method used for HPSA payments, rather than applied to payments for individual claims. Spending on MSN add-on payments should not be subject to beneficiary cost sharing, and the increase in Medicare spending should not be offset by reducing other fee schedule spending.

MSN add-on payments should not be extended to Medicare Advantage (MA) plans. More than 60 percent of dually enrolled beneficiaries in MA are in dual-eligible special needs plans (D-SNPs), which are specifically designed for beneficiaries enrolled in both Medicare and Medicaid. MA plans can operate their own initiatives to support safety-net clinicians, including making up for lost cost-sharing revenue when they contract with clinicians. Given the contracting flexibilities that MA plans already have, safety-net payments should not be made directly to clinicians who treat low-income MA enrollees, nor should FFS spending on MSN add-on payments be included in MA benchmarks.

## RATIONALE 4-2

Clinicians often receive less revenue when treating low-income beneficiaries because of the way Medicare's cost-sharing policies interact with state Medicaid payment policies. Given that the cost to clinicians of treating low-income beneficiaries is at least as much as, if not higher than, the cost of treating other beneficiaries, caring for low-income beneficiaries is likely less profitable and may put clinicians at financial risk. Surveys consistently find that lowincome beneficiaries report having more difficulty accessing needed care than other beneficiaries. Since there is no existing Medicare policy that directly supports safety-net clinicians who serve low-income beneficiaries, addressing these issues requires a new payment mechanism. Applying an MSN add-on to physician fee schedule payments would help to make up for a portion of clinicians' lost cost-sharing revenue when they treat low-income beneficiaries and reduce their financial risk for doing so. By making caring for low-income beneficiaries less of a financial risk, the MSN add-on could encourage clinicians to maintain or improve access for this population.

## IMPLICATIONS 4-2

## Spending

- This recommendation would increase program spending relative to current law by greater than $\$ 2$ billion in one year and by greater than $\$ 10$ billion over five years.


## Beneficiaries and providers

- This recommendation should maintain or improve access to care for low-income beneficiaries while not affecting access for other beneficiaries. Clinicians who furnish care for low-income beneficiaries would receive additional payments, thus providing them with an incentive to maintain or improve access for low-income beneficiaries.



# Medicare beneficiaries' access to care was equal to, or better than, that of privately insured people in the Commission's 2022 survey 

|  | Medicare beneficiaries (ages 65 and older) |  |  |  |  | Privately insured (ages 50-64) |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Survey question | 2018 | 2019 | 2020 | 2021 | 2022 | 2018 | 2019 | 2020 | 2021 | 2022 |

Unwanted delay in getting an appointment: Among those who needed an appointment in the past 12 months, "How often did you have to wait longer than you wanted to get a doctor's appointment?"

| For routine care |  |  |  |  |  |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Never | 70\% ${ }^{\text {a }}$ | $72 \%{ }^{\text {b }}$ | 69\% ${ }^{\text {a }}$ | 67\% ${ }^{\text {a }}$ | 55\% ${ }^{\text {a }}$ | 64\% ${ }^{\text {ab }}$ | 74\% ${ }^{\text {b }}$ | 73\% ${ }^{\text {ab }}$ | 78\% ${ }^{\text {a }}$ | 40\% ${ }^{\text {a }}$ |
| Sometimes | $20^{\text {ab }}$ | $20^{\text {b }}$ | $22^{\text {a }}$ | $23^{\text {a }}$ | $32^{\text {a }}$ | $26^{\text {ab }}$ | 19 | $20^{\text {ab }}$ | $17^{\text {a }}$ | $40^{\text {a }}$ |
| Usually | 5 | $3^{\text {b }}$ | $3^{\text {b }}$ | $5^{\text {a }}$ | $8^{\text {a }}$ | $5^{\text {b }}$ | $4^{\text {b }}$ | $4^{\text {b }}$ | $3^{\text {a }}$ | $12^{\text {a }}$ |
| Always | $3{ }^{\text {a }}$ | 3 | 3 | $3{ }^{\text {a }}$ | $4^{\text {a }}$ | $4^{\text {ab }}$ | $3{ }^{\text {b }}$ | $3{ }^{\text {b }}$ | $2^{\text {a }}$ | $8^{\text {a }}$ |
| For illness or injury |  |  |  |  |  |  |  |  |  |  |
| Never | $79^{\text {a }}$ | 80 | 79 | $78^{\text {a }}$ | $67^{\text {a }}$ | $74^{\text {ab }}$ | 81 | $80^{\text {b }}$ | $83^{\text {a }}$ | $58^{\text {a }}$ |
| Sometimes | $15^{\text {a }}$ | 14 | 15 | $16^{\text {a }}$ | 26 | $19^{\text {ab }}$ | 15 | 15 | $13^{\text {a }}$ | 29 |
| Usually | 2 | 2 | 2 | 2 | $4^{\text {a }}$ | $3{ }^{\text {b }}$ | 2 | 3 | 2 | $8^{\text {a }}$ |
| Always | 2 | 2 | 2 | 2 | $3^{\text {a }}$ | 2 | 1 | 2 | 1 | $5^{\text {a }}$ |

Not accessing a doctor for medical problems: "During the past 12 months, did you have any health problem or condition about which you think you should have seen a doctor or other medical person, but did not?"

| Share answering "Yes" | $11^{a}$ | 9 | 10 | 10 | $18^{a}$ | $14^{\mathrm{ab}}$ | 10 | $11^{\mathrm{b}}$ | 9 | $24^{\mathrm{a}}$ |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |

Looking for a new provider: "In the past 12 months, have you tried to get a new...?" (Share answering "Yes")

| Primary care provider | $10^{\text {b }}$ | 8 | 8 | 8 | $11^{\text {a }}$ | $10^{\text {b }}$ | $9{ }^{\text {b }}$ | 7 | 6 | $14^{\text {a }}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Specialist | $19^{\text {ab }}$ | $17^{\text {b }}$ | 15 | $14^{a}$ | 26 | $21^{\text {ab }}$ | $15^{\text {b }}$ | $13^{\text {b }}$ | $11^{\text {a }}$ | 29 |

Problems getting a new provider: Among those who tried to get an appointment with a new primary care provider or specialist in the past 12 months, "How much of a problem was it finding a primary care provider/specialist who would treat you? Was it..."

Primary care provider

| No problem Share of total insurance group | $\begin{gathered} 71^{b} \\ 7^{b} \end{gathered}$ | $72^{\mathrm{ab}}$ | $\begin{array}{r} 60 \\ 5 \end{array}$ | 57 4 | $\begin{array}{r} 46 \\ 5 \end{array}$ | $\begin{gathered} 67 \\ 7^{b} \end{gathered}$ | $62^{a}$ | $57$ | $\begin{array}{r} 59 \\ 4 \end{array}$ | $\begin{array}{r} 38 \\ 5 \end{array}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Small problem | $13^{\text {b }}$ | $13^{\text {ab }}$ | $16^{\text {a }}$ | 23 | 32 | $16^{\text {b }}$ | $20^{\text {a }}$ | $24^{\text {a }}$ | 25 | 33 |
| Share of total insurance group | 7 | $7^{a b}$ | 7 | 2 | 4 | 2 | $2^{a}$ | 2 | 2 | 5 |
| Big problem | 14 | 14 | 22 | 18 | 22 | 16 | 17 | 18 | 15 | 29 |
| Share of total insurance group | 1 | 1 | 2 | 7 | $2^{a}$ | $2^{\text {b }}$ | 2 | 7 | 7 | $4^{a}$ |
| Specialist |  |  |  |  |  |  |  |  |  |  |
| No problem | $84^{\text {b }}$ | $85^{\text {ab }}$ | $79^{\text {b }}$ | 73 | $68^{\text {a }}$ | 80 | $79^{\text {a }}$ | 77 | 76 | $59^{\text {a }}$ |
| Share of total insurance group | $16^{\text {b }}$ | $14^{\text {ab }}$ | 12 | $10^{\text {a }}$ | 18 | $17^{6}$ | $12^{a b}$ | $10^{6}$ | $8^{a}$ | 17 |
| Small problem | $7^{\text {b }}$ | $6^{\text {ab }}$ | $9{ }^{\text {b }}$ | 16 | 22 | $9^{\text {b }}$ | 17 ab | $11^{\text {b }}$ | 17 | 26 |
| Share of total insurance group | $7{ }^{\text {b }}$ | $7{ }^{\text {b }}$ | $7{ }^{\text {b }}$ | 2 | 6 | 2 | 2 | 1 | 2 | 7 |
| Big problem | 8 | 8 | 11 | 11 | $10^{\text {a }}$ | 10 | 9 | 11 | 8 | $15^{\text {a }}$ |
| Share of total insurance group | 1 | 1 | 2 | $2^{a}$ | $3^{a}$ | $2^{\text {b }}$ | $7{ }^{\text {b }}$ | $2^{6}$ | $7^{a}$ | $4^{a}$ |

[^7][^8]
# Few differences between urban and rural Medicare beneficiaries are statistically significant in the Commission's 2022 survey 

|  | Medicare beneficiaries <br> (ages $\mathbf{6 5}$ and older) | Privately insured <br> (ages $\mathbf{5 0 - 6 4 )}$ |  |  |
| :--- | :---: | :---: | :---: | :---: |
| Survey question | Urban | Rural | Urban | Rural |
| Unwanted delay in getting an appointment: Among those who needed an appointment in the past 12 months, "How |  |  |  |  |
| often did you have to wait longer than you wanted to get a doctor's appointment?" |  |  |  |  |

Not accessing a doctor for medical problems: "During the past 12 months, did you have any health problem or condition about which you think you should have seen a doctor or other medical person, but did not?"
Share answering "Yes" $18^{\text {a }} \quad 21 \quad 24$

Looking for a new provider: "In the past 12 months, have you tried to get a new...?" (Share answering "Yes")

| Primary care provider | 11 | 12 | 14 | 12 |
| :--- | :---: | :---: | :---: | :---: |
| Specialist | $28^{\mathrm{b}}$ | $20^{\mathrm{b}}$ | $30^{\mathrm{b}}$ | $27^{\mathrm{b}}$ |

Problems getting a new provider: Among those who tried to get an appointment with a new primary care provider or specialist in the past 12 months, "How much of a problem was it finding a primary care provider/specialist who would treat you? Was it..."

| Primary care provider |  |  |  |  |
| :--- | ---: | ---: | ---: | ---: |
| No problem | 49 | 35 | 37 | 44 |
| Share of total geographic group with this insurance | 6 | 4 | 5 | 5 |
| Small problem | 32 | 33 | 34 | 29 |
| Share of total geographic group with this insurance | 4 | 4 | 5 | 4 |
| Big problem | 19 | 32 | 29 | 27 |
| Share of total geographic group with this insurance | $2^{a}$ | 4 | $49^{a}$ | 3 |
| Specialist |  |  | $59^{a}$ | 56 |
| No problem | $70^{a}$ | 59 | $18^{b}$ | $12^{b}$ |
| Share of total geographic group with this insurance | $20^{b}$ | $12^{b}$ | 25 | 32 |
| Small problem | 21 | 26 | 8 | 7 |
| Share of total geographic group with this insurance | 6 | 5 | 14 | $5^{a}$ |
| Big problem | $9^{a}$ | 3 | $5^{a}$ | 2 |

[^9][^10]
# Few differences between White, Black, and Hispanic Medicare beneficiaries are statistically significant in the Commission's 2022 survey 

|  | Medicare beneficiaries <br> (ages 65 and older) | Privately insured <br> (ages $50-64)$ |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Survey question | White | Black | Hispanic | White | Black | Hispanic |

Unwanted delay in getting an appointment: Among those who needed an appointment in the past 12 months, "How often did you have to wait longer than you wanted to get a doctor's appointment?"

| For routine care |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: |
| Never | $56 \%^{a}$ | $57 \%$ | $54 \%^{a}$ | $39 \%^{a}$ | $48 \%$ | $37 \%^{a}$ |
| Sometimes | $32^{a}$ | 33 | 31 | $39^{a}$ | 42 | 43 |
| Usually | $8^{a}$ | 6 | 8 | $13^{a b}$ | 6 | $8^{b}$ |
| Always | $3^{a}$ | 4 | 7 | $9^{a b}$ | 4 | $12^{b}$ |
| For illness or injury |  |  |  |  |  |  |
| Never | $68^{a}$ | 73 | 63 | $58^{a}$ | 64 | 57 |
| Sometimes | 26 | 21 | 27 | 29 | 29 | 28 |
| Usually | $4^{a}$ | 4 | 7 | $8^{a}$ | 5 | 9 |
| Always | $2^{a}$ | 2 | 3 | $5^{a}$ | 2 | 5 |

Not accessing a doctor for medical problems: "During the past 12 months, did you have any health problem or condition about which you think you should have seen a doctor or other medical person, but did not?"

| Share answering "Yes" | $18^{a}$ | 16 | 18 | $24^{a}$ | 21 | 26 |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- |

Looking for a new provider: "In the past 12 months, have you tried to get a new...?" (Share answering "Yes")

| Primary care provider | 12 | 9 | 12 | 14 | 9 | 16 |
| :--- | ---: | ---: | ---: | ---: | ---: | ---: |
| Specialist | 27 | 19 | 25 | 29 | 26 | 27 |

Problems getting a new provider: Among those who tried to get an appointment with a new primary care provider or specialist in the past 12 months, "How much of a problem was it finding a primary care provider/specialist who would treat you? Was it...."

Primary care provider

| No problem | 48 | 58 | 27 | 38 | 57 | 30 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Share of total racial group with this insurance | 5 | 5 | 3 | 5 | 5 | 5 |
| Small problem | 27 | 37 | 54 | 33 | 15 | 28 |
| Share of total racial group with this insurance | 3 | 3 | 6 | 5 | 7 | 5 |
| Big problem | 25 | 5 | 19 | 28 | 27 | 42 |
| Share of total racial group with this insurance | 3 | 0 | 2 | 4 | 2 | 7 |
| Specialist |  |  |  |  |  |  |
| No problem | $69^{\text {a }}$ | 74 | 57 | $59^{\text {a }}$ | 70 | 59 |
| Share of total racial group with this insurance | 19 | 14 | 14 | 17 | 18 | 15 |
| Small problem | 21 | 18 | 28 | 26 | 22 | 24 |
| Share of total racial group with this insurance | 6 | 4 | 7 | 8 | 6 | 6 |
| Big problem | 10 | 8 | 15 | 14 | 8 | 17 |
| Share of total racial group with this insurance | $3^{a}$ | 2 | 4 | $4^{a}$ | 2 | 4 |

[^11]Source: MedPAC-sponsored access-to-care survey conducted in August 2022.

## Endnotes

1 Although most clinician services are paid under the physician fee schedule, some are paid under the payment systems for federally qualified health centers and rural health clinics.

2 For further information, see the Commission's Payment Basics: Physician and Other Health Professional Payment System at https://www.medpac.gov/wp-content/ uploads/2021/11/MedPAC_Payment_Basics_22_Physician_ FINAL_SEC.pdf.

3 A-APM bonuses and MIPS adjustments are based on clinicians' participation or performance two years prior.

4 Examples of A-APMs include accountable care organization models that require providers to take on some financial risk.

5 Whenever the payment rate for a particular billing code in the physician fee schedule is changed or services are added or dropped through administrative action, the changes are required by law to be budget neutral. Budget neutrality is typically achieved by increasing or decreasing the fee schedule's conversion factor.

6 Sequestration applies only to Medicare program payments and does not affect the conversion factor or reduce the size of payments clinicians collect through beneficiaries' cost sharing.

7 The Commission's beneficiary survey and focus groups include all Medicare beneficiaries, including those in Medicare Advantage (MA) plans. We also report MCBS findings for all Medicare beneficiaries, including those in MA plans. We believe this is a reasonable proxy for the experiences of FFS beneficiaries, because in separate analyses of MCBS data (not shown), we find that MA enrollees and FFS beneficiaries with both Part A and Part B report comparable access to care.

8 Our analysis of the experiences of various subgroups of Medicare beneficiaries (who varied based on their sex, age, race/ethnicity, income, education, urban vs. rural residence, and type of Medicare insurance) found that non-elderly beneficiaries-most of whom are disabled-reported trouble accessing care at notably higher rates (see Chapter 1) than other subgroups of beneficiaries.

9 We continue to survey 4,000 Medicare beneficiaries ages 65 and over and 4,000 privately insured people ages 50 to 64 each year, but in 2022 we changed survey firms, adopted a new sampling approach, switched from a telephone survey to a web- and mail-based survey, and started using a different
weighting approach. Research has found that intervieweradministered surveys (which we previously used) tend to yield more extreme, positive responses to attitudinal questions and more socially desirable responses, compared with self-administered surveys (which we are now using) (de Leeuw 2005, Dillman et al. 1996). For this reason, our 2022 survey results may best be thought of as a reset rather than a continuation of our prior time trend and may reflect more candid, nuanced views from survey respondents.

10 We annually conduct focus groups with beneficiaries and clinicians and interviews with providers in different parts of the country to provide more qualitative descriptions of beneficiary and clinician experiences with the Medicare program. During these discussions, we hear from beneficiaries and providers about variation in experiences accessing care. In the summer of 2022, we conducted three focus groups with Medicare beneficiaries in each of three different urban markets. Two of the groups in each market were composed of beneficiaries dually eligible for Medicare and Medicaid. New for this year, we also conducted one focus group in each market with privately insured individuals ages 55 to 64 years old. We also conducted three virtual focus groups with beneficiaries residing in rural areas. In addition, we conducted three focus groups with clinicians in each of the three urban markets: primary care physicians, specialist physicians, and primary care nurse practitioners and physician assistants. In some of the markets, we also interviewed several hospital and clinician groups.

11 This appears to have been driven by the age of survey respondents: comparable shares of privately insured people ages 50 to 64 and Medicare beneficiaries ages 65 to 74 reported seeing an NP or PA for most or all of their primary care, but lower shares of Medicare beneficiaries ages 75 and over reported getting most or all of their primary care from an NP or PA.

12 Specifically, 27 percent of rural Medicare beneficiaries reported receiving most or all of their primary care from an NP or PA, compared with 14 percent of urban beneficiaries; a similar trend was observed among the privately insured. In addition, 24 percent of beneficiaries with annual household incomes below $\$ 25,000$ reported receiving most or all of their care from an NP or PA, compared with 16 percent of beneficiaries with household incomes between $\$ 25,000$ and $\$ 49,999$ and 14 percent of beneficiaries with household incomes of $\$ 50,000$ or more; again, a similar trend was observed among the privately insured.

13 Higher-income Medicare beneficiaries were more likely than lower-income beneficiaries to report unwanted waits for routine care and were more likely to take the appointment date offered to them rather than cancel the appointment or seek care from a hospital emergency department.

14 For example, among beneficiaries needing an appointment for an illness or injury, 26 percent said they "sometimes" had to wait longer than they wanted, while only 4 percent said they "usually" had to wait longer than they wanted and only 3 percent said they "always" had to wait longer than they wanted.

15 A substantial number of clinicians billed for 15 or fewer beneficiaries in a given year, but they accounted for a small share of services and allowed charges. For example, in 2019, about 17 percent of clinicians who billed the fee schedule billed for 15 or fewer beneficiaries, but these clinicians billed for less than 1 percent of total allowed charges. Further, we note that this threshold does not account for whether clinicians are practicing on a full- or part-time basis.

16 We used the number of total Part B beneficiaries, including those in FFS Medicare and Medicare Advantage, to calculate the ratio of physicians and other health professionals per 1,000 beneficiaries because we assume that clinicians generally furnish services to beneficiaries covered under both programs.

17 APRNs include clinical nurse specialists, nurse practitioners, certified registered nurse anesthetists, and certified nurse midwives.

18 We defined a clinician who exits Medicare as one who did not bill the physician fee schedule for any beneficiaries in a year but who billed for more than 15 beneficiaries in the previous year. We defined a clinician who enters Medicare as one who billed the fee schedule for more than 15 beneficiaries in a year but did not bill the fee schedule for any beneficiaries in the previous year. We also use a threshold of 15 beneficiaries for our analysis of changes in the number of clinicians billing Medicare. We tested alternative definitions but they did not substantially change the number of exiting or entering clinicians.

19 The average number of beneficiaries billed for by all clinicians includes entering clinicians, exiting clinicians, and those who billed the physician fee schedule in 2018 and continued to do so in 2020.

20 In the Commission's 2022 survey, among the subset of Medicare beneficiaries who looked for a new primary care provider and had a problem finding one, 17 percent encountered a primary care provider's office that did
not accept Medicare (equivalent to 1 percent of Medicare beneficiaries overall). Among beneficiaries who looked for a new specialist and had a problem finding one, 15 percent encountered a specialist's office that did not accept Medicare (equivalent to 1 percent of Medicare beneficiaries).

21 The behavioral health clinicians referenced here are psychiatrists, clinical psychologists, and clinical social workers.

22 The oral health professionals referenced here are dentists, oral surgeons, and maxillofacial surgeons.

23 The primary care specialties referenced here are family medicine, internal medicine, and pediatric medicine.

24 Specifically, we define "encounters" as unique combinations of beneficiary identification numbers, claim identification numbers (for paid claims), and national provider identifiers (NPIs) of the clinicians who billed for the service.

25 This number is based on our count of beneficiaries who had at least one encounter recorded in claims data and the total number of FFS Medicare beneficiaries enrolled in Part B from the 2022 Medicare Trustees report.

26 Primary care physicians billed for very few services classified as "major procedures" or "anesthesia," so these categories of services were excluded from this analysis.

27 Under "incident to" billing, Medicare allows APRNs and PAs to bill under the NPI of a supervising physician if certain conditions are met.

28 CAHPS ${ }^{\circledR}$ is a registered trademark of the Agency for Healthcare Research and Quality.

29 The roughly 3,400 Dartmouth-defined HSAs are a collection of ZIP codes whose residents receive most of their hospitalizations from that area's hospitals.

30 For this analysis, we grouped individual billing codes into broad service categories that are clinically meaningful (e.g., E\&M, major procedures). MedPAC has changed the way we group individual services into aggregated service categories. Previously, we grouped clinically similar services into service categories using a taxonomy developed in conjunction with the Urban Institute. We are now using a new grouping taxonomy developed by CMS called the Restructured BETOS Classification System (RBCS). More information about RBCS is available here: https://data.cms.gov/provider-summary-by-type-of-service/provider-service-classifications/ restructured-betos-classification-system.

31 The private insurer's payments reflect the insurer's allowed amount (including allowed cost sharing). The data exclude any remaining balance billing and payments made outside of the claims process, such as bonuses or risk-sharing payments. Only services paid under Medicare's physician fee schedule were included, and anesthesia services were excluded.

32 To control for annual changes in survey respondents, we based the percentage change on a cohort analysis in which the sample was restricted to physicians who were present in both the 2017 and 2021 data.

33 The nonsurgical, procedural specialties in the analysis are cardiology, dermatology, gastroenterology, pulmonary medicine, and hematology/oncology.

34 The primary care specialties in the analysis are family medicine, internal medicine, and general pediatrics.

35 In addition to psychiatry, the nonsurgical, nonprocedural group includes emergency medicine, endocrinology, hospital medicine, nephrology, neurology, physical medicine, rheumatology, and other internal medicine/pediatrics.

36 Ambulatory E\&M services include office visits, hospital outpatient department visits, visits to patients in certain other settings such as nursing facilities, and home visits.

37 CMS uses price proxies (such as the consumer price index and employment cost index) to calculate annual changes in the MEI.

38 MEI projections in this chapter are as of the third quarter of 2022 and are subject to change.

39 In this section, we count clinicians using unique national provider identifiers (NPIs).

40 To determine physician specialty, we use the specialty designation that appears on a plurality of each NPI's claims. We classified physicians whose specialties are internal
medicine, family medicine, geriatric medicine, or pediatric medicine (with an adjustment to exclude clinicians that are serving as hospitalists) as "primary care physicians." Claims data do not indicate the specialty in which nurse practitioners or physician assistants practice. Therefore, we developed an algorithm to sort these clinicians into primary care or specialty care categories based on (1) the location and types of services they billed, (2) the specialties of the physicians with whom they practiced, and (3) the types of conditions they treated.

41 While more than 20 percent of FFS LIS beneficiaries live in rural areas, only 10 percent of LIS beneficiaries' allowed charges were billed by clinicians practicing in rural areas in 2019. This suggests that many rural beneficiaries travel to urban areas to receive care.

42 States may impose limited cost-sharing requirements for beneficiaries eligible for full Medicaid benefits. However, those cost-sharing amounts are nominal.

43 The limit on payment rates among independent RHCs (i.e., those not owned by a provider) is scheduled to increase from $\$ 113$ in 2022 to $\$ 190$ by 2028.

44 As mandated by the Consolidated Appropriations Act, 2021, payment rates for RHCs will increase sharply from 2024 through 2028; by 2028, Medicare's rate for an office visit at an RHC will be about twice the rate paid under the physician fee schedule.

45 From 2011 through 2016, CMS provided incentive payments to primary care clinicians through the Primary Care Incentive Payment (PCIP) program. Under the PCIP program, primary care clinicians were defined as practitioners with a specialty designation of family medicine, geriatric medicine, pediatric medicine, internal medicine, nurse practitioner, clinical nurse specialist, or physician assistant where at least 60 percent of the practitioner's allowed charges paid under the fee schedule were for certain primary care services.

## References

Boards of Trustees, Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. 2022. 2022 annual report of the Boards of Trustees of the Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. Washington, DC: Boards of Trustees.

Capps, C., D. Dranove, and C. Ody. 2018. The effect of hospital acquisitions of physician practices on prices and spending. Journal of Health Economics 59 (May): 139-152.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022a. Accounting for federal COVID expenditures in the National Health Expenditure Accounts. Baltimore, MD: CMS. https://www.cms.gov/files/document/ accounting-federal-covid-expenditures-national-health-expenditure-accounts.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022b. Medicare and Medicaid Programs; CY 2023 payment policies under the physician fee schedule and other changes to Part B payment and coverage policies; Medicare Shared Savings Program requirements; Medicare and Medicaid provider enrollment policies, including for skilled nursing facilities; conditions of payment for suppliers of durable medical equipment, prosthetics, orthotics, and supplies (DMEPOS); implementing requirements for manufacturers of certain singledose container or single-use package drugs to provide refunds with respect to discarded amounts; opioid treatment programs: CY 2022 methadone payment exception; and COVID-19 interim final rules. Final rule. Federal Register 87, no. 222 (November 18): 69404-70700.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022c. Opt out affidavits. https://data. cms.gov/provider-characteristics/medicare-provider-supplier-enrollment/opt-out-affidavits/data.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022d. Quality Payment Program participation in 2020: Results at-a-glance. Baltimore, MD: CMS. https://qpp-cm-prod-content.s3.amazonaws.com/ uploads/1783/QPP\%202020\%20Participation\%20Results\%20 Infographic.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2020. Medicare program; CY 2021 payment policies under the physician fee schedule and other changes to Part B payment policies; Medicare Shared Savings Program requirements; Medicaid Promoting Interoperability Program requirements for eligible professionals; Quality Payment Program; coverage of opioid use disorder services furnished
by opioid treatment programs; Medicare enrollment of opioid treatment programs; electronic prescribing for controlled substances for a covered Part D drug; payment for office/ outpatient evaluation and management services; Hospital IQR Program; establish new code categories; Medicare Diabetes Prevention Program (MDPP) Expanded Model emergency policy; coding and payment for virtual check-in services interim final rule policy; coding and payment for personal protective equipment (PPE) interim final rule policy; regulatory revisions in response to the public health emergency (PHE) for COVID-19; and finalization of certain provisions from the March 31st, May 8th and September 2nd interim final rules in response to the PHE for COVID-19. Final rule and interim final rule. Federal Register 85, no. 248 (December 28): 84472-85377.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2019. Medicare program; CY 2020 revisions to payment policies under the physician fee schedule and other changes to Part B payment policies; Medicare Shared Savings Program requirements; Medicaid Promoting Interoperability Program requirements for eligible professionals; establishment of an ambulance data collection system; updates to the Quality Payment Program; Medicare enrollment of opioid treatment programs and enhancements to provider enrollment regulations concerning improper prescribing and patient harm; and amendments to physician self-referral law advisory opinion regulations final rule; and coding and payment for evaluation and management, observation and provision of self-administered Esketamine. Final rule. Federal Register 84, no. 221 (November 15): 62568-63563.

Clemens, J., and J. Gottlieb. 2017. In the shadow of a giant: Medicare's influence on private physician payments. Journal of Political Economy 125, no. 1 (February): 1-39.

Congressional Budget Office. 2018. An analysis of privatesector prices for physicians' services. Working paper 2018-01. Washington, DC: CBO.

Cunningham, P. J., T. L. Green, and R. T. Braun. 2018. Income disparities in the prevalence, severity, and costs of co-occurring chronic and behavioral health conditions. Medical Care 56, no. 2 (February): 139-145.

Dai, M., R. C. Ingham, and L. E. Peterson. 2019. Scope of practice and patient panel size of family physicians who work with nurse practitioners or physician assistants. Family Medicine 51, no. 4 (April): 311-318.
de Leeuw, E. 2005. To mix or not to mix data collection modes in surveys. Journal of Official Statistics 21, no. 2: 233-255.

Dillman, D., R. Sangster, J. Tarnai, et al. 1996. Understanding differences in people's answers to telephone and mail surveys. Advances in Survey Research 1996, no. 70: 45-62.

Frogner, B. K. 2022. Supporting the health workforce: State and federal policy levers. Presentation at Virtual 29th Princeton Conference: Addressing the health care workforce crisis, October 19. https://heller.brandeis.edu/council/pdfs/2022/frogner_ slides_final.pdf.

Furukawa, M. F., L. Kimmey, D. J. Jones, et al. 2020. Consolidation of providers into health systems increased substantially, 2016-18. Health Affairs 39, no. 8 (August): 1321-1325.

Ganguli, I., T. H. Lee, and A. Mehrotra. 2019. Evidence and implications behind a national decline in primary care visits. Journal of General Internal Medicine 34, no. 10 (October): 22602263.

Hartman, M., A. B. Martin, B. Washington, et al. 2022. National health care spending in 2020: Growth driven by federal spending in response to the COVID-19 pandemic. Health Affairs 41, no. 1 (January): 13-25.

Hayford, T. B., X. Niu, and S. Decker. 2023. "Lesser-of" payment policies and the use of physicians' services among dual-eligible beneficiaries. Working Paper 2023-01. Washington, DC: Congressional Budget Office.

Jacobs, P. D. 2021. The impact of Medicare on access to and affordability of health care. Health Affairs 40, no. 2 (February): 266-273.

Kabir, S., L. Farrokhvar, M. W. Russell, et al. 2022. Regional socioeconomic factors and length of hospital stay: A case study in Appalachia. Journal of Public Health 30 (January 6): 1513-1522.

Martin, A., M. Hartman, J. Benson, et al. 2023. National health care spending in 2021: Decline in federal spending outweighs greater use of health care. Health Affairs 42, no. 1.

Medicaid and CHIP Payment and Access Commission. 2015. Effects of Medicaid coverage of Medicare cost sharing on access to care. Washington, DC: MACPAC.

Medical Group Management Association. 2022. Data report: 2022 MGMA DataDive provider compensation-Realizing recovery. Washington, DC: MGMA. https://www.mgma.com/data/ landing-pages/2022-mgma-data-dive-provider-comp-report.

Medicare Payment Advisory Commission. 2022a. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2022b. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2020. Comment letter to CMS on the proposed rule on the physician fee schedule and other changes to Part B payment policies, October 2. https:// www.medpac.gov/wp-content/uploads/import_data/scrape_ files/docs/default-source/comment-letters/10022020_partb_ proposedrule2021_medpac_cms1734_comment_v2_sec.pdf.

Medicare Payment Advisory Commission. 2019. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2018a. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2018b. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2017. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2011. Moving forward from the sustainable growth rate (SGR) system. Letter to the Congress, October 14.

Myrick, K. L., and S. M. Schappert, Department of Health and Human Services. 2022. Percentage of office-based physicians accepting new Medicare, Medicaid or privately insured patients in the United States: National Ambulatory Medical Care Survey, 2020. Hyattsville, MD: National Center for Health Statistics.

National Center for Health Statistics. 2021. Health, United States, 2019. Hyattsville, MD: NCHS. https://www.cdc.gov/nchs/data/ hus/hus19-508.pdf.

Neprash, H. T., M. E. Chernew, A. L. Hicks, et al. 2015. Association of financial integration between physicians and hospitals with commercial health care prices. JAMA Internal Medicine 175, no. 12 (December): 1932-1939.

Ochieng, N., J. Fuglesten Biniek, M. Rae, et al. 2022. Most officebased physicians accept new patients, including patients with Medicare and private insurance. Washington, DC: Kaiser Family Foundation. https://www.kff.org/medicare/issue-brief/ most-office-based-physicians-accept-new-patients-including-patients-with-medicare-and-private-insurance/.

Raffoul, M., M. Moore, D. Kamerow, et al. 2016. A primary care panel size of 2500 is neither accurate nor reasonable. Journal of the American Board of Family Medicine 29, no. 4 (July-August): 496-499.

Roberts, E. T., A. Glynn, N. Cornelio, et al. 2021. Medicaid coverage 'cliff' increases expenses and decreases care for nearpoor Medicare beneficiaries. Health Affairs 40, no. 4 (April): 552-561.

Roberts, E. T., A. Nimgaonkar, J. Aarons, et al. 2020. New evidence of state variation in Medicaid payment policies for dual Medicare-Medicaid enrollees. Health Services Research 55, no. 5 (October): 701-709.

Whaley, C. M., D. R. Arnold, N. Gross, et al. 2021. Physician compensation in physician-owned and hospital-owned practices. Health Affairs 40, no. 12 (December): 1865-1874.

Wray, C. M., M. Khare, and S. Keyhani. 2021. Access to care, cost of care, and satisfaction with care among adults with private and public health insurance in the U.S. JAMA Network Open 4, no. 6 (June 1): e2110275.

Zuckerman, S., L. Skopec, and J. Aarons. 2021. Medicaid physician fees remained substantially below fees paid by Medicare in 2019. Health Affairs 40, no. 2 (February): 343-348.

# Ambulatory surgical center services: Status report 

## R E C O M M E N D A T I O N

5 The Commission reiterates its March 2022 recommendation that the Secretary require ambulatory surgical centers to report cost data.

# CHAPTER 

## Ambulatory surgical center services: Status report

## Chapter summary

Ambulatory surgical centers (ASCs) provide outpatient procedures to patients who do not require an overnight stay. In 2021, the 6,075 ASCs certified by Medicare treated 3.3 million fee-for-service (FFS) Medicare beneficiaries. Medicare program and beneficiary spending on ASC services was about $\$ 5.7$ billion. The number of ASC facilities continued to increase, growing 2.7 percent in 2021. After dropping substantially in 2020, the volume of ASC surgical procedures per FFS beneficiary rose in 2021 to above prepandemic levels. Numerous factors likely have contributed to this sector's growth, including changes in clinical practice and health care technology that have expanded the provision of surgical procedures in ambulatory settings. For patients, ASCs can offer more convenient locations, shorter waiting times, lower cost sharing, and easier scheduling relative to hospital outpatient departments. ASCs also offer physicians specialized staff and more control over their work environment.

The vast majority of ASCs are for profit and located in urban areas. The concentration of ASCs varies widely across states, ranging from 38 ASCs per 100,000 Part B beneficiaries in Maryland to 4 or fewer ASCs per 100,000 Part B beneficiaries in Alabama, West Virginia, and Vermont. About 65 percent of ASCs that billed Medicare in 2021 specialized in a single clinical area, of which gastroenterology and ophthalmology were

## In this chapter

- Supply of ASCs and volume of services continued to grow in 2021
- The ASC Quality Reporting Program does not have enough measures for meaningful analysis
- Aggregate Medicare payments rose substantially in 2021 and were well above the prepandemic level
- Ambulatory surgical centers should submit cost data
the most common. The remainder were multispecialty facilities, providing services in more than one clinical specialty (often pain management and orthopedic services or gastroenterology and ophthalmology). From 2016 to 2021, the ASC specialty that grew most rapidly was pain management.

The most common service in ASCs, accounting for almost 19 percent of volume in 2021, was extracapsular cataract removal with intraocular lens insertion. The 20 most frequently provided services made up about 68 percent of FFS Medicare volume in 2021. A potential concern is the extent to which certain frequently provided services, such as spinal injections and other pain management services, are unnecessary or of low value.

Medicare spending per FFS beneficiary on ASC services rose at an average annual rate of 7.7 percent from 2016 through 2019 and at an average annual rate of 8.7 percent from 2019 to 2021. However, policymakers know little about the costs ASCs incur in treating beneficiaries because Medicare does not require ASCs to submit cost data, unlike its cost data requirements for other types of facilities. The Commission contends that ASCs could feasibly provide such information, and we have recommended since 2010 that the Congress require them to submit cost data. Until these data are available, the Commission cannot properly assess the adequacy of Medicare's payments to ASCs.

## Background

An ambulatory surgical center (ASC) is a distinct entity that primarily provides outpatient surgical procedures to patients who do not require an overnight stay. In addition to ASCs, providers perform outpatient surgical procedures in hospital outpatient departments (HOPDs) and, in some cases, physicians' offices.

For procedures performed in an ASC, Medicare makes two payments: one to the facility through the ASC payment system and the other to the physician for their professional services through the payment system for physicians and other health professionals, known as the physician fee schedule (PFS). According to surveys, most ASCs have partial or complete physician ownership (Ambulatory Surgery Center Association 2021, Ambulatory Surgery Center Association 2017, Leapfrog 2019). Physician owners of ASCs receive additional income through distributions of facility profits according to their ownership interest.

Medicare pays ASCs for a bundle of facility services and items-such as nursing, recovery care, anesthetics, and supplies-through a system that is linked primarily to the outpatient prospective payment system (OPPS), which Medicare uses to set payment rates for most services provided in HOPDs. The ASC payment system is also partly linked to the PFS.

For most covered procedures, payment rates in the ASC payment system are the product of a relative weight and a conversion factor. The ASC relative weight for a procedure, which indicates the procedure's resource intensity relative to other procedures, is based on its relative weight under the OPPS. The conversion factor transforms the relative weight for a service into a payment rate. For 2023, CMS has set the ASC conversion factor at $\$ 51.85$. From 2010 through 2018, CMS updated the ASC conversion factor each year based on the consumer price index for all urban consumers. In a change of regulatory policy beginning in 2019, CMS has updated the ASC conversion factor using the hospital market basket index. Under this change, the annual updates to the ASC conversion factor have aligned with the updates to the OPPS conversion factor. ${ }^{1}$

## Supply of ASCs and volume of services continued to grow in 2021

The number of ASC facilities increased in 2021, as did the volume of services provided to Medicare beneficiaries in ASCs. Access to ASCs may be beneficial to patients and physicians compared with HOPDs, the provider type most similar to ASCs. For patients, ASCs can offer more convenient locations, shorter waiting times, lower cost sharing, and easier scheduling relative to HOPDs. ASCs offer physicians specialized staff and more control over their work environment. However, these same qualities could lead to overuse of some surgical procedures.

## The number of ASCs increased

From 2020 to 2021, the number of ASCs increased 2.7 percent to 6,075 ASCs (Table 5-1, p. 158). This annual growth rate exceeded the rate from 2016 to 2020, when the number of ASCs increased, on average, 1.9 percent per year. In 2021, 254 new ASCs opened while 95 ASCs closed or merged with other facilities, for a net increase of 159 facilities.

Because the central purpose of ASCs is to provide surgical procedures, the number of operating rooms (ORs) is an indicator of the supply in this sector. In 2021, there were 18,689 ORs in ASCs, or an average of 3.1 per facility. From 2016 to 2020, the total number of ASC ORs increased 1.7 percent per year, a lower rate than the increase in the number of ASCs over the same period ( 1.9 percent per year). From 2020 to 2021, the number of ORs in ASCs increased by 2.9 percent, a higher rate than the growth in the number of ASCs.

Numerous factors have likely influenced this long-term growth in the number of ASCs and ORs:

- Changes in clinical practice and health care technology have expanded the provision of surgical procedures in ambulatory settings. This trend could continue as momentum grows for performing knee and hip arthroplasty (knee and hip replacement) in ambulatory settings. ${ }^{2}$
- ASCs can offer patients greater convenience than HOPDs, such as shorter waiting times for surgery (patients can face delays for surgery in HOPDs because emergencies often take precedence over scheduled procedures).

|  | 2016 | 2020 | 2021 | Average annual change |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  |  |  | 2016-2020 | 2020-2021 |
| Total number of ASCs | 5,489 | 5,916 | 6,075 | 1.9\% | 2.7\% |
| New | 172 | 184 | 254 | N/A | N/A |
| Closed or merged | 117 | 73 | 95 | N/A | N/A |
| Total number of ORs | 16,982 | 18,156 | 18,689 | 1.7 | 2.9 |
| New | 443 | 505 | 755 | N/A | N/A |
| Closed or merged | 329 | 199 | 222 | N/A | N/A |

Note: ASC (ambulatory surgical center), N/A (not applicable), OR (operating room). We display the average annual percentage change for the "new" and "closed or merged" categories as "N/A" because they are outside the purpose of this table, which is to show the growth in the number of ASCs and ORs.

Source: MedPAC analysis of Provider of Services, 2022.

- For most procedures covered under the ASC payment system, beneficiaries' coinsurance is lower in ASCs than in HOPDs. ${ }^{3}$
- Physicians have greater autonomy in ASCs than in HOPDs, which enables them to design customized surgical environments and hire specialized staff. These features of ASCs allow physicians to perform more procedures in ASCs than in HOPDs in the


## TABLE

5-2 Most ASCs are for profit and urban

|  | ASCs that were: |  |  |
| :--- | :---: | :---: | :---: |
|  | Open in <br> $\mathbf{2 0 1 6}$ | Open in <br> $\mathbf{2 0 2 1}$ | New in <br> $\mathbf{2 0 2 1}$ |
| Type of ASC | $95.2 \%$ | $95.3 \%$ | $95.2 \%$ |
| For profit | 3.6 | 3.7 | 4.3 |
| Nonprofit | 1.2 | 1.0 | 0.4 |
| Government | 93.0 | 93.4 | 92.1 |
| Urban | 7.0 | 6.6 | 7.9 |

Note: ASC (ambulatory surgical center). The "New in 2021" column for the first three ASC types does not sum to 100 percent due to rounding.

[^12]same amount of time, earning more revenue from professional fees.

- Increased interest across the health care industry in value-based care and the provision of care in lower-cost settings has boosted interest in strategic investment of hospital systems, insurers, and private equity firms in ASCs (Barclays 2018, Japsen 2018).


## Most ASCs are for profit, and geographic distribution is uneven

Consistent with previous years, the vast majority of ASCs in 2021 were for profit ( 95 percent) and located in urban areas ( 93 percent) (Table 5-2). A discussion with representatives from the Ambulatory Surgical Center Association revealed that rural areas typically lack the surgical specialists needed for ASCs, and the lower population density in rural areas makes them less attractive locations for ASCs. Beneficiaries who do not live near an ASC usually obtain ambulatory surgical services in HOPDs and, in some cases, physicians' offices. Beneficiaries who live in rural areas may travel to urban areas to receive care in ASCs.

We found that rural beneficiaries-defined as those who live outside metropolitan statistical areas (MSAs)-are less likely to receive care in ASCs than are


State

Note: ASC (ambulatory surgical center).
Source: MedPAC analysis of CMS Provider of Services file for 2022 and Common Medicare Environment file.
urban beneficiaries, defined as those living in an MSA. In 2021, 7.8 percent of rural beneficiaries received care in an ASC compared with 11.5 percent of urban beneficiaries.

In addition to ASCs having greater presence in urban locations than rural locations, the concentration of ASCs varies widely across states. In 2021, Maryland had the most ASCs per Medicare beneficiary ( 38 ASCs per 100,000 Part B beneficiaries), followed by Georgia, Alaska, and Wyoming (respectively, 24, 20, and 20 ASCs per 100,000 Part B beneficiaries) (Figure 5-1). Alabama, the District of Columbia, West Virginia, and Vermont had the fewest ASCs per beneficiary (4 or fewer ASCs per 100,000 beneficiaries). The primary driver of this variation is certificate-of-need (CON) laws. States that have CON laws tend to have fewer ASCs than states that do not.

## Specialization of ASCs is largely unchanged; some growth in pain management

In 2021, the majority of ASCs that billed Medicare specialized in a single clinical area. Gastroenterology and ophthalmology were the most common, with each comprising about 20 percent of all ASCs that provided services to FFS Medicare beneficiaries. Overall, 65 percent of ASCs were single-specialty facilities and 35 percent were multispecialty facilities, providing services in more than one clinical specialty (Table $5-3$, p. 160). ${ }^{4}$ In 2021, multispecialty ASCs most commonly focused on two specialties: pain management and orthopedic services or gastroenterology and ophthalmology (combined, 9 percent of all ASCs). From 2016 to 2021, the number of ASCs specializing in pain management services grew most rapidly.

| Type of ASC | 2016 |  | 2021 |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Number of ASCs | Share of all ASCs | Number of ASCs | Share of all ASCs |
| Single specialty | 2,876 | 61\% | 3,535 | 65\% |
| Gastroenterology | 1,025 | 22 | 1,112 | 20 |
| Ophthalmology | 1,015 | 21 | 1,123 | 21 |
| Pain management | 356 | 6 | 643 | 12 |
| Dermatology | 180 | 4 | 192 | 4 |
| Urology | 123 | 3 | 143 | 3 |
| Cardiology | 13 | 0 | 118 | 2 |
| Podiatry | 90 | 2 | 71 | 1 |
| Orthopedics/musculoskeletal | 29 | 1 | 61 | 1 |
| Respiratory | 20 | 0 | 30 | 1 |
| OB/GYN | 15 | 0 | 12 | 0 |
| Neurology | 6 | 0 | 7 | 0 |
| Other | 4 | 0 | 33 | 1 |
| Multispecialty | 1,855 | 39 | 1,914 | 35 |
| More than 2 specialties | 1,403 | 30 | 1,489 | 27 |
| Pain management and orthopedics | 273 | 6 | 247 | 5 |
| Gastroenterology and ophthalmology | 179 | 4 | 198 | 4 |
| Total | 4,731 | 100 | 5,449 | 100 |

Note: ASC (ambulatory surgical center), OB/GYN (obstetrics and gynecology). We define a single-specialty ASC as one with more than 67 percent of their Medicare claims in one clinical specialty. We define a multispecialty ASC as one with less than 67 percent of their Medicare claims in one clinical specialty. ASCs included in this analysis are limited to those in the 50 states and the District of Columbia that had a paid Medicare claim in 2021. Some Medicare-certified ASCs did not have a paid Medicare claim in 2021. Therefore, this table has fewer ASCs than Table 5-1, which includes all Medicare-certified ASCs. Columns containing the shares of all ASCs do not sum to 100 percent due to rounding.

Source: MedPAC analysis of Medicare carrier file claims, 2021

## Volume of services per beneficiary rose in 2021 to levels above 2019

From 2016 to 2021, the number of FFS beneficiaries with Part B coverage declined from 33.7 million to 30.8 million, resulting from a substantial increase in the number of beneficiaries enrolled in Medicare Advantage plans. Because there were fewer Part B FFS beneficiaries, the aggregate number of ASC services provided to those beneficiaries increased very little ( 0.1 percent per year) from 2016 to 2019 and decreased by an average of 2.9 percent from 2019 to 2021 (Table 5-4).

However, from 2016 to 2021, the share of Part B FFS beneficiaries who received services in ASCs rose steadily from 10.6 percent to 10.8 percent (data not shown). Consequently, from 2016 through 2019, the volume of services per Part B FFS beneficiary rose on average 0.8 percent per year and an average 0.6 percent from 2019 to 2021, indicating that volume per beneficiary in 2021 exceeded the prepandemic level (Table 5-4).

ASCs appear to have substituted lower-complexity services with higher-complexity services, as the share of ASCs services attributable to complex services,

| $\begin{gathered} \text { TABLE } \\ 5-4 \end{gathered}$ | vices | FFS | ficiary | eede | epandem | vels in 2021 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2016 | 2019 | 2020 | 2021 | Average annual change |  |
|  |  |  |  |  | 2016-2019 | 2019-2021 |
| Volume of services (in millions) | 6.7 | 6.7 | 5.6 | 6.4 | 0.1\% | -2.9\% |
| Part B beneficiaries (in thousands) | 33,702 | 33,073 | 32,240 | 30,825 | -0.6 | -3.5 |
| Volume per 1,000 FFS beneficiaries | 197.6 | 202.3 | 174.7 | 204.6 | 0.8 | 0.6 |

Note: ASC (ambulatory surgical center), FFS (fee-for-service).
Source: MedPAC analysis of physician/supplier standard analytic claims files, 2016-2021.
such as knee arthroplasty and implantation of spinal neurostimulators, rose. As the shift to higher-complexity services continued from 2019 to 2021, the number of ASC services per FFS user of ASCs fell 0.4 percent (data not shown).

Services that have historically contributed the most to overall ASC volume continued to be a large share of the total in 2021. For example, in both 2016 and 2021, extracapsular cataract removal with intraocular lens insertion had the highest volume, accounting for 18.5 percent of the total in 2016 and 18.6 percent in 2021 (Table 5-5, p. 162). Moreover, 19 of the 20 most frequently provided ASC services in 2016 were among the 20 most frequently provided in 2021. These services made up about 71 percent of ASC Medicare volume in 2016 and 68 percent in 2021.

A potential concern about the services most frequently provided in ASCs is the extent to which they are unnecessary or of low value, such as spinal injections and other pain management services (Corp et al. 2021). Seven of the 20 procedures listed in Table 5-5 (p. 162) were pain management services. Moreover, the volume for the procedure that accrued the second highest Medicare revenue for ASCs in 2021-the insertion or replacement of spinal neurostimulators-grew by about 4 percent from 2019 to 2021 while falling about 25 percent in HOPDs (data not shown).

## Maintaining or expanding access to ASCs can be beneficial to patients and Medicare

Maintaining beneficiaries' access to ASCs is beneficial because services provided in this setting are less costly to Medicare and beneficiaries than services delivered in

HOPDs (paid under the OPPS). ${ }^{5}$ Medicare payments for surgical services performed in HOPDs are almost twice as high as in ASCs.

Medicare program spending and overall beneficiary cost sharing could be reduced if medical professionals provided more surgical services in ASCs than in HOPDs or if Medicare reduced HOPD payment rates to the level of ASCs'. This issue is pertinent to the ASC sector because even among the most frequently provided services in ASCs, a substantial volume is provided in HOPDs. For example, in 2021, ASCs performed 500,000 Medicare-covered upper gastrointestinal endoscopies with biopsy, but volume in HOPDs was even higher at 530,000.

## The ASC Quality Reporting Program does not have enough measures for meaningful analysis

CMS established the Ambulatory Surgical Center Quality Reporting (ASCQR) Program in 2012 (Centers for Medicare \& Medicaid Services 2011). Under this system, ASCs that do not successfully submit quality measurement data have their payment update for that year reduced by 2 percentage points. Actual performance on these quality measures does not affect an ASC's payments; CMS requires ASCs only to submit the data to receive a full update. The Commission has recommended a value-based purchasing program for ASCs that would reward high-performing providers and penalize low-performing providers (Medicare Payment Advisory Commission 2012).

| Procedure name | 2016 |  | 2021 |  |
| :---: | :---: | :---: | :---: | :---: |
|  | Percent of volume | Rank | Percent of volume | Rank |
| Extracapsular cataract removal w/ IOL insert | 18.5\% | 1 | 18.6\% | 1 |
| Upper GI endoscopy, with biopsy: single or multiple | 8.2 | 2 | 7.8 | 2 |
| Colonoscopy and biopsy | 6.8 | 3 | 6.9 | 4 |
| Colonoscopy with lesion removal, snare technique | 5.7 | 4 | 7.0 | 3 |
| Inject transforaminal epidural: lumbar or sacral | 4.8 | 5 | 4.4 | 5 |
| After cataract laser surgery | 4.3 | 6 | 3.8 | 6 |
| Injection interlaminar epidural: lumbar or sacral | 3.2 | 7 | 2.2 | 9 |
| Injection paravertebral facet joint: lumbar or sacral, single level | 3.2 | 8 | 3.1 | 7 |
| Diagnostic colonoscopy | 2.1 | 9 | 1.4 | 11 |
| Colorectal cancer screening, high-risk individual | 2.0 | 10 | 2.3 | 8 |
| Colorectal cancer screening, not high-risk individual | 1.9 | 11 | 1.4 | 14 |
| Extracapsular cataract removal complex without ECP | 1.5 | 12 | 1.4 | 12 |
| Destroy lumbar/sacral facet joint, single | 1.4 | 13 | 1.7 | 10 |
| Injection procedure for sacroiliac joint, anesthetic | 1.3 | 14 | 1.4 | 13 |
| Cystourethroscopy | 1.2 | 15 | 1.2 | 15 |
| Injection interlaminar epidural: cervical or thoracic | 1.1 | 16 | 0.9 | 18 |
| Inject paravertebral facet joint: cervical or thoracic, single level | 1.0 | 18 | 1.0 | 16 |
| Upper GI endoscopy diagnostic brush wash | 1.0 | 17 | 0.7 | 19 |
| Blepharoplasty upper eyelid | 0.9 | 19 | 0.9 | 17 |
| Upper Gl endoscopy, guide wire insertion | 0.8 | 20 | 0.7 | 23 |
| Total | 70.9 |  | 68.1 |  |
| Total volume for all ASC services | 6,660,141 |  | 6,372,853 |  |

Note: ASC (ambulatory surgical center), IOL (intraocular lens), ECP (endoscopic cyclophotocoagulation), GI (gastrointestinal). In both percentage columns, the numbers do not sum to the total because of rounding.

Source: MedPAC analysis of physician/supplier standard analytic files from 2016 and 2021

Currently, the ASCQR Program has only four measures that can be used to evaluate ASC quality, and these measures do not provide an adequate representation of ASC quality. Therefore, we do not discuss the quality of ASC care. CMS will add 12 measures for which ASCs will submit data from 2023 for ASC payment determination in 2025. However, we believe CMS should add additional quality measures to make the ASCQR Program more effective (see text box, pp. 164-165).

## Aggregate Medicare payments rose substantially in 2021 and were well above the prepandemic level

In 2021, ASCs received \$5.7 billion in Medicare payments and beneficiaries' cost sharing (Table 5-6). We estimate that spending by the Medicare program was $\$ 4.6$ billion and beneficiary cost sharing was $\$ 1.1$ billion (data not shown).

| Average annual change |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Medicare payments (billions of dollars) | $\mathbf{2 0 1 6}$ | $\mathbf{2 0 1 9}$ | $\mathbf{2 0 2 0}$ | $\mathbf{2 0 2 1}$ | $\mathbf{2 0 1 6 - 2 0 1 9}$ | $\mathbf{2 0 1 9 - 2 0 2 1}$ |
| Medicare payments per FFS beneficiary | $\$ 4.3$ | $\$ 5.2$ | $\$ 4.9$ | $\$ 5.7$ | $7.1 \%$ | $4.9 \%$ |

Note: ASC (ambulatory surgical center), FFS (fee-for-service). Medicare payments include program spending and beneficiary cost sharing for ASC facility services. Payments include spending for new-technology intraocular lenses. We calculated the percent change columns using unrounded numbers.

Source: MedPAC analysis of data from the Office of the Actuary at CMS and data from physician/supplier standard analytic files.

Spending per FFS beneficiary rose an average annual rate of 7.7 percent from 2016 through 2019 and by an average annual rate of 8.7 percent from 2019 to 2021 (Table 5-6). We compare 2019 with 2021 because of anomalous patterns of use and spending during 2020 in response to the coronavirus pandemic. In 2020, ASCs experienced large reductions in use and spending followed by rapid volume growth in 2021. From 2020 to 2021, spending per FFS beneficiary increased 23 percent. ${ }^{6}$

## Ambulatory surgical centers should submit cost data

The Commission has frequently expressed concern that Medicare does not require ASCs to submit cost data, unlike other types of facilities. Every year since 2010, the Commission has recommended that the Congress require ASCs to submit cost data (Medicare Payment Advisory Commission 2010). CMS has shown some interest in collecting cost data to help determine ASC payment rates and has requested comments from stakeholders on whether the Secretary should collect cost data from ASCs. However, the ASC industry opposes the collection of cost data for this purpose (Centers for Medicare \& Medicaid Services 2017).

Cost data would enable the Commission to examine the growth of ASCs' costs over time and analyze Medicare payments relative to ASCs' costs, which would help inform the Commission about the financial performance of the ASCs that serve Medicare beneficiaries. Cost data also are needed to determine whether an alternative
input price index would be an appropriate proxy for ASC costs. The Commission has previously expressed concern that the price index that CMS used to update the ASC conversion factor from 2010 through 2018 (the consumer price index for all urban consumers) likely does not reflect ASCs' cost structure (Medicare Payment Advisory Commission 2010). Similarly, the price index that CMS has used to update the ASC conversion factor since 2019-the hospital market basket-likely does not reflect ASCs' cost structure.

We contend that it is feasible for ASCs to provide cost information. All other facility providers submit cost data to CMS. Indeed, ASCs in Pennsylvania submit cost and revenue data annually to a state agency that uses the data to estimate margins for those ASCs (Pennsylvania Health Care Cost Containment Council 2021). We recognize that ASCs are generally small facilities that may have limited resources for collecting cost data. However, such businesses typically keep records of their costs for filing taxes and other purposes, and other facility providers that are typically small, such as home health agencies, hospices, and rural health clinics, furnish cost data to CMS.

Until cost data are available, the Commission cannot properly assess the adequacy of Medicare's payments to ASCs. Therefore, we do not offer an update recommendation in this status report. However, we reiterate our 2022 recommendation pertaining to the collection of cost data from ASCs:

The Secretary should require ambulatory surgical centers to report cost data.

## CMS will add measures to the ASC Quality Reporting Program, but further improvement is needed

CMS has made substantial changes to the quality measures in the Ambulatory Surgical Center Quality Reporting (ASCQR) Program, which will result in CMS measuring ASC quality based on 12 measures (plus 1 voluntary measure) based on ASC data from 2023 and used to determine ASC payments in 2025 (Table 5-7). These changes include:

- four reintroduced measures that had previously been discontinued (ASC-1, ASC-2, ASC-3, and ASC-4),
- a claims-based measure of beneficiaries' visits to a hospital subsequent to orthopedic procedures (ASC-17),
(continued next page)


## TABLE <br> 5-7

Quality measures used in the Medicare ASC Quality Reporting Program
Description of quality measure
Required in 2025

| ASC-1: Patient burn | Yes |
| :---: | :---: |
| ASC-2: Patient fall | Yes |
| ASC-3: Wrong site, wrong side, wrong patient, wrong procedure, wrong implant | Yes |
| ASC-4: All-cause hospital transfer/admission | Yes |
| ASC-9: Endoscopy/polyp surveillance: Appropriate follow-up interval for normal colonoscopy in average-risk patients | Yes |
| ASC-11: Cataracts: Improvement in patient's visual function within 90 days following cataract surgery | Voluntary |
| ASC-12: Facility seven-day risk-standardized hospital visit rate after outpatient colonoscopy | Yes |
| ASC-13: Normothermia outcome: Percentage of patients under anesthesia who are normothermic within 15 minutes of arrival in the post-anesthesia care unit | Yes |
| ASC-14: Unplanned anterior vitrectomy: Percentage of cataract surgery patients who have an unplanned removal of the vitreous | Yes |
| ASC-15: Five patient experience measures from the Outpatient and Ambulatory Surgery Survey Consumer Assessment of Healthcare Providers and Systems (CAHPS ${ }^{\circledR}$ ): <br> ASC-15a: About facilities and staff <br> ASC-15b: Communication about procedure <br> ASC-15c: Preparation for discharge and recovery <br> ASC-15d: Overall rating of facility <br> ASC-15e: Recommendation of facility | No* |
| ASC-17: Hospital visits after orthopedic ASC procedures | Yes |
| ASC-18: Hospital visits after urology ASC procedures | Yes |
| ASC-19: Hospital visits after general surgery ASC procedures | Yes |
| ASC-20: COVID-19 vaccination coverage among health care personnel | Yes |

[^13]- a claims-based measure of beneficiaries' visits to a hospital subsequent to urology procedures (ASC-18),
- a claims-based measure of beneficiaries' visits to a hospital subsequent to general surgery procedures (ASC-19), and
- a measure for the rate of COVID-19 vaccination coverage among health care personnel in each ASC (ASC-20).

The Commission asserts that CMS should continue to improve the ASCQR by moving toward more outcome measures that apply to all ASCs. The four ASCQR measures that are claims based and measure clinical outcomes (ASC-12, ASC-17, ASC-18, and ASC-19) exclude many services provided at ASCs, such as eye procedures and pain management. To improve the ASCQR Program, CMS should include more claimsbased measures that assess clinical outcomes for the various specialties practiced at ASCs.

In addition, CMS should synchronize ASCQR measures with measures included in the Hospital Outpatient Quality Reporting (OQR) Program to facilitate comparisons between ASCs and hospital outpatient departments (HOPDs). Currently, the ASCQR and the OQR possess four common quality measures that pertain to cataract procedures, colonoscopy procedures, and patient assessments. CMS should consider expanding the overlap of the ASCQR and OQR, relying on either measures of general surgical procedures or measures of specific surgical procedures common to both settings. For example, CMS could consider including OQR measure OP-36 (the number of hospital visits after any outpatient surgery) in the ASCQR.

Because clinical outcomes can be effective measures of quality, we contend that CMS should also
consider developing new ASC quality measures covering these two categories:

- Surgical site infections (SSIs) occurring at ASCs. In the past, researchers have found that lapses in infection control were common among a sample of ASCs in three states (Schaefer et al. 2010). Although CMS has considered an SSI measure for ASCs in the past (Centers for Medicare \& Medicaid Services 2011), it is not currently working to develop one (Centers for Medicare \& Medicaid Services 2016). In general, an SSI measure could be used to track infection rates for ASCs and identify quality improvement opportunities for ambulatory surgeries conducted in ASCs. In addition, measuring SSI rates could encourage providers to collaborate and better coordinate care for ambulatory surgery patients.
- Specialty-specific clinical guidelines to assess the appropriateness of services provided in ASCs. While the ASCQR currently includes an ASC-reported colonoscopy measure that assesses appropriate follow-up care, CMS could consider claims-based measures that assess appropriateness. For example, current American Cancer Society guidelines state that patients over the age of 85 should no longer receive colorectal cancer screening (American Cancer Society 2018). Using these guidelines, a new measure could identify ASCs' share of colonoscopy cases for beneficiaries over age 85. CMS could consider similar appropriateness measures for certain procedures that have become more common in ASCs in recent years or for procedures that have drawn concern about appropriate use, such as spinal injections or certain orthopedic procedures.


## Endnotes

1 The ASC payment system has several nuances that we have not discussed here. For a discussion of these nuances, see the Commission's Payment Basics for ambulatory surgical centers at https://www.medpac.gov/wp-content/uploads/2021/11/ MedPAC_Payment_Basics_22_ASC_FINAL_SEC.pdf.

2 Total knee arthroplasty (Current Procedural Terminology Code 27447) was first covered under the ASC payment system in 2020. About 10,800 of these procedures were provided to FFS Medicare beneficiaries in ASCs in 2020. The number of these procedures nearly doubled, to 20,900, in 2021.

3 By statute, coinsurance for a service paid under the OPPS cannot exceed the hospital inpatient deductible ( $\$ 1,556$ in 2022). The ASC payment system does not have the same limitation on coinsurance; for a small percentage of billing codes covered under the ASC payment system, beneficiary coinsurance exceeds the inpatient deductible. In these instances, coinsurance for an ASC-delivered procedure exceeds coinsurance for an HOPD-delivered procedure.

4 We define single-specialty ASCs as having more than 67 percent of their Medicare claims in one clinical specialty. We define multispecialty ASCs as having less than 67 percent of their Medicare claims in one clinical specialty.

5 Cost sharing is lower under the ASC payment system for 99 percent of Healthcare Common Procedure Coding System codes that are covered under the ASC payment system.

6 The substantial increase in spending from 2020 to 2021 reflects a 2.4 percent increase through the ASC conversion factor, a 16.6 percent increase through a change in volume per beneficiary, a 2.0 percent increase through the average relative weight of ASC services, a 1.1 percent rise due to increased spending on separately payable drugs and devices provided to beneficiaries treated in ASCs, and a 0.5 percent increase from the relaxation of the Medicare sequester for all of 2021.

## References

Ambulatory Surgery Center Association. 2021. Benefits of physician ownership. http://www.ascassociation.org/ advancingsurgicalcare/asc/benefitsofphysicianownership.

Ambulatory Surgery Center Association. 2017. Benefits of physician ownership. http://www.ascassociation.org/ advancingsurgicalcare/asc/benefitsofphysicianownership.

American Cancer Society, Department of Health and Human Services. 2018. American Cancer Society guideline for colorectal cancer screening. https://www.cancer.org/cancer/colon-rectal-cancer/detection-diagnosis-staging/acs-recommendations. html\#written_by.

Barclays. 2018. Health care services: Initiating coverage of hospital sector. August 14.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2017. Medicare program: Hospital outpatient prospective payment and ambulatory surgical center payment systems and quality reporting programs. Final rule. Federal Register 82, no. 217 (November 13): 52356-52637.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2016. Medicare program: Hospital outpatient prospective payment and ambulatory surgical center payment systems and quality reporting programs; organ procurement organization reporting and communication; transplant outcome measures and documentation requirements; electronic health record (EHR) incentive programs; payment to nonexcepted off-campus provider-based department of a hospital; hospital value-based purchasing (VBP) program; establishment of payment rates under the Medicare physician fee schedule for nonexcepted items and services furnished by an off-campus provider-based department of a hospital. Final rule. Federal Register 81, no. 219 (November 14): 79562-79892.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2011. Medicare and Medicaid programs: Hospital outpatient prospective payment; ambulatory surgical center payment; hospital value-based purchasing program; physician self-referral; and patient notification requirements in provider agreements. Final rule. Federal Register 76, no. 230 (November 30): 74122-74584.

Corp, N., G. Mansell, S. Stynes, et al. 2021. Evidence-based treatment recommendations for neck and low back pain across Europe: A systematic review of guidelines. European Journal of Pain 25, no. 2 (February): 275-295.

Japsen, B. 2018. Tenet Healthcare signals outpatient acquisitions ahead amid value-based care push. Modern Healthcare, February 27.

Leapfrog. 2019. Same-day surgery in the U.S.: Findings of two inaugural Leapfrog surveys, 2019. Washington, DC: Leapfrog. https://www.leapfroggroup.org/sites/default/files/Files/ NationalReport_Final.pdf.

Medicare Payment Advisory Commission. 2012. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2010. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Pennsylvania Health Care Cost Containment Council. 2021. Financial analysis 2020: Volume two, ambulatory surgery centers. Harrisburg, PA: PHC4.

Schaefer, M. K., M. Jhung, M. Dahl, et al. 2010. Infection control assessment of ambulatory surgical centers. Journal of the American Medical Association 303, no. 22 (June 9): 2273-2279.

CHAPTER


## Outpatient dialysis services

## R E C O M M E N D A T I O N

6 For calendar year 2024, the Congress should update the 2023 Medicare end-stage renal disease prospective payment system base rate by the amount determined under current law.

## CHAPTER

## Outpatient dialysis services

## Chapter summary

Outpatient dialysis services are used to treat the majority of individuals with end-stage renal disease (ESRD). In 2021, nearly 332,000 beneficiaries with ESRD on dialysis were covered under fee-for-service (FFS) Medicare and received dialysis from more than 7,800 dialysis facilities. In 2021, Medicare expenditures for outpatient dialysis services totaled \$10.0 billion.

## Assessment of payment adequacy

Our payment adequacy indicators for outpatient dialysis services are generally positive.

Beneficiaries' access to care-Measures of the capacity and supply of providers, beneficiaries' ability to obtain care, and changes in the volume of services suggest that payments are adequate.

- Capacity and supply of providers-Dialysis facilities appear to have the capacity to meet demand. Between 2020 and 2021, the number of in-center treatment stations grew faster than the number of FFS and Medicare Advantage (MA) dialysis beneficiaries.
- Volume of services-The steep (20 percent) decline in FFS treatments in 2021 is largely due to the removal of the statutory provision that


## In this chapter

- Are Medicare payments adequate in 2023 ?
- How should Medicare payments change in 2024?
prevented most dialysis beneficiaries from enrolling in MA plans. Between January 2020 and December 2021, the share of dialysis beneficiaries enrolled in MA plans increased from 25 percent to roughly 40 percent. The effects of the pandemic's excess mortality also contributed to the decline in FFS treatments in 2021. At the same time, use of ESRD drugs in the payment bundle (including erythropoiesis-stimulating agents, which are used in anemia management) continued their decade-long decline.
- Marginal profit-An estimated 20 percent marginal profit in 2021 suggests that dialysis providers have a financial incentive to continue to serve Medicare beneficiaries.

Quality of care-FFS dialysis beneficiaries' rates of all-cause hospitalization and mortality increased somewhat between 2020 and 2021, while emergency department use remained steady. The share of beneficiaries dialyzing at home, which is associated with better patient satisfaction, continued to grow.

Providers' access to capital-Information from investment analysts suggests that access to capital for dialysis providers continues to be strong. The number of facilities, particularly for-profit facilities, continues to increase. Under the ESRD PPS, the two largest dialysis organizations have grown through acquisitions of and mergers with midsize dialysis organizations.

Medicare payments and providers' costs-Medicare payment per treatment in freestanding dialysis facilities (which provide the vast majority of FFS dialysis treatments) grew by 0.9 percent while cost per treatment rose by 1.3 percent. Growth in costs was seen across all cost categories, with the exception of ESRD drugs. The aggregate Medicare margin fell from 2.7 percent in 2020 to 2.3 percent in 2021 ( 2.7 percent including provider-relief pandemic revenues). We project that the 2023 aggregate Medicare margin will drop to -0.4 percent, due to cost growth that we expect will exceed payment updates.

## How should Medicare payments change in 2024?

Under current law, the Medicare FFS base payment rate for dialysis services is projected to increase by 1.8 percent in 2024. Given that most of our indicators of payment adequacy are positive, the Commission recommends that, for 2024, the Congress update the calendar year 2023 ESRD PPS base rate by the amount determined under current law.

## Dialysis treatment choices

Dialysis replaces the filtering function of the kidneys when they fail. The two types of dialysis-hemodialysis and peritoneal dialysis (PD)-remove waste products from the bloodstream differently. Most dialysis patients travel to a treatment facility to undergo hemodialysis three times per week, although patients can also undergo hemodialysis at home. Hemodialysis uses an artificial membrane encased in a dialyzer to filter the patient's blood. By contrast, PD, the most common form of home dialysis, uses the lining of the abdomen (peritoneum) as a filter to clear wastes and extra fluid and is usually performed independently in the patient's home or workplace five to seven days a week.

Each dialysis method has advantages and drawbacks; no one method is best for everyone. People choose a particular dialysis method for many reasons, including quality of life, patients' awareness of different treatment methods and personal preferences, and physician training and recommendations. Some patients switch methods when their conditions or needs change. Although most patients still undergo in-center dialysis, home dialysis remains a viable option for many patients because of such advantages as increased patient satisfaction, better health-related quality of life, and fewer transportation challenges compared with incenter dialysis.

## Background

End-stage renal disease (ESRD) is the last stage of chronic kidney disease (CKD) and is characterized by permanent, irreversible kidney failure. Patients with ESRD include those who are treated with dialysis-a process that removes wastes and fluid from the bodyand those who have a functioning kidney transplant. Because of the limited number of kidneys available for transplantation and the variation in patients' suitability for transplantation, about 70 percent of ESRD patients undergo maintenance dialysis (see text box on dialysis treatment choices). Patients receive additional items and services related to their dialysis treatments, including ESRD drugs and biologics to treat conditions such as anemia and bone disease resulting from the loss of kidney function.

In 2021, nearly 332,000 ESRD beneficiaries on dialysis were covered under fee-for-service (FFS) Medicare and received dialysis from about 7,880 dialysis facilities. ${ }^{1,2}$ Since 2011, Medicare has been paying facilities using a prospective payment system (PPS) bundle that includes ESRD drugs (for which facilities previously
received separate payments) and services (for which other Medicare providers, such as clinical laboratories, previously received separate payments). ${ }^{3}$ In 2021, Part B spending for Medicare-covered outpatient dialysis services was $\$ 10.0$ billion. Additionally, in 2020 (the most recent data available), Part D payments for ESRD oral-only drugs that were not yet included in the PPSseveral phosphate binders-totaled $\$ 0.9$ billion. ${ }^{4}$ In 2021, no renal drug, equipment, or supply qualified for a transitional add-on payment under the ESRD PPS.

Medicare is the main source of health care coverage for individuals with ESRD. ${ }^{5}$ Historically, dialysis beneficiaries generally had FFS coverage, as they were prohibited from enrolling in Medicare Advantage (MA) plans. However, beneficiaries who enrolled in a managed care plan before being diagnosed with ESRD could stay in the plan after they were diagnosed. Over time, the share of dialysis beneficiaries enrolled in MA gradually increased. Between 2017 and 2020, the share of dialysis beneficiaries in MA rose from about 20 percent to 27 percent, while the share of dialysis beneficiaries in FFS fell from about 80 percent to 73 percent (Figure 6-1, p. 174; FFS data not shown).


Note: MA (Medicare Advantage). Beginning in 2021, the 21st Century Cures Act permits dialysis beneficiaries to enroll in MA plans. As a result of this statutory change, enrollment of dialysis beneficiaries in MA plans spiked between December 2020 and January 2021 from 27 percent to 36 percent.

Source: Data compiled by MedPAC from CMS enrollment data.

Beginning in 2021, the 21st Century Cures Act permits dialysis beneficiaries to enroll in MA plans. As a result of this statutory change, enrollment of dialysis beneficiaries in MA plans spiked between December 2020 and January 2021 from 27 percent to 36 percent (Figure 6-1). By December 2021, the share of dialysis beneficiaries enrolled in MA plans exceeded 40 percent.

The increase in MA enrollment by dialysis beneficiaries since January 2021 is likely linked to the same factors that have increased MA's popularity among nonESRD beneficiaries, including the availability of extra benefits (e.g., dental, hearing, and vision services) and lower cost-sharing liability. In 2023, the average MA plan enrollee has access to over $\$ 2,350$ in extra
benefits annually that Medicare FFS enrollees cannot access without purchasing additional health insurance coverage or paying for the services on an out-of-pocket basis (see Chapter 11). Given the magnitude of total health care expenses incurred by dialysis patients (for dialysis and other outpatient and inpatient services-on average, nearly $\$ 95,000$ in 2020), these beneficiaries face significant out-of-pocket cost-sharing liability and may seek to enroll in an MA plan because such plans generally offer reduced cost sharing and are required to offer a maximum out-of-pocket (MOOP) limit on annual spending. The mandatory MOOP limit was $\$ 7,550$ for in-network services in 2022 (and $\$ 11,300$ for in-network and out-of-network services covered by preferred provider organizations (PPOs)), but most plans can elect to offer a lower MOOP limit.

In 2022, the average MOOP was $\$ 4,972$ for in-network services (and $\$ 9,245$ for in-network and out-ofnetwork services covered by PPOs) (Freed et al. 2022). ${ }^{6}$ Beneficiaries who have full Medicaid coverage (about 41 percent of Medicare beneficiaries with ESRD and 15 percent of other Medicare beneficiaries) have their cost sharing covered by Medicaid but may still enroll in an MA plan for the extra benefits offered. ${ }^{7}$

Beneficiaries preferring FFS Medicare may seek to limit cost-sharing liability by purchasing a Medigap policy; however, beneficiaries with ESRD, particularly those under age 65, may face difficulties obtaining Medigap insurance. FFS dialysis beneficiaries are less likely to purchase a Medigap plan than all other FFS beneficiaries ( 20 percent vs. 40 percent in 2021) because of:

- Constraints in federal guaranteed-issue rights in obtaining these supplemental plans. Medicare beneficiaries have guaranteed-issue rights for Medigap plans-meaning that a plan must be offered regardless of their age, sex, or health status-when they turn 65. However, about half of individuals with ESRD become eligible for Medicare before reaching age 65, and federal guaranteedissue rights do not extend to those beneficiaries at the time of their initial enrollment in Medicare. Once beneficiaries with ESRD turn 65 , for a sixmonth period that begins on the first day of the month in which they turn 65 (and are enrolled in Medicare Part B), they can purchase a Medigap plan without regard to their age, gender, or health status. Outside of the federal guaranteed-issue window, Medigap plans offered to beneficiaries with ESRD are limited; 35 states require insurers to offer at least one Medigap plan to beneficiaries under age 65, but only 30 states require insurers to offer a plan to those entitled to Medicare due to ESRD rather than because of disability (AARP 2022, American Kidney Fund 2022).
- The affordability of a Medigap plan. Even though beneficiaries with ESRD who are under 65 must be offered at least one Medigap plan in 35 states, the insurer can charge a higher premium based on age, sex, or existing health conditions, depending on state insurance rating rules. Some FFS dialysis beneficiaries get financial assistance from the American Kidney Fund, a nonprofit organization
whose funding sources include dialysis providers and pharmaceutical manufacturers, via needbased grants to pay for health insurance premiums, prescription medications, and other items and services.

In addition to MA plans, dialysis beneficiaries residing in selected geographic areas have access to ESRD special needs plans (SNPs) (specifically, C-SNPs, a type of SNP for individuals with chronic conditions). As of November 2022, few dialysis beneficiaries-about 4,500-were enrolled in 12 ESRD SNPs in 9 states (Arizona, California, Colorado, Connecticut, Kentucky, New Jersey, New Mexico, Texas, and Virginia).

Dialysis patients are logical candidates for coordinated care programs, such as specialty-oriented accountable care organizations (ACOs) and the ESRD C-SNPs. Patients are medically complex because they often have multiple chronic conditions in addition to renal failure, including heart failure, diabetes, and hypertension. Moreover, patients either receive in-center treatment thrice weekly or have a regular evaluation at the dialysis facility if being treated at home. Shared savings and coordinated care arrangements have shown promise to improve the care of dialysis beneficiaries. For example, a plan-sponsored data analysis from one ESRD C-SNP found lower hospital admissions and a decreased likelihood of mortality compared with patients treated in the same facilities or facilities located in similar counties (Becker et al. 2020).

## Characteristics of fee-for-service dialysis beneficiaries, 2021

Compared with other Medicare FFS beneficiaries, FFS dialysis beneficiaries are disproportionately younger, male, and Black (Table 6-1, p. 176). In 2021, 74 percent of FFS dialysis beneficiaries were under 75 years old, 57 percent were male, and 33 percent were Black. By comparison, among other FFS Medicare beneficiaries, 63 percent were under 75 years old, 47 percent were male, and 9 percent were Black. A greater share of dialysis beneficiaries resided in urban areas compared with other FFS beneficiaries ( 83 percent vs. 80 percent).

FFS dialysis beneficiaries are more likely to have full Medicaid benefits than all other FFS beneficiaries (41 percent vs. 15 percent). In addition, in 2021, FFS dialysis beneficiaries were less likely to have coverage Black compared with all other Medicare FFS beneficiaries, 2021

## Share of FFS beneficiaries:

|  | Dialysis beneficiaries | All other beneficiaries |
| :---: | :---: | :---: |
| Age |  |  |
| Under 45 years | 10\% | 3\% |
| 45-64 years | 35 | 9 |
| 65-74 years | 29 | 51 |
| 75-84 years | 19 | 27 |
| 85+ years | 6 | 10 |
| Sex |  |  |
| Male | 57 | 47 |
| Female | 43 | 53 |
| Race |  |  |
| White | 47 | 81 |
| Black | 33 | 9 |
| Hispanic | 8 | 3 |
| Asian | 4 | 3 |
| All others | 7 | 5 |
| Residence, by type of county |  |  |
| Urban | 83 | 80 |
| Micropolitan | 10 | 11 |
| Rural, adjacent to urban | 5 | 5 |
| Rural, not adjacent to urban | 2 | 3 |
| Frontier | 1 | 1 |
| Note: FFS (for-for-service). "All other beneficiaries" excludes beneficiaries on dialysis and those who have received a kidney transplant. "Residence" reflects the beneficiary's county of residence in one of four categories (urban, micropolitan, rural adjacent to urban, and rural nonadjacent to urban) based on an aggregation of the Urban Influence Codes. Frontier counties have six or fewer people per square mile. Totals may not sum to 100 percent due to rounding. |  |  |
| Source: Data compiled by MedPAC fro | nd claims submitted by dialy |  |

from other sources, such as Medigap and employersponsored health plans ( 35 percent vs. 62 percent) and as likely to have no supplemental coverage (about 24 percent for each group in 2021).

Over the last decade, the adjusted rate of new ESRD cases, or incidence rate (which includes patients of all types of health coverage who initiate dialysis or
receive a kidney transplant), has declined. Between 2010 and 2020 (the most recent year of data available), the adjusted incidence rate decreased by 1 percent per year, from 412 per million people to 363 per million people (United States Renal Data System 2022). We estimate that about 71,000 FFS beneficiaries began dialysis in 2021 (a decline of nearly 3 percent compared with 2020).

## Medicare pays for dialysis services under the ESRD PPS

To treat ESRD, dialysis beneficiaries receive care from two principal providers: (1) the clinicians (typically nephrologists) who prescribe and manage the provision of dialysis and establish the beneficiary's plan of care and (2) facilities that provide dialysis treatments in a dialysis center or support and supervise the care of beneficiaries on home dialysis. Medicare uses different methods to pay for ESRD clinician and facility services. Clinicians receive a monthly capitated payment established in the Part B physician fee schedule for outpatient dialysis-related management services (which includes managing the dialysis prescription and prescribing ESRD drugs); payment varies based on the number of visits per month, the beneficiary's age (adult vs. pediatric beneficiaries under 20 years of age), and whether the beneficiary receives dialysis in a facility or at home. While our work in this report focuses on Medicare's payments to facilities, it is important to recognize that facilities and clinicians collaborate to care for dialysis beneficiaries.

The ESRD PPS, established in 2011, encouraged providers to be more efficient. Specifically, the PPS payment bundle included (1) Part B ESRD drugs, laboratory tests, and other ESRD items and services that were previously billable separately and (2) Part D dialysis oral-only drugs-calcimimetics and phosphate binders (at that time). Clinicians use drugs in these two therapeutic classes to manage mineral bone disorders, a complication of advanced CKD.

Under the outpatient ESRD PPS, the unit of payment is a single dialysis treatment. For adult dialysis beneficiaries, the base payment rate does not differ by type of dialysis-in-center dialysis versus home dialysis-but rather by patient-level characteristics (age, body measurement characteristics, onset of dialysis, and selected acute and chronic comorbidities) and facility-level factors (low treatment volume, rural location, and local input prices). ${ }^{8}$ Medicare pays facilities furnishing dialysis treatments in the facility or in a patient's home for up to three treatments per week, unless the additional dialysis treatments are reasonable and necessary and there is documented medical justification for more than three weekly treatments. ${ }^{9}$

Since it was implemented in 2011, the outpatient ESRD PPS has undergone several significant changes. In 2014, CMS rebased the base payment rate, as mandated by the American Taxpayer Relief Act of 2012, to account for the decline in ESRD drug use under the ESRD PPS. ${ }^{10}$ In 2016, the agency recalibrated and redefined the patient-level and facility-level payment adjusters that are used to calculate each patient's adjusted payment per treatment. ${ }^{11}$ In addition, in 2018, 2019, and 2020, transitional add-on payments were used to pay for certain drugs (calcimimetics) and were available for qualifying equipment and supplies.

## Transitional add-on payments for new drugs, devices, and equipment

CMS uses transitional add-on payment policies for:

- ESRD oral-only drugs that were intended to be in the bundle in 2011 but were delayed due to actions by regulatory and statutory provisions. With the availability of an injectable calcimimetic in 2017, CMS no longer considered these drugs oral only and, between 2018 and 2020, the ESRD PPS paid for them using a transitional drug add-on payment adjustment (TDAPA). ${ }^{12,13}$ Since 2021, CMS has paid for calcimimetics under the PPS bundled payment rate.
- New ESRD drugs in a new ESRD functional category. To comply with the statute's mandate for including new ESRD-related injectable and intravenous drugs in the prospective payment bundle, the agency finalized a policy in 2016 that pays a TDAPA for new ESRD-related injectable drugs not in 1 of 11 ESRD-related functional categories of drugs included in the PPS payment bundle. ${ }^{14}$ (Functional categories are similar to therapeutic classes of drugs and are based on physiologic end-point action, including products used for anemia, bone and mineral metabolism, and antipruritic management.) For a new renal dialysis drug that is used to treat or manage a condition that does not fit into the current ESRD PPS functional categories, CMS will pay providers a TDAPA based on the product's average sales price (ASP) until sufficient claims data for rate setting analysis is available, but not for less than two years. During this period, CMS will assess whether to add a new functional category or refine an existing
functional category, as well as how to add the drug to the ESRD base rate (Centers for Medicare \& Medicaid Services 2015).
- Certain new ESRD drugs in an existing ESRD functional category. CMS expanded the TDAPA policy in 2020 to apply to new ESRD drugs in an existing functional category (based on the agency's statutory authority). CMS pays a TDAPA using the product's ASP for a two-year period; thereafter, the drug is included in the PPS bundle without any change to the ESRD PPS base rate. CMS does not apply a substantial clinical improvement criterion to determine a new drug's eligibility. Drugs that do not qualify for this TDAPA include generic equivalents and new dosage forms of an active ingredient that the Food and Drug Administration (FDA) has already approved, among others. ${ }^{15}$ As of April 2022, CMS pays a TDAPA for Korsuva (in the antipruritic functional category) for a two-year period (through March 31, 2024). ${ }^{16}$
- New ESRD equipment and supplies that are not capital assets and home dialysis machines (a capital asset) when used in the home for a single patient. Based on its regulatory authority, CMS pays a transitional add-on payment adjustment for new and innovative equipment and supplies (TPNIES) for a two-year period; thereafter, these items are included in the PPS payment bundle without any change to the ESRD PPS base rate. Unlike for ESRD drugs, a substantial clinical improvement standard is used to determine eligibility under this transitional payment policy. ${ }^{17}$ CMS sets the new item's payment rate at 65 percent of the price that the Medicare administrative contractors establish. ${ }^{18}$ As of January 2022, CMS pays a TPNIES for a home dialysis machine.


## Are Medicare payments adequate in 2023?

To address whether payments for 2023 are adequate to cover the costs that efficient providers incur and how much providers' costs are likely to change in the update year (2024), we examine several indicators of payment adequacy. We assess beneficiaries' access to care by examining the capacity of dialysis facilities and changes
over time in the volume of services provided. We also examine quality of care, providers' access to capital, and the relationship between Medicare's payments and facilities' costs.

## Beneficiaries' access to care: Indicators continue to be positive

Our analysis of access indicators-including the capacity of providers to meet beneficiary demand, changes in the volume of services, and the marginal profitability of Medicare dialysis beneficiaries under the PPS-shows that beneficiaries' access to care remains favorable.

## Capacity has exceeded demand from dialysis patients across all insurance types

Growth in the number of dialysis facilities and incenter treatment stations alongside growth in the number of dialysis beneficiaries suggests that, between 2017 and 2020, provider capacity has exceeded FFS beneficiaries' demand for care. During that period, the number of facilities and their capacity to provide careas measured by dialysis treatment stations-each grew by 3 percent annually (Table 6-2, p. 180), compared with a 1 percent decline in the annual growth of the number of FFS dialysis beneficiaries (data not shown). In-center capacity also exceeded demand from all dialysis patients, across all insurance types, not just FFS beneficiaries. During the same period, the number of dialysis patients of all types of health coverage grew 1 percent per year (data not shown) (United States Renal Data System 2022).

The number of facilities' in-center treatment stations grew more slowly annually between 2020 and 2021 compared with growth from 2017 through 2020 ( 1 percent per year vs. 3 percent per year) but exceeded growth in the number of dialysis FFS or MA beneficiaries (which declined about 2 percent between 2020 and 2021). The slower growth of in-center capacity may be partly attributable to the coronavirus pandemic. ${ }^{19}$ In addition, researchers have shown that the ESRD PPS was associated with an increase in home dialysis use among patients starting dialysis (Lin et al. 2017). Lastly, the financial incentives associated with Center for Medicare \& Medicaid Innovation's (CMMI's) mandatory ESRD Treatment Choices (ETC) Modelrewards dialysis facilities and clinicians who are part of the model for increasing home dialysis use and kidney transplantation among adult dialysis beneficiaries
and penalties for not increasing these outcomesmight have spurred some providers and clinicians to recommend home dialysis more often. ${ }^{20}$

Between 2020 and 2021, capacity at freestanding and for-profit facilities each grew by 2 percent, while capacity at hospital-based facilities fell by 2 percent, and capacity at nonprofit facilities fell by 0.1 percent. During this period, capacity at urban facilities grew by 2 percent, while capacity at all rural facilities increased by 0.2 percent. In June 2020, the Commission recommended that the Secretary replace the current low-volume payment adjustment and rural adjustment with a single payment adjustment-a low-volume and isolated (LVI) adjustment-to better protect isolated, low-volume dialysis facilities that are critical to ensuring beneficiary access. The Commission found that the facilities that would receive the LVI adjustment would be more appropriately targeted compared with current policy (Medicare Payment Advisory Commission 2020).

Based on data from Medicare claims, freestanding dialysis cost reports, and CMS's Dialysis Facility Compare database, roughly half of facilities offered home dialysis between 2014 and 2021. Among facilities that furnished home dialysis, the share of total treatments furnished in the home rose from an average of 24 percent to 30 percent. (At the 75th percentile of facilities, the share increased from 28 percent to 34 percent, consistent with a rise in the share of FFS dialysis beneficiaries receiving home dialysis.)

Providers of outpatient dialysis services In 2021, there
were 7,879 dialysis facilities in the United States that furnished about 35.6 million Medicare-paid treatments to FFS dialysis beneficiaries. In 2021, FFS Medicare accounted for 47 percent of all treatments furnished. ${ }^{21}$ According to CMS facility survey data, since the late 1980s, for-profit, freestanding facilities have provided the majority of dialysis treatments. In 2021, freestanding facilities furnished 96 percent of FFS treatments, and for-profit facilities furnished 89 percent (Table 6-2, p. 180). In 2021, the capacity of facilities in urban and rural areas was generally consistent with where FFS dialysis beneficiaries lived.

The dialysis sector is highly consolidated, with two large dialysis organizations (LDOs)-Fresenius Medical Care and DaVita-dominating the industry. In 2021,
these LDOs accounted for three-quarters of facilities and Medicare treatments. In addition, many dialysis facilities are operated as joint ventures between dialysis organizations and physicians. Joint ventures allow participating partners to share in the management of dialysis facilities and in their profits and losses. Both the LDOs and midsize provider groups, including American Renal Associates and U.S. Renal Care, have established joint ventures with physicians.

There is concern that joint ventures between dialysis organizations and physicians create financial incentives for participating physicians that could inappropriately influence decisions about patient care (Berns et al. 2018). Under federal disclosure requirements, a dialysis facility must report certain ownership information to CMS and its state survey agency but is not required to disclose such information to its patients, researchers, or members of the public.

Types of facilities that closed and their effect on beneficiaries' access to care Each year, we examine the types of facilities that closed and whether certain groups of Medicare dialysis beneficiaries are disproportionately affected by facility closures. Using facilities' claims submitted to CMS and CMS's Dialysis Compare database and Provider of Services file, we compare the characteristics of beneficiaries treated by facilities that closed in 2020 with those of beneficiaries treated at facilities providing dialysis in 2020 and 2021.

Between 2020 and 2021, the number of dialysis treatment stations-a measure of providers' capacityrose by 1 percent (Table 6-2, p. 180). During this time, there was a net increase in the number of freestanding facilities and in the number located in urban areas. Compared with facilities that treated beneficiaries in both years, our preliminary analysis suggests that facilities that closed in 2020 (about 40 facilities) were more likely to be hospital based, nonprofit, and small (as measured by the number of dialysis treatment stations), which is consistent with long-term trends in the supply of dialysis providers.

According to our analysis, few dialysis FFS beneficiaries (roughly 1,300 individuals) were affected by facility closures in 2020. Our analysis found that beneficiary groups who were disproportionately affected included Black FFS dialysis beneficiaries and FFS dialysis beneficiaries residing in urban areas. However, facility closures affected only 0.3 percent of all FFS dialysis

## Increasing number and capacity of freestanding, for-profit, and largest dialysis organizations

|  | 2021 |  |  |  | Average annual percent change |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Total number of FFS treatments (in millions) | Total number of facilities | Total number of stations | Mean number of stations | Number of facilities |  | Number of stations |  |
|  |  |  |  |  | $2017-$ | $\begin{gathered} 2020- \\ 2021 \end{gathered}$ | $\begin{aligned} & 2017- \\ & 2020 \end{aligned}$ | $\begin{gathered} 2020- \\ 2021 \end{gathered}$ |
| All | 35.6 | 7,879 | 137,900 | 18 | 3\% | 2\% | 3\% | 1\% |
|  | Share of total |  |  |  |  |  |  |  |
| Freestanding | 96\% | 95\% | 96\% | 18 | 3 | 2 | 4 | 2 |
| Hospital based | 4 | 5 | 4 | 14 | -3 | -1 | -3 | -2 |
| Urban | 86 | 84 | 86 | 18 | 4 | 2 | 4 | 2 |
| Micropolitan | 10 | 10 | 9 | 16 | 1 | 1 | 1 | 0.2 |
| Rural, adjacent to urban | 3 | 4 | 3 | 14 | 0.2 | 0 | 1 | 0.3 |
| Rural, not adjacent to urban | 1 | 2 | 1 | 12 | -2 | 0 | -1 | 0.4 |
| Frontier | 0.3 | 0.4 | 0.2 | 10 | -1 | 3 | 1 | 3 |
| For profit | 89 | 89 | 89 | 18 | 3 | 2 | 4 | 2 |
| Nonprofit | 11 | 11 | 11 | 17 | 1 | -1 | 1 | -0.1 |
| Two largest dialysis organizations | 76 | 75 | 76 | 18 | 4 | 1 | 4 | 2 |
| All others | 24 | 25 | 24 | 17 | 1 | 2 | 1 | 1 |

Note: FFS (fee-for-service). Provider location reflects the county in which the provider is located, by county type (urban, micropolitan, rural adjacent to urban, and rural nonadjacent to urban), based on an aggregation of the Urban Influence Codes. Frontier counties have six or fewer people per square mile. Totals may not sum to 100 percent due to rounding.

Source: Data compiled by MedPAC from the Dialysis Compare database from CMS and claims submitted by dialysis facilities to CMS
beneficiaries. Our analysis of claims data suggests that beneficiaries affected by these closures obtained care elsewhere.

## Volume of services

To assess changes in the volume of dialysis services, we examined recent trends in the number of dialysis treatments provided to beneficiaries and in the use of injectable drugs administered during dialysis.

## Trends in number of dialysis treatments provided

 From 2017 to 2019, there was little change in the number of FFS dialysis beneficiaries and the numberof FFS dialysis treatments provided, but since then, both have declined sharply. In 2020, the number of FFS dialysis beneficiaries and dialysis treatments each declined by 3 percent due to the coronavirus pandemic, which slowed the initiation of dialysis by new patients and caused excess mortality among patients with ESRD. In 2021, the decline in the number of FFS dialysis beneficiaries and treatments accelerated, with the number of beneficiaries falling 14 percent and the number of treatments falling 20 percent. This drop was largely due to dialysis beneficiaries opting to enroll in MA plans after the enactment of the 21st Century Cures

Between 2019 and 2021, weekly number of FFS dialysis beneficiaries and treatments declined

FFS dialysis beneficiaries per week


Note: FFS (fee-for-service). The decline between 2019 and 2020 in the weekly number of FFS beneficiaries and treatments is largely attributable to the coronavirus pandemic, which resulted in slowing the initiation of dialysis by new patients and in excess mortality. The decline between 2020 and 2021 is largely attributable to enactment of the 21st Century Cures Act, which permits beneficiaries with ESRD to enroll in Medicare Advantage plans starting in 2021. The variation in the weekly number of beneficiaries and treatments may be linked to seasonal factors.

Source: MedPAC analysis of claims submitted by dialysis facilities to CMS

Act, which eliminated restrictions on the enrollment of beneficiaries with ESRD in MA (Figure 6-1, p. 174). ${ }^{22}$ Overall, in 2021, 332,000 beneficiaries received 35.6 million dialysis treatments. Although FFS beneficiaries and treatments declined between 2019 and 2021, the number of dialysis treatments per beneficiary per week remained steady at 2.9 (data not shown).

Figure 6-2 shows the effect of both the pandemic and the statutory change (that allows for ESRD beneficiaries to enroll in MA) on the weekly number of FFS dialysis beneficiaries and treatments. For example, the effect of the pandemic is highlighted by the 6 percent drop in the average weekly FFS dialysis treatments furnished between December 2019 and December 2020. The effect of removing the statutory bar is highlighted by
the 9 percent drop in the average number of weekly FFS dialysis treatments between December 2020 and January 2021 and the additional 13 percent drop between January 2021 and December 2021. Some variation in the weekly number of beneficiaries and treatments is also linked to seasonal factors. ${ }^{23}$

Use of most ESRD-related drugs has declined, with no sustained negative changes in beneficiaries' outcomes Under the ESRD payment method used before 2011, ESRD-related drugs were paid according to the number of units of the drug administered; in other words, the more units of a drug provided, the higher the Medicare payment. The ESRD PPS increased the incentive for providers to be more judicious in providing ESRD drugs included in the payment bundle. When CMS broadened

## Under the ESRD PPS, use per treatment of ESRD drugs has declined

| Dialysis drug | Mean units per treatment ${ }^{\text {a }}$ |  |  | Aggregate percent change |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2010 | 2020 | 2021 | 2010-2021 | 2020-2021 |
| ESAs |  |  |  |  |  |
| Epoetin alfa (reference biologic) | 5,214 | 1,103 | 1,051 | -80\% | -5\% |
| Darbepoetin alfa | 1.26 | 0.8 | 0.9 | -32 | 2 |
| Epoetin beta | N/A | 4.2 | 4.2 | N/A | -2 |
| Epoetin alfa (biosimilar) | N/A | 77 | 111 | N/A | 44 |
| Iron agents |  |  |  |  |  |
| Sodium ferric gluconate | 0.15 | 0.06 | 0.05 | -67 | -17 |
| Iron sucrose | 16.0 | 12.5 | 13.7 | -14 | 10 |
| Bone and mineral metabolism agents |  |  |  |  |  |
| Paricalcitol | 2.3 | 0.2 | 0.2 | -93 | -27 |
| Doxercalciferol | 0.9 | 1.3 | 1.2 | 44 | -4 |
| Calcitriol | 0.13 | 0.02 | 0.01 | -91 | -37 |
| Cinacalcet | N/A | $18.2{ }^{\text {b }}$ | $19.5{ }^{\text {c }}$ | N/A | 7 |
| Etelcalcetide | N/A | $5.5{ }^{\text {b }}$ | $2.0^{\text {c }}$ | N/A | -64 |
| Other drugs |  |  |  |  |  |
| Daptomycin | 0.22 | 0.05 | 0.08 | -62 | 82 |
| Vancomycin | 0.02 | 0.01 | 0.01 | -63 | 21 |
| Levocarnitine | 0.010 | 0.001 | 0.001 | -93 | 19 |
| Alteplase | 0.020 | 0.002 | 0.003 | -87 | 26 |

Note: ESRD (end-stage renal disease), PPS (prospective payment system), ESA (erythropoiesis-stimulating agent), N/A (not applicable [because drug not available in the U.S.]). Individual units per treatment are rounded; the aggregate percent change is calculated using unrounded units per treatment.
${ }^{\text {a }}$ Each drug is reported using its own drug units.
${ }^{b}$ In 2020, cinacalcet and etelcalcetide were paid on a per unit basis under the ESRD transitional drug add-on payment policy.
${ }^{\text {c }}$ In 2021, cinacalcet and etelcalcetide were included in the ESRD PPS payment bundle.
Source: MedPAC analysis of claims submitted by dialysis facilities to CMS.
the payment bundle in 2011 to include ESRD-related drugs that previously were billed separately, the agency set the PPS payment rate on a per treatment basis using claims data from 2007. In 2014, to account for the decline in ESRD drug use under the ESRD PPS, the statute required that CMS rebase the PPS base rate by comparing drug use in 2007 with such use in 2012. Consequently, we examined changes between 2007 and 2021 (the most current year for which complete data are available) in the use per treatment for the leading ESRD drugs and aggregated them into four therapeutic
classes: erythropoiesis-stimulating agents (ESAs), iron agents, bone and mineral metabolism agents (including vitamin D agents and the two calcimimetics, cinacalcet and etelcalcetide), and other products. ${ }^{24}$

As shown in Table 6-3, use of all ESRD-related drugs available between 2020 and 2021 declined except for darbepoetin alfa, biosimilar epoetin alfa (which was launched in late 2018), iron sucrose, cinacalcet, daptomycin, vancomycin, levocarnitine, and alteplase. With the inclusion of the two calcimimetics in the


Note: ESRD (end-stage renal disease), PPS (prospective payment system), ESA (erythropoiesis-stimulating agent). To estimate drug use by therapeutic class, we hold the price of each drug constant and multiply drug units reported on claims in a given year by 2021 average sales price (ASP) +0 percent (or CMS's outlier limit if ASP data are not available). ESAs include epoetin alfa, epoetin beta, and darbepoetin. Iron agents include iron sucrose, sodium ferric gluconate, ferumoxytol, and ferric carboxymaltose. Bone and mineral metabolism agents include the vitamin $D$ agents calcitriol, doxercalciferol, and paricalcitol and the calcimimetics cinacalcet and etelcalcetide. Other drugs include daptomycin, vancomycin, alteplase, and levocarnitine. Before the ESRD PPS was implemented, Medicare paid dialysis facilities separately for vitamin D agents and drugs in the ESA, iron, and other groups; since 2017, these products have been included in the ESRD PPS bundle and paid under the base payment rate. Prior to 2018, Medicare covered the available calcimimetic under Part D. Beginning in 2018, Medicare began to pay for all calcimimetics under the ESRD PPS. Per statutory and regulatory provisions, the ESRD PPS paid for calcimimetics: (1) using a transitional drug add-on payment policy in 2018, 2019, and 2020; and (2) under the base rate in 2021.
*In 2020, calcimimetics were paid on a per unit basis under a transitional drug add-on payment policy. In 2021, calcimimetics were included in the ESRD PPS bundle and paid under the base rate.

Source: MedPAC analysis of 100 percent claims submitted by dialysis facilities to CMS.

ESRD PPS bundle in 2021, the use of oral cinacalcet (with brand-name and generic formulations) increased while the use of injectable etelcalcetide (with only brand-name formulations) decreased compared with 2020, when both products were paid on a per unit basis under an add-on payment to the ESRD PPS payment rate. Under the ESRD PPS, the Commission reported a shift over time in the use of products within the ESA and vitamin D therapeutic classes due to price competition among the products within each class (Medicare Payment Advisory Commission 2022).

As shown in Figure 6-3, most of the decline in the per treatment use of ESRD drugs occurred in the early years of the PPS. (We estimated per treatment use by multiplying drug units per treatment reported on CMS claims by each drug's 2021 ASP +0 percent-i.e., holding price constant. ${ }^{25}$ ) For example, between 2010 and 2011, use per treatment across all therapeutic classes declined by 23 percent. Most of this decrease was due to declining ESA use, which also fell by 23 percent per year during the same period. Some of the decline in ESA use may have stemmed from clinical
evidence showing that higher doses of these drugs led to increased risk of morbidity and mortality, which resulted in the FDA changing the ESA label in 2011.

Between 2020 and 2021, holding price constant, the use of all ESRD drugs in the four classes declined by 15 percent. Most of this decline was due to the lower use of etelcalcetide in 2021 (when it was included in the ESRD PPS bundle) compared with 2020 (when it was paid under a TDAPA). Excluding both calcimimetics from this analysis, the use of all ESRD drugs would have declined by 1 percent between 2020 and 2021. Although the ESRD PPS affected use of certain ESRDrelated services, particularly the provision of drugs paid under the bundle, CMS has concluded that the agency's claims-based monitoring program has revealed no sustained negative changes in beneficiary health status (Centers for Medicare \& Medicaid Services 2019).

## Dialysis marginal profitability suggests that financial incentive to serve Medicare beneficiaries remains

Another measure of access is whether providers have a financial incentive to expand the number of Medicare beneficiaries they serve. In considering whether to treat a patient, a provider with excess capacity compares the revenue it will receive (i.e., the Medicare payment) with its marginal costs-that is, the costs that vary with volume. If Medicare payments are larger than the marginal costs of treating an additional beneficiary, a provider has a financial incentive to increase its volume of Medicare beneficiaries if it has the capacity to do so. In contrast, if payments do not cover the marginal costs, the provider could have a disincentive to care for Medicare beneficiaries. ${ }^{26}$ In 2021, Medicare FFS accounted for about 47 percent of all treatments furnished by freestanding facilities.

For dialysis facilities in 2021, Medicare payments exceeded dialysis facilities' marginal costs by 20 percent, a positive indicator of patient access in that facilities with available capacity have a financial incentive to treat Medicare beneficiaries.

## Quality of care is difficult to assess due to the effects of the coronavirus pandemic

Quality of care is challenging to interpret due to effects of the coronavirus pandemic on many of our measures. While we report 2021 quality results, we do not use them to assess any trends in the quality of
care, especially those that may reflect the adequacy of Medicare payments in 2021. Many factors related to the pandemic, including hospital capacity constraints and patient avoidance of health care settings, affected rates of hospitalizations.

In 2020 and 2021, FFS dialysis beneficiaries' use of the emergency department (ED) remained stable while rates of hospitalization and mortality increased slightly. Results of process measures that assess dialysis adequacy and anemia management (hemoglobin levels) remained generally stable, although blood transfusion rates increased between 2020 and 2021. Use of home dialysis and the number of kidney transplants increased during this period. The findings, except where indicated, are based on the Commission's analysis of Medicare FFS enrollment and claims data.

While this section focuses on changes in individual quality metrics, it is worth noting that Medicare has implemented numerous programs that aim to improve the quality of care for late-stage chronic kidney disease and ESRD (see text box, pp. 186-187).

## Quality under the ESRD PPS

Analysis of the most recent five-year period for which we have available claims and enrollment data for FFS dialysis beneficiaries suggests that:

- Between 2017 and 2019, mortality averaged between 1.5 percent per month to 1.6 percent per month, while in 2020 and 2021, the rate of mortality per month increased to 1.9 percent and 2.0 percent, respectively (Centers for Medicare \& Medicaid Services 2019).
- Between 2017 and 2021, the share of FFS dialysis beneficiaries admitted to a short-stay hospital (beneficiaries with at least one admission in a given month) ranged from 12 percent per month to 14 percent per month. During the same period, 30day readmission rates on an annual basis remained relatively steady at 22 percent of admissions.
- Between 2017 and 2019, the share of FFS dialysis beneficiaries who used the ED on an outpatient basis (beneficiaries with at least one ED visit in a given month) averaged 12 percent per month. In 2020 and 2021, ED use remained steady at 10 percent per month.

Beneficiaries' fluid management is related to factors such as the adequacy of the dialysis procedure, defined as having enough waste removed from their blood. According to the Commission's analysis, between 2017 and 2021, 98 percent of hemodialysis beneficiaries and 93 percent of PD beneficiaries received adequate dialysis.

We assess the quality of anemia management by examining changes over time in (1) beneficiaries' hemoglobin level, a blood test that measures the level of hemoglobin, the protein that carries oxygen in red blood, and (2) frequency of red blood cell transfusions. ${ }^{27}$ Lower hemoglobin levels (which suggest underuse of ESAs and iron agents) can increase the frequency of red blood cell transfusions, while higher hemoglobin levels (greater than $12 \mathrm{~g} / \mathrm{dL}$ ) among patients maintained on higher doses of ESAs can increase their risk of death and cardiovascular events (congestive heart failure, myocardial infarction, and stroke).

Between 2017 and 2021, median hemoglobin levels have remained constant, averaging $10.5 \mathrm{~g} / \mathrm{dL}$. During this period, the share of FFS dialysis beneficiaries with lower hemoglobin levels (less than $10 \mathrm{~g} / \mathrm{dL}$ ) rose from 28 percent of beneficiaries to 31 percent of beneficiaries while the share of FFS beneficiaries with levels between $10 \mathrm{~g} / \mathrm{dL}$ and $12 \mathrm{~g} / \mathrm{dL}$ fell from 67 percent to 63 percent. During this period, the share of beneficiaries with higher hemoglobin levels (exceeding $12 \mathrm{~g} / \mathrm{dL}$ ) remained relatively constant, at about 5 percent of FFS dialysis beneficiaries.

We see fluctuation in another anemia management measure, rates of blood transfusion. Between 2017 and 2020, the proportion of FFS dialysis beneficiaries receiving a blood transfusion declined from an average of 2.7 percent per month to 2.4 percent per month. In 2021, the share of FFS dialysis beneficiaries receiving a blood transfusion increased to an average of 2.7 percent per month.

## Access to home dialysis

Researchers have shown that the ESRD PPS is associated with an overall increase in the use of home dialysis (Lin et al. 2017). Between 2017 and 2021, the share of beneficiaries dialyzing at home steadily increased from 11 percent per month to nearly 15 percent per month. While we are encouraged by this
increase, differences by race persist: Black beneficiaries are less likely to use home methods. According to the Commission's analysis, about 33 percent of Medicare beneficiaries with ESRD are Black, but only 25 percent of beneficiaries who dialyze at home are Black. Between 2017 and 2021, the proportion of beneficiaries undergoing home dialysis training was relatively small but increased slightly, ranging from a monthly average of 0.7 percent to 0.9 percent of dialysis beneficiaries.

Researchers have identified many factors that affect the use of home dialysis, both clinical (patients' other health problems and prior nephrology care) and nonclinical (e.g., patients' social circumstances and knowledge about treatment options and physicians' training and preference). For example, nephrology trainees reported low and moderate levels of preparedness for managing patients on home hemodialysis and PD, respectively (Gupta et al. 2021). Some beneficiaries report that they were never informed about their options. Facility factors, such as unused in-center capacity or additional in-center shifts and dialysis facility staff experience, can also affect use of home dialysis (Walker et al. 2010). During the coronavirus pandemic, however, both LDOs and midsize providers reported that their patients showed increased awareness of and interest in home dialysis. ${ }^{28}$

Some clinical and nonclinical factors affecting home dialysis use are amenable to intervention. For example, between 2008 and 2018, under an integrated care delivery system (Kaiser Permanente Northern California), PD use among new dialysis patients more than doubled, from 15 percent to 34 percent. To augment the use of home dialysis, the health care system implemented a multidisciplinary, system-wide approach that increased patient and family education, educated health care professionals about the importance of PD, adopted operational improvements, monitored outcomes, and shared best practices with staff (Pravoverov et al. 2019).

## Access to kidney transplantation

Kidney transplantation is widely regarded as a better ESRD treatment option than dialysis in terms of patients' clinical outcomes and quality of life. In addition, transplantation results in lower Medicare spending. In 2020, average Medicare spending for patients who had a functioning kidney transplant was

Medicare's efforts to improve management of late-stage chronic kidney disease and end-stage renal disease

The goals of care for patients with chronic kidney disease (CKD) are to delay progression to end-stage renal disease (ESRD), reduce complications, educate patients about their treatment options for ESRD, and ensure a timely transition to transplantation or dialysis while optimizing patients' independence (Levin et al. 2014). Here, we discuss models designed by the Center for Medicare \& Medicaid Innovation (CMMI) that aim to improve the quality of care and lower Medicare spending for individuals with late-stage CKD and for individuals with ESRD. In addition to these CMMI models, Medicare links outpatient dialysis prospective payment system (PPS) payments to the quality of care that facilities provide under the ESRD Quality Incentive Program (QIP).

## The Comprehensive ESRD Care Model, a specialty ACO, improved quality of ESRD care

The relatively high resource use by dialysis beneficiaries, particularly rates of hospital admissions and hospital readmissions, suggests that further improvements in quality are needed and that some dialysis beneficiaries might benefit from better care coordination. Results from CMMI's Comprehensive ESRD Care (CEC) Model, Medicare's first accountable care organization (ACO) model (a five-year shared savings program that ended in 2021) that targeted a particular clinical population, found that key quality metrics improved, with beneficiaries in the model having fewer hospitalizations due to

ESRD complications, fewer hospital readmissions, lower catheter use, and improved adherence to dialysis. The CEC Model reduced total Part A and Part B spending by an estimated $\$ 217$ million over the model's five performance years, primarily generated through a decrease in hospitalizations and readmissions. Specifically, the number of hospitalizations and the share of beneficiaries with at least one readmission decreased 3 percent and 2 percent across the five performance years, respectively (Marrufo et al. 2022). Although the CEC Model resulted in lower total Part A and Part $B$ spending, Medicare experienced aggregate net losses after taking into account shared savings payments made to participants (Marrufo et al. 2022).

## The ESRD Treatment Choices Model aims to promote home dialysis and kidney transplantation

CMMI's ESRD Treatment Choices (ETC) Model, which began in 2021, is a mandatory model that aims to promote home dialysis and kidney transplantation and applies to dialysis facilities and managing clinicians who furnish monthly capitated payment services. CMS chose participants according to their location in randomly selected geographic areas (hospital referral regions), stratified by region, to account for approximately 30 percent of adult dialysis beneficiaries. CMS adjusts participants' payment through two adjustments upward or downward based on their home dialysis and kidney
(continued next page)
substantially less than spending for dialysis patients ( $\$ 39,216$ vs. $\$ 94,460$ ) (United States Renal Data System 2022). However, demand for kidney transplantation exceeds supply of available kidneys. Besides donation rates, factors that affect access to kidney transplantation include the clinical allocation process; patients' health literacy, clinical characteristics, and preferences; the availability of education for patients; clinician referral
for transplant evaluation at a transplant center; communication between the dialysis facility and the transplant center; and transplant center policies.

Between 2017 and 2021, according to the Organ Procurement and Transplantation Network, the number of kidney transplants increased by 6 percent per year, to 24,670 (Table 6-4, p. 188). The increase

## Medicare's efforts to improve management of late-stage chronic kidney disease and end-stage renal disease (cont.)

transplant rates. Specifically, the first adjustmentthe home dialysis payment adjustment-is applied during the initial three years of the model and increases a participating facility's adjusted PPS base payment rate for home dialysis treatments. The second adjustment-the performance payment adjustment-is applied beginning in year two through the end of the model and can either increase or decrease a participating facility's adjusted PPS base payment rate for home and incenter dialysis treatments. CMS estimated that the Medicare program would, on net, reduce Medicare spending by $\$ 28$ million over the ETC Model's sixyear duration through decreased payments to dialysis facilities (Centers for Medicare \& Medicaid Services 2021).

## Kidney Care Choices Model aims to delay the initiation of dialysis and incentivize kidney transplantation

CMMI's Kidney Care Choices Model aims to delay the initiation of dialysis and incentivize kidney transplantation for fee-for-service (FFS) beneficiaries with chronic kidney disease stages 4 and 5 (not on dialysis), ESRD FFS beneficiaries on dialysis, and beneficiaries who were aligned to a participating provider due to CKD and ESRD who received a transplant. The model, which began in 2022 and spans five performance years, is based on benchmark and payment methodologies used in the Comprehensive ESRD Care Model, the

Direct Contracting Model, and the Primary Care First Model. The Kidney Care Choices Model tests whether these design elements will reduce Medicare spending and improve the quality and coordination of care for beneficiaries with late-stage CKD, ESRD, and kidney transplants.

## Linking ESRD PPS payments to quality of care

Since 2012, outpatient dialysis payments under the ESRD PPS are linked to the quality of care that facilities provide under the ESRD QIP to promote high-quality services in renal dialysis facilities. Under statutory provisions, the maximum payment reduction that CMS can apply to any facility is 2 percent. For example, in 2021, the QIP assessed facility-level quality using clinical measures that assess dialysis adequacy, vascular access among hemodialysis beneficiaries, hospitalization rates, hospital readmission rates, blood transfusion rates, presence of hypercalcemia, bloodstream infections among hemodialysis beneficiaries, the number of dialysis patients on the transplant waiting list, and the quality of care that in-center hemodialysis beneficiaries report that they receive from their nephrologist and dialysis facility and process measures that assess whether dialysis facilities report on clinical depression screening, ultrafiltration rates, medication reconciliation, and infection events (reported to the Centers for Disease Control and Prevention's National Healthcare Safety Network).
was mostly due to an increase in the number of deceased donor transplants. During this period, the share of transplants for Black and Hispanic patients rose while the share of transplants for White patients fell (Table 6-4). According to researchers, a kidney allocation system implemented in 2014 by the United Network for Organ Sharing led to a narrowing of the disparities in national kidney transplant rates among

White, Black, and Hispanic patients on the transplant waiting list (Melanson et al. 2017). However, differences by race persist in living donor transplantation (Purnell et al. 2018). For example, data from the US Renal Data System show that rates of living donor transplantation are lower for Black and Hispanic dialysis patients than for White dialysis patients (United States Renal Data System 2022). ${ }^{29}$

|  | $\mathbf{2 0 1 7}$ | $\mathbf{2 0 2 0}$ | $\mathbf{2 0 2 1}$ |
| :--- | :---: | :---: | :---: |
| Total transplants | 19,849 | 22,817 | 24,670 |
| Share of transplants from live donors | $29 \%$ | $23 \%$ | $24 \%$ |
| Share receiving a transplant |  |  |  |
| White | 47 | 45 | 42 |
| Black | 27 | 27 | 29 |
| Hispanic | 18 | 18 | 20 |
| Asian | 7 | 7 | 7 |
| Other | 2 | 2 | 2 |

Note: Components may not sum to 100 percent due to rounding

Source: Organ Procurement and Transplantation Network.

## Providers' access to capital: Growth trends indicate that access is adequate

Providers need access to capital to improve their equipment and open new facilities so they can accommodate the growing number of patients across all types of health coverage who require dialysis. The two LDOs as well as other renal companies appear to have had adequate access to capital. For example:

- In 2022, Fresenius Medical Care completed a threeway merger that includes Fresenius Health Partners (its value-based care division), InterWellHealth, and Cricket Health. The new company will focus on services for the care of individuals with earlier stages of kidney disease, will operate under the InterWell Health brand, and anticipates managing the care of roughly 300,000 individuals in the U.S. with kidney disease, with more than $\$ 11$ billion in costs under management by 2025 (Landi 2022).
- In December 2021, DaVita acquired a transplant software business, MedSleuth, that works with transplant centers across the U.S. to provide greater connectivity among transplant candidates, transplant centers, and physicians and care teams to help improve the experience and outcomes for kidney and liver transplant patients.
- In 2022, DaVita announced that it will form a kidney care-focused medical device company
with Medtronic that will specialize in developing novel kidney care products and solutions, including home-based products to make different dialysis treatments more accessible. The joint venture, NewCo, will be equally owned by both companies. Medtronic and DaVita will each provide approximately $\$ 200$ million in cash to launch NewCo. DaVita has agreed to pay Medtronic additional consideration if NewCo achieves a set of regulatory and commercial milestones. The transaction is expected to close in 2023, subject to regulatory approvals and closing conditions.

Another indicator of the relatively good access to capital is that, during the past decade, several companies-both small and large-have entered the renal care field aiming to improve treatment of individuals with CKD and ESRD, including Outset Medical (in 2010), Cricket Health (in 2015), Somatus (in 2016), and CVS (in 2018). Most recently, in 2021, Diality Inc., a medical device company that is developing a versatile hemodialysis system, announced the close of a $\$ 12.5$ million Series B investment round.

In public financial filings, the two LDOs reported generally positive financial performance related to their dialysis business for 2021, including improvements in productivity and revenue growth-that is, growth achieved apart from mergers and acquisitions. Since

2010, the two LDOs have also grown through large acquisitions of and mergers with other dialysis facilities and other health care organizations. For example, during this period, both of the largest dialysis organizations acquired midsize for-profit organizations: DaVita acquired Purity and Renal Ventures and Fresenius Medical Care acquired Liberty Dialysis.

The two LDOs, in addition to operating three-quarters of all dialysis facilities, are each vertically integrated. Both organizations operate an ESRD-related laboratory, a pharmacy, and one or more centers that provide vascular access services; they provide ESRDrelated care coordination and disease management services to government and nongovernment payers (including MA plans); and they operate dialysis facilities internationally. One LDO manufactures, acquires, inlicenses, and distributes ESRD-related pharmaceutical products (e.g., phosphate binders and iron replacement products) and manufactures dialysis products (hemodialysis machines, peritoneal cyclers, dialyzers, peritoneal solutions, hemodialysis concentrates, bloodlines, and systems for water treatment) and nondialysis products, including acute cardiopulmonary and apheresis products. This LDO supplies dialysis facilities that it owns, operates, or manages with dialysis products, and it sells dialysis products to other dialysis service providers.

Another positive indicator of the dialysis sector's strong access to capital is its all-payer margin. Using cost report data submitted by freestanding dialysis facilities to CMS, the 2021 all-payer margin was roughly 17 percent. The all-payer margin is affected by the revenues that providers derive from furnishing care to patients with all sources of coverage, including FFS Medicare, MA, other government payers, and commercial payers. Although commercial payment rates vary, average rates established under commercial contracts are generally significantly higher than Medicare rates. According to one LDO, patients with commercial coverage (including hospital dialysis services) account for 10 percent of its treatments and about 32 percent of its U.S. dialysis patient revenues, while patients with government coverage account for 90 percent of its treatments and 68 percent of its U.S. dialysis patient revenues (DaVita 2022, DaVita 2018).

In general, current growth trends among dialysis providers indicate that the dialysis industry is attractive to for-profit facilities and investors.

## Medicare payments and providers' costs: Increased costs in most cost categories contributed to slight decline in Medicare margins

In 2021, total Medicare spending for outpatient dialysis services dropped by 19 percent, due predominantly to a sharp decline in the number of FFS dialysis beneficiaries, as enrollment in MA plans by dialysis beneficiaries soared. Medicare's payment per FFS dialysis treatment increased 0.9 percent while total cost per treatment rose by 1.3 percent in 2021. Growth in many cost categories was offset by a 21 percent decline in ESRD drug costs, a consequence of the continued decline in ESA costs and the cessation of separate payments for calcimimetics, which were included in the ESRD payment bundle beginning in 2021. In 2021, the aggregate Medicare margin decreased slightly to 2.3 percent ( 2.7 percent including pandemic relief funds). We project that the aggregate Medicare margin for 2023 will be -0.4 percent, a conservative estimate, as it assumes a rate of provider cost growth for 2023 that is high relative to past experience and does not account for the potential effect of add-on payments for a new home dialysis machine and a new ESRD drug that began in 2022.

## Medicare payments for outpatient dialysis services

In 2021, Medicare spending for outpatient dialysis services was $\$ 10.0$ billion, a 19 percent drop compared with 2020; per capita annual spending declined by 6 percent to roughly $\$ 30,200$. This decline is due in large part to the increasing enrollment of dialysis beneficiaries in MA plans between 2020 and 2021. Specifically, between 2020 and 2021, the annual number of FFS dialysis beneficiaries and treatments declined by 14 percent and 20 percent, respectively. In addition, the decline in spending could be linked to Medicare's inclusion of calcimimetics in the ESRD PPS bundle in 2021. Payment on a per unit basis under a TDAPA in 2020 did not likely promote their efficient prescription. A statutory update (of 1.6 percent) increased the base dialysis payment rate in 2021.

Since 2017, dialysis facilities are able to furnish dialysis to beneficiaries with acute kidney injury (AKI), as mandated by the Trade Preferences Extension Act of 2015. AKI is the sudden loss of kidney function typically caused by an event that leads to kidney malfunction, such as dehydration, blood loss from major surgery
or injury, or the use of medicines. By contrast, CKD is usually caused by a long-term disease, such as hypertension or diabetes, that slowly damages the kidneys and reduces their function over time. AKI is more commonly reversible than late-stage CKD.

In 2021, Medicare spending for outpatient dialysis services for beneficiaries with AKI was nearly \$80 million, an increase from nearly $\$ 77$ million in 2020. Medicare pays facilities the ESRD PPS base rate adjusted by the PPS wage index for the treatment of beneficiaries with AKI. ${ }^{30}$ Medicare spending for treatment of AKI by dialysis facilities is not included in the Commission's analysis of Medicare's payments and costs for dialysis facilities (including our Medicare margin analysis).

## Between 2019 and 2020, Part D spending for ESRD oral-only phosphate binders declined

Phosphate binders, currently covered under Part D, will be the last oral-only drug group to be included in the ESRD PPS bundle in 2025; therefore, we track spending for this group. Between 2019 and 2020 (the most recent year for which data are available), spending for phosphate binders furnished to dialysis FFS beneficiaries declined by 1 percent to $\$ 0.9$ billion. ${ }^{31}$ In 2020 , roughly 70 percent of FFS dialysis beneficiaries with Part D coverage were prescribed phosphate binders, and Part D spending for phosphate binders accounted for 36 percent of their Part D spending. Medicare spending for ESRD drugs under Part D is not included in the Commission's analysis of dialysis facilities' financial performance under the ESRD PPS.

As of January 1, 2025, phosphate binders covered under Part D will be included in the ESRD PPS bundled payment. Their inclusion is intended to lead to better management of drug therapy and improve beneficiaries' access to these medications since some beneficiaries lack Part D coverage or have coverage less generous than the Part D standard benefit. Including phosphate binders in the ESRD PPS bundle might also improve provider efficiency. For example, between 2019 and 2020:

- Medicare total spending increased for the phosphate binders that did not have generic competitors.
- Despite inconclusive evidence about whether calcium-free phosphate binders reduced
cardiovascular events compared with calciumbased agents, Part D spending for calcium-free agents has increased (Ogata et al. 2021). The appropriate use of calcium-based phosphate binders has the potential to reduce health care expenditures because of their low cost and high tolerability (Jovanovich 2020).


## Providers' costs for outpatient dialysis services under the ESRD PPS

To assess the appropriateness of costs for dialysis services paid for under the ESRD PPS, we examine whether aggregate dialysis facility costs reflect costs that providers would incur in furnishing high-quality care. For this analysis, we used 2020 and 2021 cost reports and claims submitted to CMS by freestanding dialysis facilities. For those years, we looked at the growth in the cost per treatment and how total treatment volume affected that cost.

Cost growth under the ESRD PPS Between 2020 and 2021, total cost per treatment rose by 1.3 percent, from $\$ 266$ per treatment to nearly \$270 per treatment. This change results from a 21 percent decline in ESRD drug costs offset by an increase in the cost of:

- administrative and general expenses, which rose by 7 percent and accounted for 27 percent of cost per treatment in 2021;
- capital costs, which rose by 6 percent and accounted for 18 percent of cost per treatment in 2021;
- labor costs, which rose by 2 percent and accounted for 34 percent of cost per treatment in 2021; and
- supplies and labs, which rose by 2 percent and accounted for 13 percent of providers' cost per treatment in 2021. ${ }^{32}$

Variation in cost growth across freestanding dialysis facilities shows that some facilities were able to hold their cost growth well below that of others. For example, between 2020 and 2021, per treatment costs fell by 4 percent for facilities in the 25th percentile of cost growth, compared with a rise of 6 percent for facilities in the 75th percentile. This finding is similar to our results from 2019 to 2020, in which per treatment costs fell by 5 percent for facilities in the 25th percentile, compared with a rise of 5 percent for facilities in the 75 th percentile.

The extent to which some of the variation in costs among facilities results from differences in the accuracy of facilities' reported data is unknown. Under the ESRD PPS, we have found substantial variation in the level of selected cost categories reported by the five largest dialysis organizations. For example, in 2021, labor cost per treatment varied by $\$ 44$ per treatment, and capital costs varied by $\$ 34$ per treatment.

Consistent with our 2014 recommendation, the Protecting Access to Medicare Act of 2014 (PAMA) funded CMS to audit a representative sample of ESRD facility cost reports. It is basic fiscal management to ensure that facilities' cost reports are accurate. The agency published the results of their audit in the ESRD proposed rule for calendar year 2022. Because CMS did not publish total reported costs for the audited facilities or the share of total reported costs that were unallowable, we roughly estimated these values using 2018 cost reports submitted by freestanding facilities to CMS. Based on our analysis, we estimate that CMS's finding of $\$ 147.5$ million in unallowable costs represents about 4 percent of reported costs in 2018. ${ }^{33}$ Our estimate assumes that audited facilities in the aggregate had average costs (i.e., audited facilities were assumed to be of average size, as measured by total treatments furnished); if the aggregate costs of audited facilities were lower or greater than the average, the estimated share of unallowable costs would be larger or smaller. If 4 percent of reported costs are unallowable, the estimated aggregate Medicare margin would be understated by nearly 4 percentage points.

## Cost per treatment is correlated with facility service

volume Cost per treatment is correlated with the total number of treatments a facility provides. To examine this relationship, we adjusted the cost per treatment to remove differences in the cost of labor across geographic areas and included all treatments regardless of payer. Our analysis showed, in each year from 2011 through 2021, a statistically significant relationship between total treatments and cost per treatment (correlation coefficient equaled -0.5) (Figure $6-4)$. That is, the greater the facility's service volume, the lower its costs per treatment. In each year, facilities that qualified for increased Medicare payment due to low volume had substantially higher cost per treatment for capital as well as administrative and general services compared with all other facilities.


## Higher-volume dialysis facilities have lower cost per treatment, 2011-2021



Number of dialysis treatments

Note: Cost per treatment is adjusted to remove differences in the cost of labor. "Dialysis facilities" includes those paid by all insurance sources.

Source: MedPAC analysis of cost reports submitted by freestanding dialysis facilities to CMS and the end-stage renal disease wage index files.

## The trend in the aggregate Medicare margin for freestanding dialysis facilities

The Commission assesses current payments and costs for dialysis services for freestanding dialysis facilities by comparing Medicare's payments with facilities' Medicare-allowable costs. The latest and most complete data available on payments and costs are from 2021.

Under the ESRD PPS, dialysis facilities' financial performance under Medicare has varied due to statutory and regulatory changes and the use and profitability of certain ESRD-related drugs (Figure $6-5$, p. 192). During the initial years of the ESRD PPS, the aggregate Medicare margin increased, particularly because of declining use of ESRD drugs between 2010


Note: ESRD (end-stage renal disease), PPS (prospective payment system), TDAPA (transitional drug add-on payment adjustment). Pandemic-related federal relief funds are not included in the data presented in this figure.

Source: Compiled by MedPAC from cost reports and claims submitted by facilities to CMS.
and 2012. Between 2014 and 2017, facilities' financial performance under Medicare reversed, with the aggregate Medicare margin declining from 2.1 percent to -1.1 percent, which was not unexpected given the payment adjustments required by statute. To reflect more current use of ESRD drugs, the American Taxpayer Relief Act of 2012 required that CMS rebase the base payment rate effective 2014, and PAMA set the statutory update at (1) 0 percent in 2015, (2) market basket minus 1.25 percent in 2016 and 2017, and (3) market basket minus 1.0 percent in 2018. ${ }^{34}$

In 2018 and 2019, the aggregate Medicare margin increased due to the profitability of the calcimimetics paid under the TDAPA policy. The aggregate Medicare margin was 2.1 percent in 2018 and 8.4 percent in 2019 (Figure 6-5). ${ }^{35}$ The increase in the aggregate Medicare margin between 2018 and 2019 is associated with the
availability of generic versions of the oral calcimimetic in 2019. There is a two-quarter lag in the data used to set ASP-based payment rates under the TDAPA policy, which can result in a difference between the average provider acquisition cost for a drug and the ASP used to set the Medicare payment amount for a quarter. When prices increase or decrease, it takes two quarters before that change is reflected in the ASP data that Medicare uses to pay providers. When newly available generic drugs enter the market, their ASPs are often substantially lower than their brand counterparts, but payment amounts remain at the higher brand level for typically two quarters (or more).

In 2020, the aggregate Medicare margin decreased to 2.7 percent (Figure 6-5). This decline is linked to increasing cost per treatment and to the TDAPA payment declining from ASP +6 to ASP +0 . We also

In 2021, the aggregate Medicare margin of freestanding dialysis facilities varied by treatment volume

| Provider type | Aggregate <br> Medicare <br> margin | Share of <br> freestanding <br> dialysis facilities | Share of <br> freestanding <br> dialysis facility treatments |
| :--- | :---: | :---: | :---: |
| All | $2.3 \%$ | $100 \%$ | $100 \%$ |
| Urban | 3.0 | 84 | 88 |
| Rural | -1.4 | 16 | 12 |
| Treatment volume (quintile) | -20.6 | 20 | 7 |
| Lowest | -9.2 | 20 | 13 |
| Second | -1.1 | 20 | 18 |
| Third | 4.5 | 20 | 24 |
| Fourth | 10.3 | 20 | 39 |
| Highest |  |  |  |

Note: Pandemic-related federal relief funds are not included in the data presented in this table. Components may not sum to 100 percent due to rounding.

Source: Compiled by MedPAC from cost reports and claims submitted by freestanding dialysis facilities to CMS and the Dialysis Compare database.
calculated an aggregate Medicare margin that includes a portion of the congressional pandemic relief funds (based on FFS Medicare's share of 2019 all-payer operating revenue) because these funds were intended to help cover lost revenue and payroll costs-including lost revenue from Medicare patients and the cost of staff that help treat these patients. Including these funds raises the 2020 aggregate Medicare margin to 3.7 percent (data not shown).

In 2021, the aggregate Medicare margin decreased to 2.3 percent (Figure 6-5). This decline is attributable to increasing cost per treatment for all cost categories with the exception of ESRD drug costs. Including a portion of the congressional pandemic relief funds raises the 2021 aggregate Medicare margin to 2.7 percent (data not shown).

## The aggregate Medicare margin varies by treatment volume

Aggregate Medicare margins in 2021 decidedly varied by treatment volume: Facilities in the lowest volume quintile had margins below -20 percent, while facilities
in the top volume quintile had margins of over 10 percent (Table 6-5). Urban facilities averaged higher margins than rural facilities ( 3.0 percent vs. - 1.4 percent). Total treatment volume accounted for much of the difference in margins between urban and rural facilities. Urban dialysis facilities are larger on average than rural facilities in terms of the number of treatment stations and total treatments provided. For example, in 2021, urban facilities averaged about 11,000 treatments, while rural facilities averaged about 7,600 treatments (data not shown). And, as shown in Figure 6-4 (p. 191), higher-volume facilities had lower cost per treatment.

Although some rural facilities have benefited from the ESRD PPS's 23.9 percent low-volume adjustment and 0.8 percent rural adjustment, the Commission has stated that neither adjustment targets low-volume, geographically isolated facilities that are critical to beneficiary access (Medicare Payment Advisory Commission 2016, Medicare Payment Advisory Commission 2015, Medicare Payment Advisory Commission 2014). The Commission's recommendation to replace the current low-volume payment adjustment
and rural adjustment with a single low-volume and isolated adjustment, where low-volume criteria are empirically derived, would better protect isolated lowvolume rural facilities that are necessary for beneficiary access (Medicare Payment Advisory Commission 2020).

## Projecting the aggregate Medicare margin for 2023

We project that the aggregate Medicare margin for 2023 will be -0.4 percent, less than the 2021 Medicare margin ( 2.3 percent). This projection considers providers' historical cost growth and the policy changes that went into effect between 2021 (the year of our most recent margin estimates) and 2023, which include the following:

- In 2022 and 2023, the statutory dialysis base payment rate (based on the ESRD market basket offset by a productivity adjustment) increased by 1.9 percent and 3.0 percent, respectively.
- For 2023, CMS estimates that payments will be reduced by 0.38 percent due to the ESRD Quality Incentive Program.
- In 2023, CMS estimates that the ETC Model (CMMI's mandatory model) will decrease payments to facilities by $\$ 3$ million (Centers for Medicare \& Medicaid Services 2021).

This projection is conservative since we assume a rate of provider cost growth for 2023 that is high relative to past experience. As a result, the Commission's projection assumes higher cost inflation than outpatient dialysis facilities are likely to experience, so margins in 2023 could be higher.

Additionally, we do not account for the effect of the new add-on payments for a home dialysis machine and a new ESRD drug that might improve providers' financial performance. Specifically, the projection does not account for the potential effect on providers' payments and costs of:

- The new transitional add-on payment adjustment for new and innovative equipment and supplies (TPNIES) that CMS began to apply for a home dialysis machine in January 2022 for a two-year period. The technology will receive the TPNIES for two calendar years. CMS estimates that the TPNIES amount will equal \$24 per treatment (which is net
of an offset amount to account for the cost of home dialysis machines already in the PPS bundle).
- The new transitional add-on payment adjustment for a new drug (Korsuva), which began in April 2022 for a two-year period.


## How should Medicare payments change in 2024?

The evidence suggests that Medicare's outpatient dialysis payments are adequate. It appears that facilities have become more efficient under the ESRD PPS, as measured by declining use of most injectable dialysis drugs, with little to no measurable impact on beneficiaries' health outcomes.

We note that, since 2020, in addition to the base payment rate, Medicare includes a TDAPA payment adjustment under the ESRD PPS that pays dialysis facilities for certain new drugs and biologics based on the product's ASP + 0 percent for a two-year period. If a drug becomes eligible for a TDAPA payment, this policy will likely increase Medicare payments relative to facilities' costs; CMS does not reconcile the cost and utilization of the new drug within an existing functional category with the cost and utilization of the drugs already included in the functional categories prior to the inclusion of the new drug.

Also since 2020, Medicare includes a payment adjustment under the ESRD PPS that pays dialysis facilities for new and innovative equipment and supplies based on the product's invoice price for a two-year period. For non-capital-related technologies, this policy could raise Medicare payments relative to facilities' costs because CMS will not offset the ESRD PPS base rate. (The payment adjustment for new and innovative home dialysis machines, a capital asset, includes an offset applied to the ESRD PPS base rate.)

Under current law, Medicare's base payment rate for outpatient dialysis services is increased annually based on the projected increase in the ESRD market basket less a projected increase in productivity. Although the final update for 2024 will not be set until later in 2023, CMS's current projections of the market basket and productivity would result in the base payment increasing by 1.8 percent.

## RECOMMENDATION 6

## For calendar year 2024, the Congress should update the 2023 Medicare end-stage renal disease prospective payment system base rate by the amount determined under current law.

## RATIONALE 6

Most of our indicators of payment adequacy are positive, including beneficiaries' access to care, the supply and capacity of providers, volume of services, and access to capital. Providers have become more efficient in the use of dialysis drugs under the ESRD PPS. Indicators of quality of care have generally remained stable; for example, the use of home dialysis has increased and emergency department use has held steady. There was a modest increase in rates of admission and mortality between 2020 and 2021. The 20 percent marginal profit is a positive indicator of beneficiary access. The aggregate Medicare margin was 2.3 percent in 2021 and is projected to be -0.4 percent in 2023. Although we are uncertain about the effects of the TDAPA and TPNIES that CMS began in 2022 (for a two-year period) on providers' costs and Medicare payments, our prior analysis showed that the add-on payment for calcimimetics between 2018 and 2020 contributed to a substantial increase in provider profitability during this period.

Margins tend to be lower in low-volume and in rural dialysis facilities, in spite of the payment system's low-volume and rural adjustments, which increase payments by 23.9 percent and 0.8 percent, respectively. Previous Commission analyses have found that
neither adjustment appropriately targets low-volume, geographically isolated facilities. The Commission has stated that payments to rural providers should target facilities that are critical for beneficiary access (meaning facilities that are both low volume and isolated). Further, the magnitude of rural payment adjustments should be empirically derived, and the adjustments should encourage provider efficiency. In June 2020, the Commission recommended that the Secretary replace the current low-volume and rural payment adjustments with a single payment adjustment that considers both a facility's distance to the nearest facility and its treatment volume, thereby directing extra payments to the low-volume and isolated facilities that are most necessary for beneficiary access to care (Medicare Payment Advisory Commission 2020).

## IMPLICATIONS 6

## Spending

- In 2024, the statute sets the payment update at the market basket, net of the productivity adjustment. The Commission's recommendation would have no effect on federal program spending relative to the statutory update.


## Beneficiary and provider

- We expect beneficiaries to continue to have good access to outpatient dialysis care. We do not anticipate any negative effects on beneficiary access to care. This recommendation is expected to have a minimal effect on providers' willingness and ability to care for Medicare beneficiaries.


## Endnotes

1 In this chapter, the term beneficiaries refers to individuals covered by Medicare, and patients refers to all individuals (across all types of health coverage) who have ESRD.

2 Throughout this chapter, we use the term FFS Medicare to mean the CMS term Original Medicare.

3 In this chapter, the term drugs refers to both drugs and biologics. The term biologics refers to biological products.

4 According to the Stephen Beck, Jr., Achieving a Better Life Experience Act of 2014, ESRD oral-only drugs cannot be paid under the ESRD PPS before January 1, 2025.

5 Medicare has been the main source of health care coverage for individuals with ESRD since the 1972 amendments to the Social Security Act that extended Medicare benefits to this population (Kirchhoff 2018). For individuals with ESRD to qualify for Medicare, including those under age 65 , they must be fully or currently insured under the Social Security or Railroad Retirement program or be the spouse or dependent child of an eligible beneficiary.

6 There is a separate out-of-pocket threshold on Part D spending, which was $\$ 7,050$ in 2022, above which plan enrollees pay 5 percent of costs.

7 Under statutory provisions, states are not obligated to pay the full amount of Medicare cost sharing if the provider payment would exceed the state's Medicaid rate for the same service. States have the option to pay, for a given Medicare service received by a dually eligible beneficiary, the lesser of (1) the full amount of Medicare deductibles and coinsurance or (2) the amount by which Medicaid's rate for the same service exceeds what Medicare has already paid (this amount is zero in cases where Medicaid's rate is lower than Medicare's payment) (Medicaid and CHIP Payment and Access Commission 2015). However, under the ESRD PPS, Medicare reimburses dialysis facilities 65 percent of uncollected cost sharing, otherwise known as "bad debt."

8 Under the ESRD PPS, for pediatric dialysis beneficiaries (ages 17 years and under), the base rate is adjusted for age and type of dialysis.

9 The Commission's Payment Basics provides more information about Medicare's method of paying for outpatient dialysis services (see Outpatient Dialysis Services Payment System, available at https://www.medpac.gov/wp-content/ uploads/2021/11/MedPAC_Payment_Basics_22_dialysis_ FINAL_SEC.pdf).

10 The Commission's March 2014 report to the Congress provides more information about the rebasing of the dialysis base payment rate (available at http://medpac.gov/docs/ default-source/reports/mar14_ch06.pdf?sfvrsn=0).

11 More information about these payment changes can be found in the Commission's March 2016 report to the Congress (available at https://www.medpac.gov/wp-content/uploads/ import_data/scrape_files/docs/default-source/reports/ chapter-6-outpatient-dialysis-services-march-2016-report-. pdf). The Commission's methodological concerns about these patient-level and facility-level refinements can be found in our comment letter to CMS (available at http://medpac.gov/ docs/default-source/comment-letters/medpac-comment-on-cms-s-proposed-rule-on-the-end-stage-renal-disease-prospective-payment-system-and-.pdf?sfvrsn=0).

12 In 2011, CMS delayed including ESRD oral-only drugs (calcimimetics and phosphate binders paid for under Part D) in the Part B ESRD prospective payment bundle to give facilities additional time to make operational changes and logistical arrangements to furnish these products to their beneficiaries. Section 204 of the Stephen Beck, Jr., Achieving a Better Life Experience Act of 2014 delayed including oralonly renal dialysis services in the ESRD PPS bundled payment until January 1, 2025. According to CMS, these products are paid under a TDAPA because the base dialysis payment rate has not yet accounted for their costs.

13 In 2016, CMS established a drug designation process (as mandated by the Protecting Access to Medicare Act of 2014) for determining when ESRD oral-only drugs are no longer oral only and therefore must be paid under the ESRD PPS. Under the process, once the Food and Drug Administration approves an equivalent injectable product (or other non-oral forms), the agency pays facilities for both the oral and nonoral products under a TDAPA until sufficient claims data (at least two years' worth) for rate-setting analysis are available; thereafter, these drugs will be included in the PPS bundle.

14 Currently, drugs and biologics reported on dialysis facility claims are categorized into 1 of the following 11 functional categories: access management, anemia management, bone and mineral metabolism, cellular management, antiemetic, anti-infective, antipruritic, anxiolytic, excess fluid management, fluid and electrolyte management, and pain management.

15 New drugs ineligible for a TDAPA include generic drugs, which the FDA approves under Section 505(j) of the Federal Food, Drug, and Cosmetic Act, and drugs approved for a new
dosage form (e.g., pill size, time-release forms, chewable or effervescent pills); new drugs approved for a new formulation (e.g., new inactive ingredient); new drugs approved that were previously marketed without a new drug application (NDA); and new drugs approved that changed from prescription to over-the-counter availability. CMS will identify these drugs using the NDA classification code that the FDA assigns to an NDA.

16 The Commission recommended that the Congress direct the Secretary to eliminate the TDAPA for new drugs that are in an existing ESRD functional category that is already included in the payment bundle (Medicare Payment Advisory Commission 2020). Doing so would maintain the structure of the ESRD PPS and avoid the introduction of incentives to unbundle services covered under the PPS. Eliminating the TDAPA for these drugs would create pressure for drug manufacturers to constrain the growth of prices for new and existing ESRD drugs.

17 CMS defines a capital-related asset as an asset that a provider has an economic interest in through ownership (as set forth in the Provider Reimbursement Manual, Chapter 1, Section 104.1). The agency includes the following items as examples of capital-related assets: dialysis machines, water purification systems, and systems designed to clean dialysis filters for reuse.

18 Because home dialysis machines are capital-related depreciable assets, CMS (1) applies a five-year straight-line depreciation method to determine an annual allowance, by dividing the Medicare administrative contractorsdetermined price by its useful life of five years; (2) divides the annual allowance by the number of treatments expected to be furnished in a year; and (3) reduces the payment by an offset that is intended to represent the portion of payment attributable to home dialysis machines from the base rate.

19 According to the large dialysis organization (LDOs), during the coronavirus pandemic, interest in home dialysis increased among their patients. One LDO (Fresenius Medical Care) reported a rise in home dialysis trainings in 2020 compared with 2019 (Charnow 2020). In addition, the coronavirus pandemic-related restrictions may have affected the development of new facilities by dialysis organizations (Medicare Payment Advisory Commission 2022).

20 Beginning in 2021, the ETC Model applies to certain dialysis facilities and managing clinicians who furnish monthly capitated payment services. CMS selected participants according to their location in randomly selected geographic areas (hospital referral regions), stratified by region, to account for approximately 30 percent of adult dialysis beneficiaries. CMS adjusts participants' payment upward or downward based on their home dialysis and kidney transplant
rates. CMS estimated that the Medicare program would, on net, save \$28 million over the ETC Model's six-year duration through decreased payments to dialysis facilities.

21 This figure is based on the Commission's analysis of Medicare and total treatments reported by freestanding facilities on cost reports submitted to CMS.

22 Some portion of the decline in 2021 in the number of FFS dialysis beneficiaries and treatments may also have been due to the ongoing effects of the coronavirus pandemic. According to one of the LDOs, the overall number of patients that the company treated in 2021 fell by about 0.5 percent from 2020, primarily due to an increase in mortality rates because of the coronavirus pandemic. These rates were partially offset by patients starting dialysis (DaVita 2022).

23 For example, researchers have reported that all-cause mortality among dialysis patients is significantly higher in winter compared with other seasons.

24 These drug classes accounted for nearly all ESRD drug spending (about 97 percent) in 2010, the year before the start of the new payment method.

25 To measure changes in the use of drugs in the payment bundle, we combine drugs within and across therapeutic classes by multiplying the number of drug units reported on claims in a given year by each drug's 2021 ASP, with one exception. Because 2021 ASP data were not available for cinacalcet, we used CMS's TDAPA payment limit for the fourth quarter of 2020. By holding the price constant, we account for the different billing units assigned to a given drug.

26 If we approximate marginal cost as total Medicare costs minus fixed building and equipment costs, then marginal profit can be calculated as follows: Marginal profit = (payments for Medicare services - (total Medicare costs fixed building and equipment costs)) / Medicare payments. This comparison is a lower bound on the marginal profit because we do not consider any potential labor costs that are fixed.

27 Blood transfusions are of concern to patients because they (1) carry a small risk of transmitting blood-borne infections to the patient, (2) may cause some patients to develop a reaction, and (3) are costly and inconvenient for patients. Blood transfusions are of particular concern for patients seeking kidney transplantation because they increase a patient's alloantigen sensitization, which can require a patient to wait to receive a transplant.

28 See our March 2020 report to the Congress for more information on the factors that affect use of home dialysis and the factors associated with some patients' discontinuation of home dialysis (available at http://www. medpac.gov/docs/default-source/reports/mar20_medpac_ ch6_sec.pdf?sfvrsn=0).

29 In 2020 (the most recent year for which data are available), the rate of living donor transplants per 100 dialysis patientyears was $1.3,0.3,0.6$, and 0.9 for White, Black, Hispanic, and Asian dialysis patients, respectively (United States Renal Data System 2022).

30 In addition, for beneficiaries with AKI, Medicare pays dialysis facilities separately for drugs, biologics, and laboratory services that are not renal dialysis services.

31 Between 2017 and 2019, the FDA approved generic versions of several types of phosphate binders (including lanthanum, sevelamer carbonate, and sevelamer hydrochloride).

32 In 2020, ESRD drug cost per treatment accounted for 11 percent of total cost while all other components (capital, labor, supplies, labs, and administrative and general expenses) accounted for the remainder. In 2021, ESRD drug cost per treatment declined to 8 percent of total cost.

33 To determine total reported costs for audited facilities (which CMS did not publish in regulation), we multiplied 2018 average total costs per facility (derived from the 2018 freestanding cost reports) by 1,395 (the number of facilities that CMS audited). The share of reported costs that is unallowable is calculated by dividing $\$ 147.5$ million (CMS's finding of total costs that were unallowable) by our estimate of 2018 total costs for the 1,395 facilities that the agency audited.

34 As a result of rebasing, in 2014, CMS reduced the base payment rate by $\$ 8.16$ to $\$ 239.02$.

35 In 2019, there was an anomalous increase compared with prior years in non-ESRD-related drug costs for facilities associated with a dialysis organization.

## References

AARP. 2022. Can I get Medigap insurance if I'm under 65? https:// www.aarp.org/health/medicare-qa-tool/medigap-insurance-under-65/.

American Kidney Fund. 2022. Kidney failure patients under 65: Understanding the challenges for patients with Medicare. https://www.kidneyfund.org/sites/default/files/media/ documents/2021-medigap-map-infographic.pdf.

Becker, B. N., J. Luo, K. S. Gray, et al. 2020. Association of chronic condition special needs plan with hospitalization and mortality among patients with end-stage kidney disease. JAMA Network Open 3, no. 11 (November 2): e2023663.

Berns, J. S., A. Glickman, and M. S. McCoy. 2018. Dialysis-facility joint-venture ownership: Hidden conflicts of interest. New England Journal of Medicine 379, no. 14 (October 4): 1295-1297.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2021. Medicare program; end-stage renal disease prospective payment system, payment for renal dialysis services furnished to individuals with acute kidney injury, and End-Stage Renal Disease Quality Incentive Program, and EndStage Renal Disease Treatment Choices Model. Final rule. Federal Register 86, no. 213 (November 8): 61874-62026.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2019. ESRD prospective payment system claims-based monitoring program. Baltimore, MD: CMS.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2015. Medicare program; end-stage renal disease prospective payment system, and quality incentive program. Final rule. Federal Register 80, no. 215 (November 16): 68967-69077.

Charnow, J. 2020. COVID-19 crisis could speed adoption of home dialysis. Renal \& Urology News, April 24.

DaVita. 2022. Annual report 2021. Denver, CO: DaVita.
DaVita. 2018. J. P. Morgan Healthcare Conference. Denver, CO: DaVita.

Freed, M., J. F. Biniek, A. Damico, et al. 2022. Medicare Advantage in 2022: Premiums, out-of-pocket limits, cost sharing, supplemental benefits, prior authorization, and star ratings. Washington, DC: Kaiser Family Foundation. https://www.kff.org/ medicare/issue-brief/medicare-advantage-in-2022-premiums-out-of-pocket-limits-cost-sharing-supplemental-benefits-prior-authorization-and-star-ratings/.

Gupta, N., E. B. Taber-Hight, and B. W. Miller. 2021. Perceptions of home dialysis training and experience among US nephrology fellows. American Journal of Kidney Diseases 77, no. 5 (May): 713718 e711.

Jovanovich, A. 2020. Time to reconsider calcium-based phosphate binders in dialysis? A call for a well-designed randomized controlled trial. American Journal of Kidney Diseases 75, no. 3 (March): 453-455.

Kirchhoff, S. 2018. Medicare coverage of end-stage renal disease (ESRD). Washington, DC: Congressional Research Services. https://crsreports.congress.gov/product/pdf/R/R45290/4.

Landi, H. 2022. 3 kidney care providers-Fresenius Health Partners, Cricket Health and InterWell Health-plan to merge in deal valued at \$2.4B. Fierce Healthcare, March 21. https://www. fiercehealthcare.com/providers/three-kidney-care-providers-fresenius-health-partners-cricket-health-and-interwell-health.

Levin, A., S. Steven, A. Selina, et al. 2014. Canadian chronic kidney disease clinics: A national survey of structure, function and models of care. Canadian Journal of Kidney Health and Disease 1: 29.

Lin, E., X. S. Cheng, K. K. Chin, et al. 2017. Home dialysis in the prospective payment system era. Journal of the American Society of Nephrology 28, no. 10 (October): 2993-3004.

Marrufo, G., B. Negrusa, D. Ullman, et al. 2022. Comprehensive End-Stage Renal Disease Care (CEC) Model. Performance year 5 annual evaluation report. Washington, DC: The Lewin Group. https://innovation.cms.gov/data-and-reports/2022/cec-annrpt-py5.

Medicaid and CHIP Payment and Access Commission. 2015. Effects of Medicaid coverage of Medicare cost sharing on access to care. Washington, DC: MACPAC.

Medicare Payment Advisory Commission. 2022. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2020. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2016. Comment letter on CMS's proposed rule on the ESRD prospective payment system, July 29.

Medicare Payment Advisory Commission. 2015. Comment letter to CMS on the ESRD prospective payment system and the ESRD Quality Incentive Program, August 6.

Medicare Payment Advisory Commission. 2014. Comment letter to CMS on the end-stage renal disease prospective payment system and quality incentive program proposed rule, August 15.

Melanson, T. A., J. M. Hockenberry, L. Plantinga, et al. 2017. New kidney allocation system associated with increased rates of transplants among Black and Hispanic patients. Health Affairs 36, no. 6 (June 1): 1078-1085.

Ogata, H., M. Fukagawa, H. Hirakata, et al. 2021. Effect of treating hyperphosphatemia with lanthanum carbonate vs calcium carbonate on cardiovascular events in patients with chronic kidney disease undergoing hemodialysis: The LANDMARK randomized clinical trial. JAMA 325, no. 19 (May 18): 1946-1954.

Pravoverov, L. V., S. Zheng, R. Parikh, et al. 2019. Trends associated with large-scale expansion of peritoneal dialysis within an integrated care delivery model. JAMA Internal Medicine 179, no. 11 (November 1): 1537.

Purnell, T. S., X. Luo, L. A. Cooper, et al. 2018. Association of race and ethnicity with live donor kidney transplantation in the United States from 1995 to 2014. JAMA 319, no. 1 (January 2): 49-61.

United States Renal Data System, National Institute of Diabetes and Digestive and Kidney Diseases. 2022. USRDS 2022 annual data report. Bethesda, MD: NIDDK.

Walker, D. R., G. W. Inglese, J. A. Sloand, et al. 2010. Dialysis facility and patient characteristics associated with utilization of home dialysis. Clinical Journal of the American Society of Nephrology 5, no. 9 (September): 1649-1654.

C H A P TER

## 

## Skilled nursing facility services



## C H A P TER

## Skilled nursing facility services

## Chapter summary

Medicare covers short-term skilled nursing and rehabilitation services for beneficiaries in skilled nursing facilities (SNFs) after an inpatient hospital stay. In 2021, about 14,700 SNFs furnished about 1.7 million Medicarecovered stays to 1.2 million fee-for-service (FFS) beneficiaries ( 3.4 percent of Medicare's FFS beneficiaries). In that year, Medicare FFS spending on SNF services was $\$ 28.5$ billion. Most SNFs are also certified as nursing homes, which furnish long-term care services not covered by Medicare. Owing to federal policies to support SNFs during the coronavirus public health emergency (PHE) and the implementation of Medicare's new casemix system, SNFs' aggregate financial performance under Medicare was robust in 2021, despite occupancy that has been slow to rebound and ongoing staffing pressures.

## Assessment of payment adequacy

Overall, our indicators of payment adequacy were positive; where indicators were mixed, it was generally due to the coronavirus pandemic rather than the adequacy of Medicare's payment rates.

Beneficiaries' access to care-Changes in the indicators of access in 2021 were mixed and reflect the impact of the coronavirus pandemic, not the

## In this chapter

- Are Medicare payments adequate in 2023?
- How should Medicare payments change in 2024 ?
- Medicaid trends
adequacy of Medicare's payments. FFS Medicare remains a preferred payer for SNFs.
- Capacity and supply of providers-In 2021, 88 percent of beneficiaries lived in a county with three or more SNFs or swing bed facilities (rural hospitals with beds that can serve as either SNF beds or acute care beds). Nationally, occupancy has not returned to prepandemic levels, which suggests there is excess capacity, but staffing shortages may constrain capacity for some facilities. Continued reduced occupancy also reflects the impact of the coronavirus pandemic rather than the adequacy of Medicare's payments.
- Volume of services-Between 2020 and 2021, Medicare-covered admissions per 1,000 FFS beneficiaries dropped 2.4 percent. Covered days per 1,000 FFS beneficiaries fell 3.7 percent because of a decrease in length of stay during the same period. Continued waiver of coverage rules during the PHE tempered the reductions in Medicare volume beginning in March 2020. Volume, too, declined because of the impact of the coronavirus pandemic, not the adequacy of Medicare payments.
- Medicare marginal profit-In 2021, Medicare marginal profit (an indicator of whether SNFs have an incentive to treat more Medicare beneficiaries) averaged 26 percent for freestanding facilities. This profit is a strong positive indicator of beneficiary access to SNF care, though factors other than the level of payment (such as bed availability or staffing shortages) could challenge access.

Quality of care-In 2021, the mean facility risk-adjusted rate of successful discharge to the community from SNFs was 43.5 percent, and the mean facility risk-adjusted rate of hospitalizations was 13.1 percent. The pandemic and PHErelated policies confound our measurement and assessment of trends in our quality measures.

Providers' access to capital-The number of nursing facility transactions in 2021 was lower than it was before the pandemic, reflecting a lack of sellers rather than a lack of investor interest. In 2021, the average price per bed increased to a near record level. In 2021, the all-payer total margin-reflecting all payers (including managed care, Medicaid, Medicare, and private insurers) and all lines of business (such as skilled and long-term care, hospice, ancillary services, home health care, and investment income)-was 3.4 percent, which was higher than recent, prepandemic averages. The all-payer margin increased during the pandemic because of funding that nursing homes received during the PHE and
changes in Medicare and Medicaid payments. Without pandemic-related funds, the all-payer margin was -1.5 percent.

Medicare payments and providers' costs-Between 2020 and 2021, Medicare's aggregate FFS spending on SNF services increased 0.5 percent to $\$ 28.5$ billion, despite a reduction in covered SNF days. Payments per day increased over 3 percent, while costs per day grew 4 percent. The Medicare margin for freestanding SNFs was 17.2 percent in 2021. Margins varied greatly across facilities, reflecting differences in costs per day, economies of scale, and cost growth. The 2021 Medicare margin for relatively efficient SNFs was 22 percent. We project an aggregate SNF margin of 10 percent for 2023.

## How should Medicare payment rates change in 2024?

While the effects of the pandemic on beneficiaries and nursing home staff have been devastating, the combination of federal policies and the implementation of the new case-mix system resulted in improved financial performance for SNFs. Medicare's payments need to be reduced to more closely align aggregate payments with aggregate costs. The Commission recommends that, for fiscal year 2024, the Congress reduce the 2023 Medicare base payment rates for skilled nursing facilities by 3 percent.

## Medicaid trends

As required by the Affordable Care Act of 2010, we report on Medicaid use and spending and non-Medicare (private-payer and Medicaid) margins. Medicaid finances the majority of long-term care services provided in nursing homes, and some state programs also cover the copayments on SNF care for beneficiaries who are dually eligible for Medicare and Medicaid and who stay more than 20 days in a SNF. Between 2020 and 2021, the number of Medicaidcertified facilities declined less than 1 percent, to about 14,600. Spending was $\$ 38.4$ billion in 2021, 3.5 percent less than in 2020. The average non-Medicare margin (which includes all payers, PHE-related funds, and all lines of business except FFS Medicare SNF services) was 0.1 percent, an increase over 2020.

## Background

Skilled nursing facilities (SNFs) provide short-term skilled nursing care and rehabilitation services such as physical and occupational therapy and speechlanguage pathology services. ${ }^{1}$ In 2021, 1.2 million Medicare fee-for-service (FFS) beneficiaries (3.4 percent of Medicare Part A FFS beneficiaries) used SNF services at least once for a total of about 1.7 million stays. ${ }^{2}$ The Medicare program spent $\$ 28.5$ billion on SNF services in 2021 (about 14 percent of FFS Part A spending) (Boards of Trustees 2022, Office of the Actuary 2022b). ${ }^{3}$ Medicare's median payment per day was $\$ 556$, and its median payment per stay was $\$ 23,797$.

## Medicare coverage

Medicare covers up to 100 days of SNF care per spell of illness after a medically necessary inpatient hospital stay of at least three days. ${ }^{4}$ (CMS temporarily waived the three-day hospital-stay requirement and other payment policies during the coronavirus public health emergency (PHE), as discussed below. ${ }^{5}$ For beneficiaries who qualify for SNF care, Medicare pays 100 percent of the payment for the first 20 days. Beginning with day 21 , beneficiaries are responsible for copayments through day 100 of the covered stay. In 2023, the copayment is $\$ 200$ per day. To qualify for Medicare coverage, a beneficiary must require daily skilled nursing or rehabilitation services. ${ }^{6}$ In October 2019, CMS implemented a new case-mix system, the Patient-Driven Payment Model (PDPM), discussed in the text box, pp. 210-211.

## FFS Medicare accounts for a small share of most nursing facilities' total patient days

FFS Medicare-covered SNF days typically account for a small share of a facility's total patient days. Longterm care services, which are less intensive, typically make up the bulk of a facility's business; Medicaid pays for most of this care. ${ }^{7}$ In freestanding facilities in 2021, Medicare made up 10 percent of facility days compared with 63 percent for Medicaid. Given Medicare's relatively high payment rates, the program made up a larger share of facility revenue ( 16 percent) on average. Medicare's shares of days and revenues were consistent between 2020 and 2021 and higher than in 2019, in part due to the temporary waiver of the three-day hospital stay requirement that increased Medicare coverage for stays that otherwise would have been covered by
other payers and in part due to Medicare's payment increases, as discussed below.

SNFs are overwhelmingly freestanding, and the majority are for profit (Table 7-1, p. 208). In 2021, 97 percent of facilities were freestanding, and they accounted for 97 percent of Medicare stays and 98 percent of spending. Seventy-two percent of providers were for profit. Rural facilities make up the minority of providers, stays, and spending.

Freestanding SNFs vary by size. In 2021, the median SNF had 100 beds, while 10 percent of facilities had 175 or more beds and 10 percent of facilities had 50 beds or fewer. Nonprofit facilities and rural facilities are generally smaller than for-profit and urban facilities. The majority of small facilities (under 50 beds) are in metropolitan areas (Medicare Payment Advisory Commission 2021b). ${ }^{8}$

The SNF sector is fragmented and characterized by independent providers and regional chains. Of the largest 50 operators, most are privately held. The 10 largest chains accounted for about 11 percent of SNFs in 2022. However, common ownership can be difficult to identify among this largely privately owned sector. Nursing facilities may have complex organizational structures with multiple investor owners. They may also have separate operating companies and asset and property companies, which may have common ownership. A recent paper estimated that about 12 percent of nursing facilities are owned by real estate investment trusts (REITs), which are corporate entities that own real estate and lease it back to the health care provider, who is responsible for rent, maintenance, insurance, and taxes (Bruch et al. 2022). Though they are not unique to this sector, complex ownership structures in the nursing facility sector can obscure common ownership of facilities and the profitability of a nursing home across all owners and related parties (Harrington et al. 2021).

## The second year of the coronavirus pandemic saw vaccine rollout and continuation of Medicare's PHE-related payment policies

Our analysis of Medicare beneficiaries' SNF utilization, quality of care, and providers' costs and payments in this chapter relies largely on data from 2021, the second year of the coronavirus pandemic and PHE-related policies. That year saw the rollout of vaccinations, and

## Freestanding SNFs and for-profit SNFs accounted for the majority of facilities, Medicare stays, and Medicare spending in 2021

| Type of SNF | Facilities | Medicare-covered stays | Medicare spending |
| :--- | :---: | :---: | :---: |
| Total number | 14,720 | $7,689,000$ | $\$ 24.3$ billion |
| Freestanding | $97 \%$ | $97 \%$ | $98 \%$ |
| Hospital based | 3 | 3 | 2 |
| Urban | 73 | 84 | 85 |
| Rural | 27 | 16 | 14 |
| For profit | 72 | 74 | 77 |
| Nonprofit | 23 | 23 | 20 |
| Government | 5 | 3 | 3 |

Note: SNF (skilled nursing facility). Totals may not sum to 100 percent due to rounding and missing values. The spending amount included here is lower than that reported by the Office of the Actuary, and the count of SNFs is slightly lower than what is reported in the Certification and Survey Provider Enhanced Reporting data from CMS's Survey and Certification QCOR online reporting system. Facilities, stays, and spending reported for 2020 in our March 2022 Report to the Congress were undercounts because an error in the Provider of Services file led to their exclusion. These exclusions of observations in 2020 did not materially affect the proportions of facilities, stays, or spending by SNF type reported in the table.

Source: MedPAC analysis of the Provider of Services and Medicare Provider Analysis and Review files for 2021.
nursing facility residents and staff were among the first to be vaccinated in the winter of 2020 to 2021. As of the week ending January 1, 2023, an average of 86 percent of nursing facility residents and staff per facility had received their primary vaccination; 51 percent of residents and 22.4 percent of staff were up to date with vaccines (i.e., had received the bivalent booster) (Centers for Medicare \& Medicaid Services 2022a). ${ }^{9}$ Up-to-date vaccination rates, particularly among staff, vary widely by state. Among facilities reporting vaccination data for the week ending January 1, 2023, the average percentage of current staff up to date with the coronavirus disease 2019 (COVID-19) vaccine ranged from a low of 11 percent to a high of 46 percent (Centers for Medicare \& Medicaid Services 2022a).

The effects of the pandemic have been devastating to nursing facility residents and staff. As of the week ending January 1, 2023, about 1.46 million resident COVID-19 cases and more than 162,000 COVID-19-related deaths had been confirmed (Centers for Medicare \& Medicaid Services 2022a). ${ }^{10}$ Among staff, 1.49 million cases and more than 2,900 COVID-19related deaths were confirmed (Centers for Medicare \& Medicaid Services 2022a). After the rollout of vaccines
in early 2021, COVID-19 mortality rates among nursing facility residents and staff declined sharply, but facility occupancy and staffing continued to be affected.

Facility volume and employment in the sector began to increase in 2022 but remained below prepandemic levels nationally, although rebounds in occupancy have varied (see pp. 210-211). Slow-to-return demand is likely due to several pandemic-related factors, including continued avoidance of the setting, mortality due to COVID-19 among the aged and disabled populations that would otherwise be receiving care in a nursing facility, and remote work increasing the availability of informal caregivers. Nevertheless, industry analysts point to the aging U.S. population in coming years as a reason to expect that demand for nursing facilities will increase, though perhaps not to prepandemic levels (Ensign Group 2021, Kauffman 2022).

Federal policies implemented in 2020 to help SNFs manage during the pandemic PHE remained in place in 2021 and 2022. The waived three-day hospitalstay requirement allowed facilities to treat long-stay residents who required skilled care without a preceding hospitalization, referred to as "skilling in place," and
allowed admissions directly from the community if beneficiaries met the other coverage requirements. CMS also allowed a one-time extension of the benefit period (for an additional 100 days) for certain beneficiaries. ${ }^{11}$ In fiscal year 2021, 27 percent of stays were admitted with a PHE-related waiver, compared with 17 percent in 2020 (Centers for Medicare \& Medicaid Services 2022b). In both years, the majority of waiver stays were the result of the hospital-stay waiver (Centers for Medicare \& Medicaid Services 2022b). The temporary policies are scheduled to end when the coronavirus PHE expires (currently slated for May 11, 2023).

## Are Medicare payments adequate in 2023?

To examine the adequacy of Medicare's FFS payments, we analyze beneficiaries' access to care (including the supply of providers and volume of services), quality of care, providers' access to capital, Medicare FFS payments in relation to costs to treat Medicare beneficiaries, and changes in payments and costs. We also compare the characteristics of relatively efficient SNFs with other SNFs. Overall, our indicators of payment adequacy were positive; where indicators were mixed, it was generally due to the coronavirus pandemic rather than the adequacy of Medicare's payment rates.

## Beneficiaries' access to care: Indicators were consistent with secular trends and were not related to the adequacy of Medicare payments

We examine the supply of providers, changes in service use, and whether providers have a financial incentive to expand the number of Medicare beneficiaries they serve. During the PHE, beneficiary access has been especially affected by the local markets' COVID-19 conditions, hospital referral patterns, staffing shortages, and SNF admitting policies.

## SNF supply declined slightly in 2021

The number of SNFs participating in the Medicare program in 2022 declined less than 1 percent to 14,923. In calendar year 2021, 175 SNFs terminated participation in the Medicare program, up from 136 in 2020 but below the 212 SNFs that terminated participation in 2019. In 2022, 74 SNFs stopped
participating in Medicare between January and October. Of those, all but 10 closed at their own initiative (i.e., their participation was not terminated by the program). During the same period, 14 new facilities opened, 12 of which were for profit. While the PHE may have contributed, other factors also contributed to the decline in the number of SNFs, such as patients' preference for receiving care in non-SNF settings when possible, low Medicaid payment rates, the lower (than FFS Medicare) use of SNFs by Medicare Advantage (MA) plans and alternative payment models (APMs), and overexpansion of the SNF supply (in states that do not have certificate-of-need laws). In 2021, nonprofit facilities comprised a disproportionate number of the terminations. Terminations can create opportunities for future industry consolidation. In the SNF industry, consolidations more commonly occur at the regional or state level than at the national level because information about potential referring hospitals, state regulations, and Medicaid policies are essential elements for successful nursing home operations. A recent analysis of detailed SNF ownership data as of September 2022 found that most geographic markets (defined as hospital referral regions) for SNF services have had low levels of concentration as measured by the Herfindahl-Hirschman Index (Welch et al. 2022).

In 2021, 88 percent of beneficiaries lived in counties with three or more SNFs or swing bed facilities (rural hospitals with beds that can serve as either SNF beds or acute care hospital beds). In 2021, 5.7 percent of beneficiaries lived in counties with no or only one SNF or swing bed facility, a slight increase from 2020, when it was 5 percent. If a closure occurs in these counties, beneficiaries who live there might find it more difficult to obtain SNF care. In any county, SNF conversions from multiple-occupancy to single-occupancy rooms for infection control can also reduce capacity (Stulick 2021).

## Lower occupancy rates indicate bed availability for most beneficiaries, but staffing shortages may limit access

Before the PHE, between 2010 and 2019, median occupancy rates for freestanding SNFs were high, though declining (from 88 percent to 85 percent, based on cost report data), and varied by state and facility. National average occupancy fell dramatically early in the pandemic and continued to fall throughout 2020. In early January 2021, national average occupancy hit a pandemic-period low of about 67 percent (National

## Effects of the new case-mix system

Medicare uses a prospective payment system (PPS) to pay skilled nursing facilities (SNFs) for each day of service. ${ }^{12}$ CMS implemented a new SNF PPS case-mix system, the Patient-Driven Payment Model (PDPM), on October 1, 2019. ${ }^{13}$ The PDPM was intended to address two problems with the prior case-mix system. First, therapy payments under the prior case-mix system were based primarily on the amount of therapy provided to a patient. The PDPM does not determine therapy payments based on the amount of therapy provided but instead uses patient characteristics. Second, the PDPM was designed to better target payments for nontherapy ancillary items such as drugs. Because it considers more comorbidities and other measures of medical complexity than the prior case-mix system, the new system is able to recognize and pay for the higher costs associated with medically complex patients.

The PDPM adjusts payments for patient characteristics, including the primary reason for treatment, prior surgery, comorbidities, functional status, cognitive status, swallowing and nutritional status, depression, and receipt of special treatments (such as ventilator care). Payments for therapy are determined separately for each therapy disciplinephysical therapy (PT), occupational therapy (OT), and speech-language pathology (SLP) services-and are based on patient characteristics and, for PT and OT, on function scores. To ensure that individual therapy remains the dominant modality, group and concurrent therapies together are limited to 25 percent of total therapy minutes per discipline.

Less than four months into the implementation of the PDPM, the coronavirus public health emergency (PHE) was declared. To examine changes in coded clinical characteristics and therapy provision under the PDPM, we analyzed claims by month of admission for the period 2019 through March 2022. Results were analyzed separately for the populations with coronavirus disease 2019 (COVID-19) at admission or those admitted under the PHE-related waiver policies and the populations without these characteristics.

Data from monthly claims for SNF cases show how the PDPM and COVID-19 affected characteristics of SNF users and service delivery. For example, coding of depression, swallowing disorder, and mechanically altered diet increased in October 2019 when the PDPM was implemented. This change is consistent with the incentives under the PDPM: These conditions were explicitly recognized in the PDPM as factors that increase payment. Around April 2020 (the first peak of COVID-19 cases), December 2020 (the second peak), and January 2022 (the third peak of COVID-19 cases, driven by the Omicron variant), we observed increases in ventilator, respirator, and tracheostomy cases and coding of isolation or quarantine for active infectious disease, likely due to increased prevalence of COVID-19 infections.

Changes in patterns of therapy use reflected the PDPM incentives and COVID-19 surges. Under the prior case-mix system, payments were based primarily on the amount of therapy provided to a patient. Under the PDPM, the share of stays receiving OT and PT declined around the PDPM
(continued next page)

Investment Center for Seniors Housing \& Care 2022). ${ }^{14}$ Since that nadir, national average occupancy rates have slowly increased-reaching nearly 75 percent in September 2022-but have remained below prepandemic levels (National Investment Center for Seniors Housing \& Care 2022). Occupancy rates and
patterns of decline and recovery during the pandemic vary widely across states-reflecting both baseline supply differences and geographic differences in the timing of outbreaks. While occupancy remains below prepandemic levels nationally, it varies by facility: 25 percent of SNFs had occupancy of 88 percent or

Effects of the new case-mix system (cont.)

FIGURE
T-1
Number of therapy minutes per stay, January 2019-March 2022

Note: SNF (skilled nursing facility), PT (physical therapy), OT (occupational therapy), SLP (speech-language pathology). Cases exclude those with a COVID-19 diagnosis at admission and those admitted under a public health emergency waiver. The number of therapy minutes is the average therapy minutes per stay for all therapy modes combined (individual, concurrent, and group therapy).

Source: Acumen LLC analysis for MedPAC of data from Medicare SNF claims and the Minimum Data Set for 2019 through March 2022.
implementation, while the share of cases receiving SLP services increased, likely due to explicit payment for SLP services under the PDPM. The shares of cases receiving PT or OT rebounded quickly to pre-PDPM levels, though with dips in months coinciding with COVID-19 surges (April 2020, December 2020, and January 2022). While the share of stays receiving any PT or OT were similar pre-PDPM and post-PDPM implementation, the
number of PT and OT minutes per stay dropped as the incentives to provide more therapy in order to receive higher payments were eliminated under the PDPM, as shown in Figure 7-1. We found that after the PDPM's implementation, the share of stays with improved function between admission and discharge and the magnitude of that change was fairly consistent (data not shown).
higher as of August 2022. A bed may not be available in a facility with a high occupancy rate, particularly if a patient requires special services.

SNFs have faced staffing shortages during the pandemic that could affect access. While we do not have data on the extent to which workforce shortages may have affected access to SNF care, SNFs have but less than in the immediate prepandemic period

|  | Prepandemic |  |  | Pandemic |  | Average annual change |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Volume measure | 2017 | 2018 | 2019 | 2020 | 2021 | $\begin{gathered} 2017-2019 \end{gathered}$ | $\begin{gathered} 2020- \\ 2021 \end{gathered}$ |
| Covered admissions per 1,000 FFS beneficiaries | 64.6 | 62.5 | 59.5 | 54.8 | 53.5 | -4.0\% | -2.4\% |
| Covered days per 1,000 FFS beneficiaries | 1,623 | 1,559 | 1,475 | 1,453 | 1,399 | -4.7 | -3.7 |
| Covered days per admission | 25.1 | 25.0 | 24.8 | 26.5 | 26.2 | -0.6 | -7.3 |

Note: SNF (skilled nursing facility), FFS (fee-for-service). Data are for the calendar year and include 50 states and the District of Columbia. Average annual changes are calculated using unrounded values and then rounded to the nearest tenth.

Source: Centers for Medicare \& Medicaid Services 2022c
reported limiting admissions and hospitals have reported discharge delays and difficulty transitioning patients to SNFs (Stulick 2022b). The peak of reported SNF staffing shortages coincided with the outbreak of the Omicron variant in early 2022. In January 2022, about 28 percent of SNFs reported a shortage of nursing staff (NIC Map Vision 2022b). As of mid-October 2022, about 20 percent of SNFs reported such shortages (National Investment Center for Seniors Housing \& Care 2022). One analysis of staffing and occupancy found that cohorts of SNFs with higher occupancy have lower shares of properties experiencing shortages of nursing staff (NIC Map Vision 2022b).

The coronavirus pandemic has exacerbated longstanding staffing issues for SNFs. Economy-wide wage pressure and ongoing labor market shortages mean that SNFs are competing with other sectors and industries for scarce labor (NIC Map Vision 2022b). Despite proportionally large wage increases relative to other sectors (e.g., hospitals, physician offices), SNF employment saw larger declines during the first two years of the pandemic than other sectors. SNF employment has also been slower to rebound and remains below prepandemic levels (Cantor et al. 2022). Rates of employment changes varied geographically, with one study finding that employment declines among SNFs were more severe in counties with high COVID-19 burdens (Cantor et al. 2022). (See discussion of Bureau of Labor Statistics (BLS) data on nursing facility wages and employment in 2021 and 2022, p. 218.)

## Between 2020 and 2021, SNF admissions and days decreased but by less than the annual changes between 2017 and 2019

SNF use for Medicare beneficiaries has been declining for years. Expanded enrollment in MA has contributed to lower SNF use because MA enrollees tend to have shorter SNF stays or avoid the setting altogether. Similarly, alternative payment models create financial incentives for at-risk entities to lower spending for post-acute care (PAC) services. This could result in less FFS SNF use if providers participating in at-risk entities encourage beneficiaries to use lower-cost settings or shorten SNF stays. Lower FFS use is not a symptom of inadequate Medicare payment rates for SNF care. Medicare's rates are high relative to those of other payers and Medicare is a preferred payer, although some providers may avoid Medicare beneficiaries who are likely to require long stays and exhaust their Medicare benefits.

The coronavirus pandemic compounded secular trends in declining FFS SNF use. In 2020, as the number of hospital discharges dropped due to the pandemic, the share of beneficiaries discharged from a hospital to a SNF also declined, while the share going to home health agencies increased. In 2021, the share of discharges going to SNFs recovered somewhat but did not reach prepandemic levels. In January and February 2020, immediately prior to the initial coronavirus outbreak, the share of hospital discharges going to SNFs was 19 percent; in October 2021, the share was 17
percent. Meanwhile, the overall share of discharges to any PAC setting remained consistent during 2020 and 2021. It remains to be seen whether SNFs will recover their prepandemic share of discharges or whether some of the apparent postdischarge substitution of home health for SNF care will be permanent.

To control for the change in FFS enrollment, we examine service use per 1,000 FFS beneficiaries. Between 2020 and 2021, SNF admissions per 1,000 FFS beneficiaries dropped 2.4 percent (Table 7-2). Because stays were slightly shorter in 2021 than 2020 (data not shown), covered days declined more (3.7 percent). However, the decline in admissions and days per 1,000 FFS beneficiaries between 2020 and 2021 was less than the annual decline between 2017 and 2019.

In 2021, among SNF stays following an inpatient hospital stay, the top five most common diagnosis related groups (DRGs) accounted for nearly a quarter of stays. The top DRG in 2021 ( 9.5 percent of stays)-septicemia or severe sepsis without mechanical ventilation for more than 96 hours with major complication or comorbidity-was the same as in 2020 and 2019. Respiratory infection and inflammation with major complication or comorbidity was the only DRG in the top five with an increase in the absolute number of cases in 2021, consistent with the ongoing effects of the coronavirus pandemic. This DRG became the second most common ( 5.8 percent of stays). The share of orthopedic DRGs continued to decline in 2021, with major hip and knee joint replacement or reattachment of lower extremity without major complication or comorbidity falling out of the top five most common DRGs.

Compared with their shares of all FFS enrollees, White and Black beneficiaries were more likely to use SNF services, while Hispanic and Asian/Pacific Islander beneficiaries were less likely. Beneficiaries who received the Part D low-income subsidy, which includes dual-eligible beneficiaries, were more likely to use SNFs relative to their share of all FFS enrollees. Other researchers have found that, compared with other SNF users, Black, Hispanic, and dual-eligible beneficiaries are more likely to use lower-quality facilities (Sharma et al. 2020, Zuckerman et al. 2019).

## Medicare marginal profit: A measure of the attractiveness of Medicare patients

Another measure of access is whether providers have a financial incentive to expand the number of Medicare
beneficiaries they serve. In considering whether to treat a patient, a provider with excess capacity compares the marginal revenue it will receive (i.e., the Medicare payment) with its marginal costs-that is, the costs that vary with volume. If Medicare payments are larger than the marginal costs of treating an additional beneficiary, a provider has a financial incentive to increase its volume of Medicare patients. In contrast, if payments do not cover the marginal costs, the provider may have a disincentive to care for Medicare beneficiaries. ${ }^{15}$

In 2021, the Medicare marginal profit was 26 percent, indicating that facilities with available beds had a strong incentive to admit Medicare patients. This high marginal profit is a strong positive indicator of beneficiary access to SNF care. However, despite providers' favorable incentive to treat Medicare beneficiaries, beneficiaries may continue to be reluctant to use SNF services if alternative sources of care are an option (e.g., if they qualify for care at an inpatient rehabilitation facility or long-term care hospital, or if they are able to receive home health care or outpatient services at home).

## Quality of care is difficult to assess during the pandemic

We evaluate quality of care in post-acute settings, including SNFs, using two measures: average risk-adjusted rates of successful discharge to the community and all-condition hospitalizations within a stay. Both measures are uniformly defined and risk adjusted across all PAC settings. ${ }^{16}$ A successful discharge to the community is a SNF stay that ends in a discharge to home with or without home health and does not experience an unplanned hospitalization or death in the next 30 days. ${ }^{17}$ The hospitalization measure captures all unplanned hospitalizations (admissions and readmissions) and outpatient observation stays that occur during the stay (beneficiaries who died during the SNF stay are excluded from the measure). Discharges to hospice and beneficiaries with the hospice benefit are excluded from the calculation of both measures.

In 2021, the mean facility risk-adjusted rate of successful discharge to the community from SNFs was 43.5 percent and the mean facility risk-adjusted rate of hospitalizations was 13.1 percent (Table 7-3, p. 214). We present these rates with the caveat that the pandemic and all-cause hospitalizations between 2017 and 2021

| Measure | Provider subgroup | Prepandemic |  |  | Pandemic |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 2017 | 2018 | 2019 | 2020 | 2021 |
| Successful discharge to the community | All SNFs | 44.4\% | 44.3\% | 44.8\% | 38.6\% | 43.5\% |
|  | For profit | 43.6 | 43.5 | 43.7 | 37.6 | 42.7 |
|  | Nonprofit | 47.6 | 47.4 | 48.0 | 42.5 | 46.6 |
|  | Freestanding | 44.0 | 44.0 | 44.4 | 38.2 | 43.1 |
|  | Hospital based | 53.8 | 52.8 | 53.6 | 48.2 | 53.0 |
| All-cause hospitalizations | All SNFs | 14.4\% | 14.1\% | 13.7\% | 14.2\% | 13.7\% |
|  | For profit | 14.9 | 14.6 | 14.2 | 14.7 | 13.5 |
|  | Nonprofit | 12.9 | 12.7 | 12.3 | 12.6 | 11.7 |
|  | Freestanding | 14.6 | 14.3 | 13.8 | 14.3 | 13.2 |
|  | Hospital based | 10.2 | 10.6 | 10.0 | 10.4 | 9.8 |

Note: SNF (skilled nursing facility). "Successful discharge to the community" includes beneficiaries discharged to the community (home with or without home health care) who did not have an unplanned hospitalization or die in the 30 days after discharge. The hospitalization measure captures all unplanned hospital admissions, readmissions, and outpatient observation stays that occur during the SNF stay. Providers with at least 60 stays in the year (the minimum count to meet a reliability of 0.7 ) were included in calculating the average facility rate. The "All SNFs" category includes the performance of government-owned SNFs, which are not displayed separately in the table.

Source: MedPAC analysis of SNF claims and linked inpatient hospital stays from 2017 through 2021 for fee-for-service beneficiaries.
and PHE-related policies confound our measurement and assessment of trends in our quality measures for several reasons. First, capacity constraints of acute care hospitals or PAC providers, increased mortality due to COVID-19 infections, and increased or earlier discharges to avoid the setting could affect the measures during the pandemic. Second, the PHErelated waiver of the three-day hospital stay could result in long-stay patients making up a greater share of SNF cases, which could affect the rates of both measures. Third, risk adjustment for these measures does not include COVID-19, so our models may not adequately adjust for the acuity and mix of patients receiving care during the pandemic.

Unrelated to the pandemic, the implementation of the interrupted stay policy in 2020 could also affect our quality measures. Under the interrupted stay policy, if a beneficiary under a Medicare-covered SNF stay leaves
the facility (say, for a hospitalization) and returns to that same SNF no later than the third calendar day after they left, that entire period is considered a single SNF stay. Prior to this policy change, this would have been considered two SNF stays. Decreasing the size of the denominator could affect a facility's rate of successful discharge to the community and hospitalization.

## Providers' access to capital remains adequate

Access to capital allows SNFs to maintain, modernize, and expand their facilities. The vast majority of SNFs are part of nursing facilities. Therefore, in assessing SNFs' access to capital, we look at the availability of capital for nursing homes. Because Medicare makes up a minority share of most nursing homes' revenues, access to capital generally reflects factors other than the adequacy of Medicare's payments.

The number of publicly announced SNF transactions fell during the pandemic

|  | Prepandemic |  | Pandemic |  |
| :---: | :---: | :---: | :---: | :---: |
|  | 2018 | 2019 | 2020 | 2021 |
| Number of transactions | 206 | 186 | 150 | 139 |
| Number of facilities | 351 | 365 | 265 | 258 |
| Number of beds | 43,550 | 42,043 | 31,900 | 31,300 |

Note: SNF (skilled nursing facility).
Source: Irving Levin and Associates Senior Care Acquisition Report, 2019-2022

Capital in this sector is less likely to finance new construction than to update facilities or finance purchases of existing facilities because of state certificate-of-need (CON) laws that limit bed supply. Most states ( 35 states plus the District of Columbia) have CON laws, though 22 states suspended these laws during the PHE (National Conference of State Legislatures 2021).

In 2021, the number of SNF transactions dropped to 139 , compared with 150 in 2020 , but the number of facilities and beds involved in these deals were similar in both years (Table 7-4) (Irving Levin Associates Inc. 2022)..$^{18}$ The average price per bed rose to $\$ 98,000$, which was 23 percent higher than the 2020 average price and just below the record high set in 2016 (data not shown) (Irving Levin Associates Inc. 2022). Many potential acquirers competing for fewer sales pushed prices up relative to 2020 . Although there were clear differences in the SNF prices by occupancy rate, as well as by age of the facility, prices were up across all types of SNFs in 2021. There was a 15 percent increase in the median price per bed $(\$ 83,700)$ in 2021 compared to 2020, although this median price was below several prepandemic years (Irving Levin Associates Inc. 2022). Increases in the average price paid for SNFs for each facility age group and the narrowing of the price per bed differential between low- and high-occupancy SNFs show the willingness of buyers to enter the sector or increase their scale (Irving Levin Associates Inc. 2022). In 2022, high per bed values could have enticed
more owners to sell, but distressed assets entering the market could have depressed average prices (Irving Levin Associates Inc. 2022). During the first 10 months of 2022, the number of transactions was up (168) compared to 2021 (2022 data not shown).

In 2022, despite lingering low occupancy rates, labor challenges, chronically low payments from Medicaid, and recent beneficiary reluctance to use SNFs, there continues to be buyer interest in the setting (Bush 2022b). Buyer demand is fueled by an aging population, many of whom have complex care needs that cannot be treated at home; improved Medicaid funding; and opportunities created by underperforming facilities. Improved Medicaid funding (see a more detailed discussion, pp. 227-228) will enable some operators to make capital improvements to convert rooms to single occupancy and to add specialty services (such as dialysis services) (Stulick 2022c, Zorn 2022). Omega Health Investors and LTC Properties reported active asset management in 2022, buying and selling facilities to fit their market strategies (Seeking Alpha 2022a, Seeking Alpha 2022b). After its busiest acquisition quarter in years (third quarter of 2022), the Ensign Group indicated that it planned to slow down its growth in the fourth quarter of 2022 and continue to grow in 2023 to take advantage of the "attractive" acquisition market (Ensign Group 2022). One analyst noted that nonprofit owners are more likely to adjust their size (for example, by converting multipleoccupancy rooms to single-occupancy rooms) rather
than exit the market entirely (Bush 2022a). Historically, buyers tend to be regional, given the premium on knowing the market, potential hospital and health system partners, and a state's regulatory environment.

The Department of Housing and Urban Development (HUD) remains an important lending source for this sector. Section 232 loans help finance nursing homes by providing lenders with protection against losses if borrowers default on their mortgage loans. Activity was down in 2022 compared with 2021. In 2022, HUD financed 269 projects (compared with 328 in 2021), with the aggregate insured amount totaling $\$ 3.0$ billion (compared with $\$ 3.9$ billion in 2021) (Department of Housing and Urban Development 2022). In addition to HUD and commercial bank loans, a minority of facilities access capital via private equity (ATI Advisory 2022). The extensive regulations (which vary by state) and the housing dimension of SNF care can influence which investors enter the lending space (ATI Advisory 2022).

Although the total all-payer margins are slim (as discussed below) and occupancy rates may never fully rebound to prepandemic levels, the SNF sector remains attractive for investors because of demand stemming from the aging population and the setting's relatively lower costs compared with other institutional PAC such as inpatient rehabilitation facilities. Any reluctance to invest in this setting does not reflect the adequacy of Medicare's FFS SNF payments: Medicare remains a preferred payer.

## All-payer total margins increased in 2021

In 2021, the estimated all-payer total margin for nursing homes (reflecting all lines of business and all payers) was 3.4 percent, up from 3.1 percent in 2020. All-payer total margins in 2020 and 2021 were higher than in 2019, when the margin was 0.6 percent. In 2021, 40 percent of SNFs had negative total margins, up from 34 percent in 2020 but fewer than in 2019 ( 45 percent). Higher all-payer total margins during the pandemic were largely due to the general and targeted funding that nursing homes received during the PHE, the changes in Medicare policies, and the increases in Medicaid rates made by many states, though some of these are temporary.

Facilities are required to report the coronavirus PHE funds in Medicare cost reports, and some of these funds are included in the 2021 total margin. ${ }^{19}$ Federal
funds improved providers' bottom lines and may have averted the closing of some financially distressed providers. In aggregate, without these additional funds, total margins in 2021 would have been about - 1.5 percent.

Because the all-payer total margin includes Medicaidfunded long-term care (the nursing home portion of the business), the overall financial performance of this setting is heavily influenced by state policies regarding the level of Medicaid payments and the ease of entry into a market (e.g., whether a certificate of need is required). The industry has long argued that high Medicare margins are needed to subsidize the low payments from Medicaid. The Commission contends that Medicare payments should not subsidize payments from Medicaid or other payers (see text box on subsidizing other payers' payments).

## Medicare payments and providers' costs: Medicare margins remained high in 2021

In 2021, Medicare FFS spending on SNF services increased 0.5 percent despite a decline in volume. The aggregate Medicare margin for freestanding SNFs was 17.2 percent, a slight decline compared with 2020. Medicare margins for individual facilities varied considerably across providers, as they have in prior years. SNFs reported that payment rates from MA plans were considerably lower than Medicare's FFS rates, suggesting that many SNFs are willing to accept these rates to treat beneficiaries.

## Trends in FFS spending and cost growth

For fiscal year 2021, CMS estimates that Medicare FFS spending for SNF services was $\$ 28.5$ billion, a 0.5 percent increase from 2020 (Figure 7-2, p. 218) (Office of the Actuary 2022b). Aggregate spending increased slightly despite volume declines during the PHE and the secular downward trends that reflect expanded enrollment in MA (whose spending on SNF care is not included in FFS spending data) and participation in APMs, which create incentives for entities to lower SNF use.

Program spending in 2021 reflects the PHE-related policies that were first implemented in 2020 to give SNFs flexibility to care for patients during the pandemic. The Congress temporarily (from May 2020 to March 2022) suspended the 2 percent sequester

Medicare's skilled nursing facility payments should not subsidize payments from Medicaid or other payers

Almost all skilled nursing facilities (SNFs) are also certified as nursing facilities, which typically provide long-term care services that are not covered by the Medicare program. These long-term care services, commonly provided to Medicare beneficiaries but not covered by the Medicare program, typically make up the bulk of a nursing facility's business. Although Medicare pays for a relatively small share of nursing facility care on average, Medicare payments to SNFs, financed by taxpayer contributions to the Part A Trust Fund, subsidize payments from other payers, most notably Medicaid. High Medicare payments also likely subsidize payments from private payers. The Commission has long held that such crosssubsidization via Medicare's prospective payment system (PPS) rates is poor policy for several reasons (listed below).

## Medicare subsidization of other payers through

 Medicare's PPS payments results in poorly targeted subsidies. Facilities with high shares of Medicare beneficiary days receive the most in "subsidies" from higher Medicare payments, while facilities with low shares of Medicare beneficiary days-potentially the facilities with the greatest financial need-receive the least. One recent study found that nursing facilities that concentrate on Medicare-covered post-acute care serve fewer Black and Hispanic patients and patients on Medicaid than facilities that do not concentrate on Medicare-covered services(Werner et al. 2021). This disparity demonstrates the poor targeting of Medicare-funded subsidies through PPS payments.

## Medicare's subsidization does not differentiate among states with relatively high and low Medicaid payments. If Medicare raises or maintains its high

 payment levels, states could be encouraged to further reduce their Medicaid payments and, in turn, create pressure to raise Medicare rates even more.
## Higher Medicare payment rates could create

 undesirable incentives for providers. Medicare's higher payment rates could encourage providers to select patients based on payer source or to rehospitalize patients who are dually eligible for Medicare and Medicaid coverage to qualify them for a Medicare-covered stay at a higher payment rate. Higher Medicare payment rates could also encourage providers to differentially provide Medicare-covered services or to enter certain markets to maximize utilization of the highly paid services, which could in turn limit access to non-Medicare-covered services for some patients.
## Maintaining or raising Medicare's payments

 to subsidize other payers exerts pressure on the already fiscally challenged Medicare program. If policymakers wish to provide additional support to certain nursing facilities, they could do so more effectively through a separate, targeted policy.that otherwise would have lowered payment rates. The temporary suspension of the sequestration increased Medicare payments by about 1.8 percent. ${ }^{20}$ In addition, the PHE-related policies (waiver of the three-day hospital-stay requirement and the effective extension of the benefit period) continued to shift spending onto Medicare for beneficiaries whose SNF care would normally not have been covered by the program.

Program spending in 2021 also reflects unintended increases in payment resulting from the implementation of the PDPM case-mix system starting in October 2019. CMS estimated that the new casemix system, though intended to be budget neutral, increased payments compared with what would have been paid under the old case-mix system (Centers for Medicare \& Medicaid Services 2022b). While CMS identified this overpayment in its rulemaking for fiscal

After steadily declining since 2015, total FFS program spending on SNF services increased during the coronavirus pandemic


Note: FFS (fee-for-service), SNF (skilled nursing facility). Fiscal yearincurred spending (that excludes cost sharing) is shown.

Source: Office of the Actuary 2022b and Boards of Trustees 2022.
year 2022, it opted not to make an adjustment to fiscal year 2022 payments. In rulemaking for fiscal year 2023, CMS estimated that PDPM implementation caused an unintentional 4.6 percent increase in payments in 2020 and announced in the final rule that PDPM parity adjustment would be achieved over two years with a payment reduction of 2.3 percent in fiscal years 2023 and 2024 (Centers for Medicare \& Medicaid Services 2022b).

Between 2020 and 2021, the average payment per day increased 3 percent, while costs per day increased 4 percent. The relatively high cost growth reflects fewer covered days over which to spread fixed costs, an increase in routine costs per day, and a small decline in ancillary costs per day compared with 2020, consistent with declining therapy minutes under the PDPM. Higher routine costs per day reflect an increase in labor costs that may be driven by signing bonuses, use of contract labor, and a greater decline in lower-paid
nursing aide staff relative to higher-paid nursing staff. Data from BLS show a 7 percent increase in weekly wages for the nursing facility sector between January and December of 2021 (Bureau of Labor Statistics 2022b, Bureau of Labor Statistics 2022c). ${ }^{21}$ However, during this same period, BLS data show a 5 percent decline in the number of employees in the sector (Bureau of Labor Statistics 2022a). Data for the first seven months of 2022 show that the sector added employees (Bureau of Labor Statistics 2022a). While the reduction in employment in the sector has been dramatic since the start of the pandemic, it had been declining for several years prepandemic as volume declined.

Consistent with past years, cost growth and level of costs varied by ownership. In 2021, nonprofit providers reported larger increases in cost per day compared with for-profit providers ( 4.7 percent compared with 3.7 percent). Nonprofit providers had 17 percent higher costs per day than for-profit providers, in part because they are smaller and have a lower average daily census, so they cannot achieve the same economies of scale as larger for-profit facilities.

## SNF aggregate Medicare margins remain high

The aggregate Medicare margin is a key measure of the adequacy of the program's payments because it compares Medicare's FFS payments with providers' costs to treat FFS beneficiaries. Policy changes tied to the PHE that affected SNFs' costs, volume, and revenue in 2020 persisted into 2021. In addition, the implementation of the new case-mix system starting in October 2019 has also affected providers' payments and changed incentives to provide therapy services.

In 2021, the aggregate Medicare margin for freestanding SNFs, not including federal relief funds, was 17.2 percent (Figure 7-3). In our March 2022 report to the Congress, we reported an aggregate Medicare margin for freestanding SNFs in 2020 of 16.5 percent (Medicare Payment Advisory Commission 2022). Using a more complete sample of 2020 cost reports available this year, we calculated a higher 2020 Medicare margin of 17.8 percent. We do not typically update prior years' estimates, but we report this recalculation here because it affects the direction of the change between 2020 and 2021. Compared with the Medicare margin using a more complete sample of SNF cost reports for


Note: SNF (skilled nursing facility). Medicare margin is calculated as the sum of Medicare payments minus the sum of Medicare costs, divided by Medicare payments. The margins for 2020 and 2021 exclude pandemic-related federal relief funds.

Source: MedPAC analysis of freestanding SNF cost reports, 2000-2021.

2020, the 2021 Medicare margin for freestanding SNFs represents a small decline, consistent with the changes we observe in costs and payments per day between 2020 and 2021.

For the 22nd consecutive year, the Medicare margin for freestanding SNFs was above 10 percent. Medicare margins have increased for the two years of the pandemic for which we have data. Allocating a portion of the relief funds reported on 2021 cost reports to payments based on Medicare's share of total facility days, we estimate that the Medicare margin for freestanding SNFs was 19.6 percent, assuming these funds did not affect providers' costs. ${ }^{22}$

Hospital-based SNFs (which account for 3 percent of program spending on SNFs) continued to have substantial negative Medicare margins. In 2021, the Medicare margin for hospital-based SNFs was
-40 percent (compared with -50 percent in 2020 and -68 percent in 2019). Hospital administrators consider their SNF units in the context of the hospital's overall financial performance and mission. Hospitals with SNFs can lower their inpatient lengths of stay by transferring patients to their own SNF beds, thus making inpatient beds available to treat additional inpatients.

## Aggregate Medicare margins varied widely in 2021

Aggregate Medicare margins for freestanding SNFs varied widely across SNFs: One-quarter of SNFs had Medicare margins that were 27.9 percent or higher, and one-quarter had margins that were 3.8 percent or lower (Table 7-5, p. 220). The differences in aggregate Medicare margins between for-profit and nonprofit facilities have persisted for years. The disparity reflects differences in costs per day and, to a lesser extent, payments. Compared with for-profit facilities,
$\left.\begin{array}{lrl}\hline \text { TA B L E } \\ \text { I-5 }\end{array} \quad \begin{array}{c}\text { Variation in freestanding } \\ \text { SNF aggregate Medicare }\end{array}\right\}$

[^14]nonprofit facilities were smaller (fewer beds and lower volume) and they had lower payments per day, higher costs per day, and higher growth in costs per day between 2020 and 2021. Consistent with several years before the pandemic, urban SNFs had higher aggregate Medicare margins than rural or frontier SNFs in 2021. The difference between urban and rural SNFs is a result of lower cost growth and, to a lesser extent, higher payment growth for urban SNFs between 2020 and 2021. While rural SNFs are smaller on average than
urban SNFs, the majority of facilities with fewer than 50 beds are urban, and small rural SNFs have, on average, higher margins than small urban SNFs. Differences in aggregate Medicare margins partly reflect the economies of scale that larger SNFs achieve. Facilities with 20 to 50 beds had lower average Medicare margins compared with facilities with 100 to 199 beds. And low-volume facilities (bottom quintile of total facility days) had lower average Medicare margins than high-volume (top quintile of days) facilities. SNFs with the lowest cost per day (the bottom 25th percentile of the distribution of cost per day) had Medicare margins that were more than 30 percentage points higher than SNFs with the highest (in the top 25th percentile) cost per day.

As we have reported in previous years, SNFs in the top quartile of the distribution of Medicare margins appear to pursue cost and revenue strategies (Medicare Payment Advisory Commission 2020). Compared with SNFs in the lowest Medicare margin quartile, high-margin SNFs have lower standardized daily total, routine, and ancillary costs and lower costs per discharge. Further, high-margin SNFs have, on average, fewer nursing hours per resident day, adjusted for facility case mix. Economies of scale also affect the difference in financial performance. In 2021, highmargin SNFs had higher daily census on average and higher occupancy rates. High-margin SNFs also had, on average, a higher share of Medicare-covered SNF days attributable to beneficiaries receiving the Part D lowincome subsidy and higher shares of total Medicaidcovered facility days. Facilities with a higher Medicaid mix may keep their costs lower, in part through lower staffing, contributing to their higher Medicare margins.

## Relatively efficient SNFs further illustrate that Medicare's payments are too high

The Commission is required by the Medicare Prescription Drug, Improvement, and Modernization Act of 2003 to consider the costs associated with efficient providers. The Commission follows two principles when selecting a set of relatively efficient providers. The providers must do relatively well on both cost and quality metrics and their performances must be consistent (see text box for details on identifying relatively efficient SNFs). The Commission's approach is to examine those providers that meet a pre-established set of criteria. It does not establish a

## Identifying relatively efficient skilled nursing facilities

We defined relatively efficient skilled nursing facilities (SNFs) as those with relatively low costs per day and relatively good quality of care for three years in a row, from 2017 through 2019, for this report. The cost per day was calculated using cost report data and was adjusted for differences in case mix (using the nursing component relative weights) and area wages. To assess quality, we examined risk-adjusted rates of successful discharge to the community and hospitalizations during the SNF stay. To meet a reliability standard of 0.7 , only facilities with at least 60 stays were included in the quality measures. To be included in the relatively efficient group, a SNF had to be in the best third of the distribution of at least one measure and not in the bottom third of any measure for three consecutive years. Another criterion was that SNFs not be part of CMS's Special Focus Facility Initiative for any portion of time covered by the definition (2017 through 2019). ${ }^{23}$

The method we use to assess performance attempts to limit incorrect conclusions about performance based on poor data. Using three years of data to categorize SNFs as efficient (rather than just one year) avoids categorizing providers based on random variation or on one "unusual" year. In addition, by first assigning a SNF to the "relatively efficient" group or the "other" group and then examining the group's performance in the next year, we avoid having a facility's poor data affect both its own categorization and the assessment of the group's performance. Thus, a SNF's erroneous data could result in its inaccurate assignment to a group, but because the group's performance is assessed with data from later years, these "bad" data would not directly affect the assessment of the group's performance.
set share (for example, 10 percent) of providers to be considered relatively efficient and then define criteria to meet that pool size. Then the Commission reports performance of SNFs during the year of performance (this year, 2021), comparing efficient providers with other providers.

In a typical year, the Commission informs its update discussion by examining the adequacy of payments for those providers that perform relatively well on cost and quality measures. However, this year the cost and quality measures are sufficiently affected by the pandemic (and its variations over time and geographically) that it may be hard to draw meaningful conclusions from the analysis. We report our findings with the broad caveat that performance in 2021 may have little to do with relative efficiency. To avoid using data from 2020, we defined efficient providers using prepandemic data.

Our analysis included 4,317 SNFs that had quality and cost report information for the 2017 to 2019 baseline and the 2021 performance period and at least 60 stays each year. Nine percent of the SNFs met the criteria we use to define relatively efficient providers. Compared with other SNFs in 2021, relatively efficient SNFs had community discharge rates that were 14 percent higher and hospitalization rates that were 14 percent lower (Table 7-6, p. 222). The median standardized cost per day for efficient SNFs was 7 percent lower than the median for other SNFs. The Medicare margin (excluding the federal relief funds) for these SNFs was 22 percent, indicating that although these providers were relatively efficient, the Medicare program could get better value for its purchases if its payments were lower. The high margin for these providers underscores the need for the program to lower its payments to more closely align with the costs of care. Measures of economies of

# Financial performance of relatively efficient SNFs was a combination of lower cost per day and higher revenue per day, 2021 

| Performance measure / subgroup | Type of SNF |  | Ratio of relatively efficient to other SNFs |
| :---: | :---: | :---: | :---: |
|  | Relatively efficient | Other SNFs |  |
| Rate of successful discharge to the community | 51\% | 44\% | 1.14 |
| Hospitalization rate | 11\% | 13\% | 0.86 |
| Standardized cost per day | \$473 | \$510 | 0.93 |
| Medicare revenue per day | \$634 | \$579 | 1.10 |
| Medicare margin | 22.0\% | 15.5\% | N/A |
| All-payer total margin | 4.4\% | 3.0\% | N/A |
| Facility case-mix index | 1.64 | 1.65 | 0.99 |
| Medicare average length of stay | 30 days | 35 days | 0.85 |
| Occupancy rate | 76\% | 75\% | 1.01 |
| Average daily census | 85 | 86 | 0.98 |
| Medicaid share of facility days | 57\% | 58\% | 0.99 |
| Share urban | 90\% | 86\% | N/A |
| Share for profit | 77\% | 70\% | N/A |
| Share nonprofit | 18\% | 26\% | N/A |

Note: SNF (skilled nursing facility), N/A (not applicable). To be included in the analysis, the SNF had to have quality and cost report information for 2017 to 2019 and 2021 and a minimum of 60 stays a year. The number of freestanding facilities included in the analysis was 4,317 , of which 403 (or 9.3 percent) were identified as "relatively efficient" based on their cost per day and two quality measures (community discharge and readmission rates) between 2017 and 2019. Relatively efficient SNFs were those in the best third of the distribution for one measure and not in the worst third for any measure in each of three years and were not a facility under "special focus" by CMS. Costs per day and per discharge were standardized for differences in case mix (using the nursing component relative weights) and wages. Quality measures were rates of risk-adjusted successful discharge to the community (higher rates are better) and hospitalization during the SNF stay (lower rates are better). Table shows the medians for the measure. The federal relief funds are included in the all-payer total margin but excluded from the aggregate Medicare margin.

Source: MedPAC analysis of quality measures and Medicare cost report data for 2017-2019 and 2021.
scale (average daily census and occupancy) were similar for the relatively efficient and other SNFs, most likely because the higher minimum-stay requirements for the quality measures exclude small providers from the analysis. Relatively efficient SNFs were more likely to be for profit and were found in 38 states. Despite the effects of the pandemic, these results are consistent with findings from prepandemic years.

## FFS payments for SNF care are considerably higher than MA payments

The comparison of Medicare FFS and MA payments also indicates that Medicare's payments under the

SNF PPS are too high. (We use "MA" as shorthand for all managed care payments since MA makes up the majority of rates reported as "managed care payments.") We compared Medicare FFS and MA payments for two companies (Diversicare and the Ensign Group) with publicly available information on their revenues per day. ${ }^{24}$ We also included the average payments per day reported by the National Investment Center (NIC) for Seniors Housing \& Care for 1,226 SNFs in 2021 (NIC Map Vision 2022a). For the admittedly limited snapshot in the NIC survey, Medicare's FFS per day payments were 25 percent higher than MA rates (Table 7-7). We do not know whether the lower average daily payment by MA

# Comparison of SNFs' Medicare fee-for-service and managed care daily payments, 2021 

| Company | Medicare payment |  | Ratio of FFS to MA payment |
| :---: | :---: | :---: | :---: |
|  | FFS | Managed care (MA) |  |
| Diversicare | \$500 | \$414 | 1.21 |
| Ensign Group | 687 | 498 | 1.38 |
| National Investment Center for |  |  |  |
| Seniors Housing \& Care | 567 | 453 | 1.25 |

Note: SNF (skilled nursing facility), FFS (fee-for-service), MA (Medicare Advantage). MA makes up the majority of managed care payments. Data for Diversicare are from the first nine months of 2021. Data for the Ensign Group and from the National Investment Center for Seniors Housing \& Care are for calendar year 2021. Diversicare had 61 facilities. The Ensign Group had 245 facilities. The information for the National Investment Center for Seniors Housing \& Care shows the average rates for a survey of 1,226 SNFs.

Source: Diversicare 10-Q for the third quarter of 2021 is available from the SEC website (DiversiCare 2021). The Ensign Group annual report for 2021 is available from the company's website (Ensign Group 2021). National Investment Center for Seniors Housing \& Care data are from the Annual 2021 NIC Map Vision Skilled Nursing Data Report (NIC Map Vision 2022a).
plans reflects differences in service intensity, lower payments for the same service, or some combination. It is possible that companies with SNF holdings differ in their ability to negotiate high payment rates from MA plans. We also do not know how these rates compare with rates paid to other SNF chains and independent facilities.

We compared broad patient characteristics (average age and risk scores) for beneficiaries enrolled in FFS and MA plans who used SNFs and concluded that those differences are unlikely to explain the magnitude of the differences between FFS payments and payments typically made by MA plans. Compared with FFS beneficiaries, MA enrollees were, on average, 10 months younger and had similar risk scores. FFS Medicare beneficiaries may want a broader selection of providers if they have underlying health conditions. The payment differential between MA and FFS SNF rates indicates that facilities accept lower payments to treat MA enrollees who are not much different from FFS beneficiaries. Some publicly traded PAC firms with SNF holdings report seeking managed care patients as a business strategy, indicating that the MA rates are attractive.

## Projected aggregate Medicare margin for 2023

To project the aggregate fiscal year 2023 Medicare margin for freestanding SNFs, the Commission considered the relationship between SNF costs and Medicare payments in 2021 as a starting point. The potential impact of the coronavirus pandemic and PHE-related policies on providers' volume, costs, and revenues makes projections during the pandemic especially uncertain. Our projections include assumptions about pandemic-related costs that we expect to remain for the foreseeable future and therefore should be incorporated into the update.

To estimate costs, we used CMS's Office of the Actuary's (OACT's) estimates of the market baskets for 2022 and 2023 (based on a September 2022 forecast). These market baskets indicate how SNFs' costs will change in those years, including the costs of labor. OACT estimates that the market basket increase was 6.2 percent in fiscal year 2022 and will be 4.2 percent in fiscal year 2023. The market basket estimates reflect the costs associated with higher wages and economywide inflation. The estimates of cost growth could be low or high depending on how actual costs differ from the projections.

To estimate payments in 2022 and 2023, we assumed that payment rates each year would increase by the updates specified in the final rules for those years, 1.2 percent and 2.7 percent, respectively (Table 7-8). ${ }^{25}$ The updates for 2022 and 2023 reflect an adjustment for forecast error. ${ }^{26}$ In 2022, CMS applied a forecast error correction of -0.8 percent to correct for an overestimate of the market basket used in the 2020 final rule. In 2023, CMS applied a forecast error correction of 1.5 percent to correct for an underestimate of the market basket used in the 2021 final rule. Finally, we included the impact of a parity adjustment of -2.3 percent that CMS applied in 2023 to correct for overpayment resulting from the implementation of the new case-mix system in 2020. We did not consider additional changes in payments due to potential changes in patient acuity or the recording of patient characteristics that would raise payments.

The projected aggregate Medicare margin for 2023 for freestanding SNFs is 10 percent. We expect the margin to drop in 2023 because cost growth is likely to exceed the payment updates, the sequester was reinstated in April 2022, and CMS will adjust the case-mix indices to reduce half of the unintended increase in payments resulting from the implementation of the new case-mix system starting in 2023. Different assumptions about costs, case mix, and revenues will raise or lower the projection.

## How should Medicare payments change in 2024?

In considering how payments should change for 2024, we note that current law is expected to increase payment rates by 2.6 percent in 2024 (an estimated market basket increase of 2.7 percent minus a productivity adjustment of 0.1 percent). CMS will revise its estimates before the publication of the final rule, expected before August 1, 2023. CMS has also announced in the 2023 final rule that it intends to reduce payments in 2024 by 2.3 percent to correct for unintentional increases in payment resulting from the implementation of the PDPM payment system. In addition, while it is not required by law, CMS corrects for overestimates and underestimates
of the SNF market basket. If CMS determines that it underestimated the market basket by more or less than 0.5 percentage point in fiscal year 2022, it will apply the correction in fiscal year 2024. Currently, the correction would result in an increase to account for the 3.5 percentage point underestimate. On net, if all of these changes are implemented, the update would be a 3.8 percent increase in 2024 relative to 2023.

The Medicare margin in 2023 will depend on many factors. On the payment side, the update to the payment rate may not accurately capture any real changes in patient acuity or the recording of patient characteristics that raise payments (with no effect on costs). Costs may increase more or less than the market basket estimates, in part depending on the extent to which providers adjust their costs based on changes in volume.

The combination of the new case-mix system, provider relief funds, and the temporary federal policies resulted in robust financial performance in 2021. Medicare margins were high, and total margins increased. The high FFS payments relative to rates paid by at least some MA plans suggest that many facilities are willing to accept much lower rates to treat Medicare beneficiaries. FFS Medicare is a preferred payer for SNFs. The Medicare margin indicates that the SNF PPS exerts too little pressure on providers to control costs. Indicators of access to care and quality continue to reflect the impact of the pandemic in 2021. Furthermore, transaction activity in the industry suggests that buyers see continued financial opportunities in this setting.

## RECOMMENDATION 7

For fiscal year 2024, the Congress should reduce the 2023 Medicare base payment rates for skilled nursing facilities by 3 percent.

## RATIONALE 7

The level of Medicare's payments indicates that a reduction is needed to better align aggregate payments to aggregate costs. The financial performance of SNFs has not deteriorated during the pandemic. Quite the opposite: Despite reduced volume, and staffing and wage pressure, the aggregate SNF Medicare margins were higher during the pandemic than before, due in part to a new case-

|  | 2021 | 2022 | 2023 |
| :---: | :---: | :---: | :---: |
| Updates based on forecasts |  |  |  |
| Market basket | 2.2\% | 2.7\% | 3.9\% |
| Productivity | 0.0 | -0.7 | -0.3 |
| Forecast error correction | - | -0.8 | 1.5 |
| Parity adjustment | - | - | -2.3 |
| Total | 2.2 | 1.2 | 2.7 |
| Actual market basket |  |  |  |
| Market basket | 3.7 | 6.2* | 4.2* |
| Forecast error | 1.5 | 3.5* | 0.3* |

Note: SNF (skilled nursing facility), TBD (to be determined). CMS makes a forecast error correction when its estimate of the market basket differs from the actual market basket by at least 0.5 percentage point (either too high or too low). This correction is lagged two years. *Actual market basket for 2022 and 2023 (and related forecast error) will be updated again prior to fiscal year 2024 and 2025 rulemaking.

Source: MedPAC analysis of SNF final rule for fiscal year 2021-2023 and CMS Office of the Actuary forecast from September 2022.
mix system that inadvertently raised payments and the suspension of the sequester. Though a slight decline compared with 2020, the 17.2 percent margin in 2021 was robust. With a projected aggregate Medicare margin in 2023 of 10 percent, payments will remain more than adequate to ensure beneficiary access to SNF care even if payments are lowered.

Although the overall Medicare financial performance of SNFs is good and projected to remain so, the share of providers that operated at a loss in 2021, as well as the large difference in performances between nonprofit and for-profit SNFs, indicate that not all providers do well financially. However, poor performances reflect, in part, an inability to control cost growth or achieve economies of scale, or both. In the interest of responsible fiscal stewardship of the Medicare program, it is not sound policy to raise payments for all providers to address the poor performance of some. Nor does the Commission support differential updates for providers based on ownership status or geographic location. Instead, the Congress could consider two approaches that would redistribute Medicare's payments. First, the Congress could direct Medicare to redistribute
payments to support select facilities that are necessary for beneficiaries' access to care. Second, as the Commission recommended in June 2021, the Congress should revamp the value-based purchasing program, including larger incentive payments, which would direct funds to facilities that perform well on quality and resource use measures (Medicare Payment Advisory Commission 2021a).

## IMPLICATIONS 7

## Spending

- Current law is expected to increase payment rates by 2.6 percent in 2024 . This recommendation would lower program spending relative to current law by over $\$ 2$ billion in one year and over $\$ 10$ billion over five years.


## Beneficiary and provider

- We do not expect this recommendation to have adverse effects on beneficiaries' access to care. Given the current level of payments, we do not expect the recommendation to affect providers' willingness or ability to care for Medicare beneficiaries.

|  | $\mathbf{2 0 1 8}$ | $\mathbf{2 0 1 9}$ | $\mathbf{2 0 2 0}$ | $\mathbf{2 0 2 1}$ | $\mathbf{2 0 2 2}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Number of facilities | 15,040 | 14,965 | 14,840 | 14,756 | 14,611 |

Note: The 2022 number is through October; it does not include data from the full calendar year. Counts include dually certified skilled nursing facilities/nursing facilities, distinct-part skilled nursing facilities/nursing facilities, and nursing facilities.

Source: Certification and Survey Provider Enhanced Reporting data from CMS's Survey and Certification Quality, Certification and Oversight Reports (QCOR) online reporting system.

## Medicaid trends

Section 2801 of the Affordable Care Act of 2010 requires the Commission to examine spending, use, and financial performance trends in the Medicaid program for providers with a significant portion of revenues or services associated with Medicaid. We report on nursing home spending trends for Medicaid and financial performance for non-Medicare payers. (Medicaid revenues and costs are not reported in the Medicare cost reports.) In a joint publication with the Medicaid and CHIP Payment Access Commission, we reported on characteristics, service use, and spending for dual-eligible beneficiaries (Medicare Payment Advisory Commission and the Medicaid and CHIP Payment and Access Commission 2022).

Medicaid covers nursing home care, which Medicare does not, and Medicaid pays a portion of the skilled nursing care furnished to beneficiaries who are dually eligible for Medicaid and Medicare. Some Medicaid programs pay dual-eligible beneficiaries' Medicare copayments that begin on day 21 of a SNF stay and for any skilled care for beneficiaries who exhaust their Part A coverage (that is, if their Part A stay exceeds 100 days).

## Count of Medicaid-certified nursing homes

In 2022, 14,611 Medicaid nursing homes were active through October, down from 14,756 in 2021 (Table 7-9). We do not know whether the providers that terminated participation in the Medicaid program remained open
but no longer accepted Medicaid patients, closed, or were purchased by another entity and remained open. Between January and October 2022, 14 providers opened and 70 terminated (data not shown). The share of facilities that stopped participating in Medicaid varied by state. States accounting for the highest share of terminations during the period included Minnesota ( 9 percent); Texas ( 7 percent); and Iowa, Massachusetts, Ohio, and Wisconsin (6 percent each). Historically, factors contributing to these facilities' fiscal pressures include the lower use of these facilities by beneficiaries in MA plans and alternative payment models, shifts away from institutional care toward home- and community-based care, overexpansion of supply in states with no certificate-of-need laws (such as Texas), and low Medicaid rates. For example, media reports highlighting recent nursing home closures in Montana and South Dakota have cited the role that low Medicaid rates and their impact on hiring and retaining staff have played in facility closures (Hall 2022a, Hall 2022b).

## Spending

In 2021, Medicaid FFS spending on Medicaid-funded (combined state and federal funds) nursing home services totaled $\$ 38.4$ billion, as shown in Figure 7-4 (Office of the Actuary 2022a). This spending dropped an average of 1.5 percent per year between 2018 and 2020 and 3.5 percent between 2020 and 2021. The larger decline in spending in 2021 could reflect Medicaid spending shifting to Medicare due to the waiver of the three-day stay requirement. As of 2021, 24 states operated Medicaid managed care for long-term


Note: $\quad$ Spending does not include managed care spending on nursing homes.
Source: Office of the Actuary 2022a.
services and supports (Medicaid and CHIP Payment and Access Commission 2021).

## In 2021, states increased their Medicaid rates to nursing homes; in 2022, some states significantly raised rates and tied them to staffing improvements

An analysis of Medicaid rate-setting trends in fiscal year 2021 in the 50 states and the District of Columbia found that 8 states froze or reduced rates paid to nursing homes while 39 states increased nursing facility rates, and 4 states did not report data (Gifford et al. 2021). In 2020, this analysis found that 37 states increased their rates. The Families First Coronavirus Response Act (FFCRA), enacted on March 18, 2020, provided a temporary 6.2 percentage point increase in the Federal Medical Assistance Percentage (FMAP), retroactive to January 1, 2020, through the end of $2022 .{ }^{27}$ Many states spent at least a portion of this FMAP increase to raise nursing home rates.

A few states have significantly and permanently (not tied to temporary enhanced FMAP or the PHE) increased Medicaid nursing home funding in their 2022-2023 state budgets. Pennsylvania and Nebraska increased the base rate to nursing homes by 17.5 percent and 15 percent respectively (Stulick 2022a, Zorn 2022). Illinois increased funding by $\$ 700$ million (Reiland 2022, Stulick 2022a). Maryland increased reimbursement rates by 8 percent (Maryland Department of Health 2022). California increased Medicaid rates by 4 percent (California State Assembly 2022).

Some states have tied recent nursing facility rate increases to improving direct care staffing. A report from November 2022 found that at least 19 states were implementing strategies to address direct care worker wages through reporting, enforcement policies, or both (National Governors Association 2022). For example, Florida, Illinois, and North Carolina made

## 7-10

All-payer total and non-Medicare SNF margins increased in 2021

| Type of margin | $\mathbf{2 0 1 7}$ | $\mathbf{2 0 1 8}$ | $\mathbf{2 0 1 9}$ | $\mathbf{2 0 2 0}$ | $\mathbf{2 0 2 1}$ |
| :--- | :--- | :--- | :--- | :--- | :--- |
| All-payer total margin | $0.6 \%$ | $-0.3 \%$ | $0.6 \%$ | $3.0 \%$ | $3.4 \%$ |
| Non-Medicare margin | -2.4 | -3.2 | -2.2 | -0.3 | 0.1 |

Note: SNF (skilled nursing facility). "All-payer total margin" includes the revenues and costs associated with all payers and all lines of business and includes the federal relief funds disbursed in 2021. "Non-Medicare margin" includes the revenues and costs associated with Medicaid and private payers for all lines of business.

Source: MedPAC analysis of Medicare freestanding skilled nursing facility cost reports for 2017 to 2021.
staff wage increases a condition of receiving increased Medicaid reimbursement rates (Musumeci et al. 2022, Reiland 2022). Florida and North Carolina specified that the minimum wage of nursing home staff must be increased to $\$ 15$ an hour as a condition of the rate increase. Massachusetts and North Carolina directed nursing homes to dedicate most of their rate increase ( 75 percent to 80 percent) toward improving direct care staff wages (Musumeci et al. 2022).

States also continue to use provider taxes to raise federal matching funds. In 2022, 45 states and the District of Columbia levied provider taxes on nursing homes to increase federal matching funds (Gifford et al. 2021). The augmented federal funding may be split with the nursing homes to increase their payments. ${ }^{28}$

## All-payer total and non-Medicare margins in nursing homes in 2021

All-payer total margins reflect all payers (including all FFS and managed care funds from Medicare, Medicaid, and private insurers across all lines of business, such as nursing home care, hospice care, ancillary services, home health care, and investment income). In 2021, the all-payer total margin for freestanding providers was 3.4 percent (Table 7-10). The improvement in overall performance reflects the remaining pandemic-related relief funds, PHE-related policy changes, temporary pandemic-related increases in Medicaid payment rates in many states, and higher payments under Medicare's new case-mix system. Since 2000, except for 2018 (when the total margin was negative), the all-payer total margin has ranged from 0.4 percent to 3.8 percent (not all years shown).

In 2021, all-payer total margins varied considerably. The median was 3 percent; 25 percent of nursing homes had total margins of -5.7 percent or lower, and 25 percent of nursing homes had total margins of 10.6 percent or higher; 40 percent of SNFs had negative total margins. While sizable and greater than in 2020, the share of SNFs with negative margins was smaller than in 2019, when 45 percent of SNFs had negative margins. Non-Medicare margins reflect the profitability of all services except FFS Medicarecovered SNF services. The aggregate non-Medicare margin in 2020 was 0.1 percent.

## Endnotes

1 For services to be covered, the SNF must meet Medicare's requirements of participation and agree to accept Medicare's payment rates. Medicare's requirements relate to many aspects of staffing and care delivery, such as requiring a registered nurse in the facility for 8 consecutive hours per day and licensed nurse coverage 24 hours a day, providing physical and occupational therapy services and speechlanguage pathology services as delineated in each patient's plan of care, and providing or arranging for physician services 24 hours a day in case of an emergency.

2 Throughout this chapter, beneficiary refers to an individual whose SNF stay is paid for by Medicare Part A. Some beneficiaries who no longer qualify for SNF Medicare coverage may remain in the facility to receive long-term care services, which are not covered by Medicare. During long-term care stays, beneficiaries may receive care such as physician services, outpatient therapy services, and prescription drugs that is paid for separately under the Part B and Part D benefits. Services furnished outside the Part Acovered stay are not paid under the SNF prospective payment system and are not considered in this chapter. Except where specifically noted, this chapter examines fee-for-service Medicare spending and service use and excludes services and spending for SNF services furnished to beneficiaries enrolled in Medicare Advantage plans. Some beneficiaries also qualify for Medicaid and are referred to as dual-eligible beneficiaries.

3 Throughout this chapter, we use the term "FFS Medicare" as equivalent to the CMS term "Original Medicare."

4 A spell of illness ends when there has been a period of 60 consecutive days during which the beneficiary was neither a hospital nor a SNF inpatient. Coverage for another 100 days does not begin until a beneficiary has not had hospital care or skilled care in a SNF for 60 consecutive days. Observation days and emergency room stays do not count toward the three-day hospital stay requirement.

5 Under Section 319 of the Public Health Services Act, the Secretary of Health and Human Services may determine that a disease or disorder presents a PHE or that a PHE-including significant outbreaks of infectious disease or bioterrorist attacks-otherwise exists. The Secretary first determined the existence of a coronavirus PHE, based on confirmed cases of coronavirus disease 2019 (COVID-19) in the United States, on January 31, 2020. At the time of publication, the coronavirus PHE had been renewed most recently on January 11, 2023.

6 Skilled services must be ordered by a physician, require the skills of technical or professional personnel, and be furnished directly by or under supervision of such personnel.

7 Almost all SNFs certified for Medicare patients, nearly 96 percent, are dually certified as nursing homes that provide long-term care services.

8 Rural counties are those not in or adjacent to metropolitan or micropolitan areas and are defined using Urban Influence Codes 11 and 12.

9 CMS mandated vaccines for health care workers, but the mandate does not include booster shots for nursing facilities and other providers that participate in Medicare or Medicaid. Although some states sued to challenge this rule, the Supreme Court allowed the mandate to take effect while those cases are resolved by the lower courts (Chidambaram and Musumeci 2022).

10 This value is an undercount because it does not include deaths and cases prior to May 2020.

11 The extended benefit applies only to beneficiaries who were delayed or prevented by the PHE from starting or completing the end of the current benefit period; that is, renewing the SNF benefit would have occurred under normal circumstances. Beneficiaries with continued need for skilled care unrelated to the PHE cannot renew their benefit.

12 The program pays separately for some services, including certain chemotherapy drugs, certain customized prosthetics, certain ambulance services, and radioisotope services. All physician services are paid separately under Part B.

13 Urban and rural facilities have separate base rates under the SNF PPS. Rural base rates are higher for physical therapy, occupational therapy, speech-language pathology services, and the non-case-mix (room and board) components; the urban base rates are higher for the nursing and nontherapy ancillary components. A description of the SNF PPS is found in SNF Payment Basics, available at https://www.medpac. gov/wp-content/uploads/2021/11/MedPAC_Payment_ Basics_22_SNF_FINAL_SEC.pdf.

14 Data published by the National Investment Center for Seniors Housing \& Care is derived from the Nursing Home COVID-19 Public File, as captured by the Centers for Disease Control and Prevention (CDC) and reported by CMS. Results include facilities that submitted data for the reporting week and passed the CDC's quality assurance checks. Results were calculated using a "same-store" methodology, which includes only facilities that reported in both comparison time periods (week over week). Facilities that did not provide total number of beds or occupied beds or where the occupied number of beds was greater than the total number of beds were
excluded (National Investment Center for Seniors Housing \& Care 2022).

15 If we approximate marginal cost as total Medicare costs minus fixed building and equipment costs, then marginal profit can be calculated as follows:

Marginal profit = (payments for Medicare services $-($ total Medicare costs - fixed building and equipment costs)) / Medicare payments

This comparison is a lower bound on the marginal profit because we do not consider any potential labor costs that are fixed.

16 The risk adjustment for the measure of successful discharge to the community includes age and sex of the beneficiary, end-stage renal disease (ESRD) and disability status for entitlement, principal diagnosis, comorbidities, length of the preceding hospital stay (if there was one), and a count of the hospitalizations during the preceding year. Risk adjusters for the hospitalization measure include primary diagnosis, comorbidities and severity of illness, special conditions (severe wounds, difficulty swallowing, and bowel incontinence), age and sex, disability and ESRD status, hospitalization in the previous month, days in the intensive care unit during a preceding hospitalization (if there was one), a count of the hospitalizations during the preceding year, and the provision of ventilator care during the PAC stay. Providers with at least 60 stays in the year, the minimum count to meet a reliability of 0.7 , were included in calculating the average facility rate.

17 In prior reports we characterized the successful discharge to community measure as inclusive of stays that end in a return to the nursing facility from which a beneficiary was admitted. However, Medicare-covered SNF stays that end in a discharge to a nursing home are not considered a discharge to the community in our measure. Consistent with our principle that measures should assess the quality of care provided to all Medicare SNF patients, we will consider ways to modify our measure to include nursing home residents who were successfully discharged to the nursing facility from which they were admitted.

18 Data are from the Senior Care Acquisition Report by Irving Levin and Associates (Irving Levin Associates Inc. 2022). The prices reported are based on arm's length transactions where a willing buyer and a willing seller agree on price with the property exposed to the market. Reported prices include the real estate and the business operations, including any licenses. A sale by a provider to a REIT that then leases the property back to the same provider is not considered to be arm's length. In contrast, a sale by a provider or owner to a

REIT that then leases the property to an unrelated third party is considered an arm's length sale.

19 Reporting PHE funds should include the Provider Relief Fund payments and Paycheck Protection Program loans that were booked as revenue and not returned.

20 Because the sequestration is not applied to beneficiary copayments, the reduction to SNF payments is slightly lower than 2 percent. Suspension of the full sequester amount was in effect from May 1, 2020, through March 31, 2022. Between April 1, 2022, and June 30, 2022, half of the full sequester amount was suspended. The full reinstatement of the sequester began on July 1, 2022.

21 BLS data capture changes in hours for employed staff and counts of employed staff. Those data do not account for wages or counts of contract labor. Using Payroll-Based Journal data, we found increased use of contract labor hours per resident day, although it is still a small share of overall labor in the sector.

22 General distribution of Provider Relief Fund payments, amounting to 2 percent of total revenues, aimed to help prevent, prepare for, and respond to the coronavirus outbreak and reimburse providers for lost revenues and health care-related expenses attributable to COVID-19. Nursing homes received these general-distribution funds and an additional $\$ 10$ billion in targeted funds. About half of the targeted funds were earmarked for infection control and for creating and maintaining a safe environment, and $\$ 2.25$ billion was slated for quality incentive payments (apart from the value-based purchasing program). The incentive funds were disbursed in multiple phases, some of which were captured on the 2021 cost reports. Using Medicare's share of revenues allocates a larger share of the PHE funds to Medicare than using Medicare's share of total days because Medicare's payments are substantially higher than payments from other payers. In this case, the estimate of the Medicare margin would be higher.

23 The Special Focus Facility Initiative is a program to stimulate improvements in the quality of care at nursing homes with a history of serious quality problems. The initiative targets homes with a pattern over three years of more frequent and more serious problems (including harm or injury to residents) detected in their annual facility surveys. Facilities that improve and maintain those improvements can "graduate" from the program. Providers that do not improve face civil monetary penalties (fines) and eventual termination from Medicare and Medicaid.

24 As of November 2021, Diversicare was no longer publicly traded. After being acquired by DAC Acquisition LLC in November 2021, it is privately held (Business Wire 2021).

25 The market basket estimate ( 2.7 percent) used to establish the 2022 update to payment rates was based on a June 2021 forecast. Since then, the estimate has been revised. The most recent estimate from a September 2022 forecast of the 2022 market basket is 6.2 percent. Consistent with policy precedent in this sector, any correction for under- or overestimate of the market basket by at least 0.5 percentage point in 2022 would be added to the update for fiscal year 2024.

26 CMS makes forecast error corrections when its estimate of the market basket differs from the actual market basket by at least 0.5 percentage point (either too high or too low).

27 FFCRA was enacted on March 18, 2020 (Pub. L. 116-127). Section 6008 provided a temporary 6.2 percentage point increase to each qualifying state's or territory's FMAP ("temporary FMAP increase") under Section 1905(b) of the Social Security Act. States must meet certain conditions to receive the temporary FMAP increase.

28 A provider tax works as follows: A state taxes all nursing homes and uses the collected amount to help finance the state's share of Medicaid funds. The provider tax increases the state's contribution, which in turn raises the federal matching funds. The augmented federal funds more than cover the cost of the provider tax revenue, which is returned to providers. The provider tax is limited to 6 percent of net patient revenues.

## References

ATI Advisory. 2022. Access to capital in the nursing home industry: A resource on the role of policy and implications for the future. Washington, DC: ATI Advisory. https://info. nic.org/hubfs/061422_ATI\ Advisory_Access\ to\  Capital\%20in\%20the\%20Nursing\%20Home\%20Industry\%20 Report_FINAL.pdf?hsCtaTracking=89b488a6-015e-4a9d-866b-978e5d048420\%7C90f89687-fe01-42bd-8f11-df962377227f.

Boards of Trustees, Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. 2022. 2022 annual report of the Boards of Trustees of the Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. Washington, DC: Boards of Trustees.

Bruch, J. D., T. Katz, T. Ramesh, et al. 2022. Trends in real estate investment trust ownership of US health care properties. JAMA Health Forum 3, no. 5 (May): e221012.

Bureau of Labor Statistics, Department of Labor. 2022a. Employment, hours, and earnings from the Current Employment Statistics survey (National) for NAICS 6321, all employees, thousands, nursing care facilities, seasonally adjusted. https:// data.bls.gov/cgi-bin/srgate.

Bureau of Labor Statistics, Department of Labor. 2022b. Employment, hours, and earnings from the Current Employment Statistics survey (National) for NAICS 6321, average hourly earnings of all employees, nursing care facilities, seasonally adjusted. https://data.bls.gov/cgi-bin/srgate.

Bureau of Labor Statistics, Department of Labor. 2022c. Employment, hours, and earnings from the Current Employment Statistics survey (National) for NAICS 6321, average weekly hours of all employees, nursing care facilities, seasonally adjusted. https://data.bls.gov/cgi-bin/srgate.

Bush, J. 2022a. Nursing beds continue to dwindle among large nonprofit providers. McKnight's Long-Term Care News, October 31. https://www.mcknights.com/news/nursing-beds-continue-to-dwindle-among-large-nonprofit-providers-lz200/.

Bush, J. 2022b. Nursing home bed prices approach \$100K even with sluggish occupancy. McKnight's Long-Term Care News, November 2. https://www.mcknights.com/news/ nursing-home-bed-prices-approach-100k-even-with-sluggishoccupancy/.

Business Wire. 2021. DAC Acquisition LLC completes acquisition of Diversicare Healthcare Services, Inc. November 19. https:// www.businesswire.com/news/home/20211119005689/en/ DAC-Acquisition-LLC-Completes-Acquisition-of-Diversicare-Healthcare-Services-Inc.

California State Assembly. 2022. California state budget 2022-23: Health and human services. https://www. ebudget.ca.gov/2022-23/pdf/Enacted/BudgetSummary/ HealthandHumanServices.pdf.

Cantor, J., C. Whaley, K. Simon, et al. 2022. U.S. health care workforce changes during the first and second years of the COVID-19 pandemic. JAMA Health Forum 3, vol. 2 (February 25): e215217.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022a. COVID-19 nursing home data. https://data.cms.gov/stories/s/COVID-19-Nursing-Home-Data/bkwz-xpvg.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022b. Medicare program; prospective payment system and consolidated billing for skilled nursing facilities; updates to the quality reporting program and valuebased purchasing program for federal fiscal year 2023; changes to the requirements for the Director of Food and Nutrition Services and physical environment requirements in long-term care facilities. Final rule. Federal Register 87, no. 148 (August 3): 47502-47618.

Centers for Medicare \& Medicaid Services, Office of Information Products and Data Analytics, Department of Health and Human Services. 2022c. Personal communication with Maria Diacogiannis, November 5.

Chidambaram, P., and M. Musumeci. 2022. Nursing facility staff vaccinations, boosters, and shortages after vaccination deadlines passed. San Francisco, CA: Kaiser Family Foundation. https:// www.kff.org/coronavirus-covid-19/issue-brief/nursing-facility-staff-vaccinations-boosters-and-shortages-after-vaccination-deadlines-passed/.

Department of Housing and Urban Development. 2022. FY 2022 summary statistics. https://view.officeapps.live.com/op/view. aspx?src=https\%3A\%2F\%2Fwww.hud.gov\%2Fsites\%2Fdfiles\%2 FHousing\%2Fdocuments\%2F232FY2022Statistics_09.30.2022_ v1.xlsx\&wdOrigin=BROWSELINK.

Diversicare. 2021. Quarterly report (Form 10-Q). Filing submitted to the Securities and Exchange Commission. https://sec.report/ Document/0001628280-21-022552/.

Ensign Group. 2022. The Ensign Group reports third quarter 2022 results; increases 2022 annual earnings guidance. https:// investor.ensigngroup.net/news-releases/news-release-details/ensign-group-reports-third-quarter-2022-results-increases-2022.

Ensign Group. 2021. 2021 annual report. https://investor. ensigngroup.net/static-files/577e5345-4151-4297-9af5cb4513c76cef.

Gifford, K., A. Lashbrook, S. Barth, et al. 2021. States respond to COVID-19 challenges but also take advantage of new opportunities to address long-standing issues: Results from a 50-state Medicaid budget survey for state fiscal years 2021 and 2022. Washington, DC: Kaiser Family Foundation. https://www.kff.org/report-section/states-respond-to-covid-19-challenges-but-also-take-advantage-of-new-opportunities-to-address-long-standing-issues-provider-rates-and-taxes/.

Hall, J. 2022a. Another state surpasses 10\% nursing home closure rate. McKnight's Long-Term Care News, August 12. https://www. mcknights.com/news/another-state-surpasses-10-nursing-home-closure-rate/.

Hall, J. 2022b. Facing stagnant Medicaid rates, this state has lost 10 percent of SNF beds in 2022. McKnight's Long-Term Care News, August 4. https://www.mcknights.com/news/facing-stagnant-medicaid-rates-this-state-has-lost-10-percent-of-snf-beds-in-2022/.

Harrington, C., A. Montgomery, and T. King. 2021. These administrative actions would improve nursing home ownership and financial transparency in the post COVID-19 period. Health Affairs blog, February 11. www.healthaffairs.org/do/10.1377/ hblog20210208.597573/full/.

Irving Levin Associates Inc. 2022. The senior care acquisition report. New Canaan, CT: Irving Levin Associates Inc.

Kauffman, B. 2022. Skilled nursing occupancy continued increase in August 2022. NIC Notes, November 3. https://blog.nic.org/ skilled-nursing-occupancy-continued-increase-in-august-2022.

Maryland Department of Health. 2022. Medicare claims processing manual-Chapter 8: Outpatient ESRD hospital, independent facility, and physician/supplier claims. https:// health.maryland.gov/mmcp/Documents/FY23\ Provider\  Rate\%20Increases\%20Public\%20Notice.pdf.

Medicaid and CHIP Payment and Access Commission. 2021. Managed long-term services and supports. https://www.macpac. gov/subtopic/managed-long-term-services-and-supports/.

Medicare Payment Advisory Commission. 2022. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021a. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021b. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2020. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission and the Medicaid and CHIP Payment and Access Commission. 2022. Data book: Beneficiaries dually eligible for Medicare and Medicaid. Washington, DC: MedPAC/MACPAC.

Musumeci, M., E. Childress, and B. Harris. 2022. State actions to address nursing home staffing during COVID-19. Washington, DC: Kaiser Family Foundation. https://www.kff.org/medicaid/issue-brief/state-actions-to-address-nursing-home-staffing-during-covid-19/.

National Conference of State Legislatures. 2021. Certificate of Need (CON) state laws. https://www.ncsl.org/ research/health/con-certificate-of-need-state-laws. aspx\#:~:text=Currently\%2C\%2035\%20states\%20and\%20 Washington,wide\%20variation\%20state\%20to\%20state.

National Governors Association. 2022. Addressing wages of the direct care workforce through Medicaid policies. Washington, DC: NGA. https://www.nga.org/wp-content/uploads/2022/11/ DirectCareWorkforcePaper_Nov2022.pdf.

National Investment Center for Seniors Housing \& Care. 2022. Skilled nursing COVID-19 tracker. https://www.nic.org/snf-covid-tracker.

NIC Map Vision. 2022a. Annual skilled nursing data report. Raleigh, NC: NIC MAP Vision. https://info.nicmapvision.com/ nic-map-skilled-nursing-data-annual-report.html.

NIC Map Vision. 2022b. Skilled nursing staffing shortages may have peaked but cycle continues. The Analyst Corner blog. October 13. https://www.nicmapvision.com/skilled-nursing-staffing-shortages-may-have-peaked-but-cycle-continues/.

Office of the Actuary, Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022a. Personal communication of author with Christopher Truffer. September 15.

Office of the Actuary, Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022b. Personal communication of author with James Hardesty. October 26.

Reiland, J. 2022. Where states land on making nursing home Medicaid rate increases permanent. Skilled Nursing News, October 14. https://skillednursingnews.com/2022/10/where-states-land-on-making-nursing-home-medicaid-rate-increasespermanent/.

Seeking Alpha. 2022a. LTC Properties, Inc. (LTC) Q3 2022 earnings call transcript. https://seekingalpha.com/ article/4550626-ltc-properties-inc-ltc-q3-2022-earnings-calltranscript.

Seeking Alpha. 2022b. Omega Healthcare Investors, Inc. (OHI) Q3 2022 earnings call transcript. https://seekingalpha.com/ article/4552710-omega-healthcare-investors-inc-ohi-q3-2022-earnings-call-transcript.

Sharma, H., M. C. Perraillon, R. M. Werner, et al. 2020. Medicaid and nursing home choice: Why do duals end up in low-quality facilities? Journal of Applied Gerontology 39, no. 9 (September): 981-990.

Stulick, A. 2022a. \$700M Medicaid boost tied to staffing levels greenlit for nursing homes. Skilled Nursing News, April 8. https:// skillednursingnews.com/2022/04/700m-medicaid-boost-tied-to-staffing-levels-greenlit-for-nursing-homes/.

Stulick, A. 2022b. As labor crisis complicates care transitions, hospitals work to alleviate SNF referral backlog. Skilled Nursing News, October 4. https://skillednursingnews.com/2022/10/ as-labor-crisis-complicates-care-transitions-hospitals-work-to-alleviate-snf-referral-backlog/

Stulick, A. 2022c. Medicaid rate increases open doors for nursing homes to finally plan for future. Skilled Nursing News, August 25. https://skillednursingnews.com/2022/08/medicaid-rate-increases-open-doors-for-nursing-homes-to-finally-plan-forfuture/.

Stulick, A. 2021. Buyers have "voracious appetite" for skilled nursing facilities. Skilled Nursing News, May 24. https:// skillednursingnews.com/2021/05/buyers-have-voracious-appetite-for-skilled-nursing-facilities/.

Welch, W.P., I. Olivera, M. Blanco, B. Sommers. 2022. Ownership of skilled nursing facilities: An analysis of newly released federal data. Washington, DC: Office of the Assistant Secretary for Planning and Evaluation. https://aspe.hhs.gov/sites/default/ files/documents/fd593ae970848e30aa5496c00ba43d5c/aspe-data-brief-ownership-snfs.pdf

Werner, R. M., Z. Templeton, N. Apathy, et al. 2021. Trends in post-acute care in U.S. nursing homes: 2001-2017. Journal of American Medical Directors Association 22, no. 12 (December): 2491-2495 e2492.

Zorn, A. 2022. Nursing homes score win with 17.5\% Medicaid increase in Pennsylvania for 2023. Skilled Nursing News, July 11. https://skillednursingnews.com/2022/07/nursing-homes-score-win-with-17-5-medicaid-increase-in-pennsylvania-for-2023/.

Zuckerman, R. B., S. Wu, L. M. Chen, et al. 2019. The five-star skilled nursing facility rating system and care of disadvantaged populations. Journal of the American Geriatrics Society 67, no. 1 (January): 108-114.

CHAPTER


Home health care services


## Home health care services

## Chapter summary

Home health agencies (HHAs) provide services to beneficiaries who are homebound and need skilled nursing care or therapy. In 2021, about 3.0 million Medicare fee-for-service (FFS) beneficiaries received care, and the program spent $\$ 16.9$ billion on home health care services. In that year, 11,474 HHAs participated in Medicare.

## Assessment of payment adequacy

The indicators of Medicare payment adequacy for home health care are generally positive.

Beneficiaries' access to care-Access to home health care was adequate in 2021: Over 98 percent of Medicare beneficiaries lived in a ZIP code served by at least two HHAs, and 87.6 percent lived in a ZIP code served by five or more HHAs.

- Capacity and supply of providers-Between 2020 and 2021, the number of HHAs fell by 0.8 percent, continuing a slow decline that began in 2013, but at a lower rate than in prior years. The slower decline in the supply of HHAs suggests that neither the coronavirus pandemic nor the major revisions to the home health prospective


## In this chapter

- Are Medicare payments adequate in 2023?
- How should Medicare payments change in 2024?
payment system implemented in 2020 had a significant impact on HHA supply.
- Volume of services-In 2021, the number of FFS beneficiaries receiving home health care fell by 1.1 percent, and the volume of 30-day periods also declined by 2.9 percent. However, the number of beneficiaries enrolled in FFS also declined as more beneficiaries enrolled in Medicare Advantage. As a result, the number of 30-day periods per 100 FFS beneficiaries increased by almost 1 percent in 2021, and the share of FFS beneficiaries using home health care increased to 8.3 percent. The average number of in-person visits per 30-day period declined by 4.7 percent, but some of the decline could have been offset by greater use of virtual visits through telehealth.
- Marginal profit-In 2021, freestanding HHAs' marginal profit-that is, the rate at which Medicare payments exceed providers' marginal costs-was 26 percent, suggesting a significant financial incentive for freestanding HHAs with excess capacity to serve additional Medicare patients.

Quality of care-In 2021, the mean agency risk-adjusted rate of successful discharge to the community from HHAs was 52.2 percent and the mean agency risk-adjusted rate of hospitalizations was 18.2 percent. The pandemic and policies related to the public health emergency confound our assessment of trends in both quality measures. Further complicating assessment, the home health payment system now uses a shortened unit of payment (a 30-day unit rather than 60 days), which changes the period used in the postdischarge hospitalization measure.

Providers' access to capital-Access to capital is a less important indicator of Medicare payment adequacy for home health care because this sector is less capital intensive than other health care sectors. The major publicly traded forprofit home health companies had sufficient access to capital markets for their credit needs.

Medicare payments and providers' costs-In 2021, home health agencies' average cost per 30-day period decreased by 2.9 percent, in part reflecting a decline in the number of visits per 30-day period. As the number of visits per period declined, Medicare's payment per in-person visit increased by 17.7 percent. Medicare margins for freestanding agencies averaged 24.9 percent in 2021-a historic high-up from 20.2 percent in 2020 and 15.4 percent in 2019. These high margins indicate that the increase in payments in 2021 far exceeded the increase in costs. In aggregate, Medicare's payments have always been substantially more than costs: From 2001 to 2019, the Medicare margin
for freestanding HHAs averaged 16.4 percent. The projected margin for 2023 is 17.0 percent, reflecting both a statutory reduction to the base payment rate of 3.5 percent in 2023 (required to maintain budget neutrality following recent changes to the home health payment system) and expected cost growth indicated by the Medicare home health market basket. However, this rate of inflation is high relative to past experience, so margins in 2023 could be higher.

## How should payments change in 2024?

Our review of payment adequacy for Medicare home health services indicates that access is more than adequate in most areas and that Medicare payments are substantially in excess of costs. Home health care can be a high-value benefit when it is appropriately and efficiently delivered. Medicare beneficiaries often prefer to receive care at home instead of in institutional settings, and home health care can be provided at lower costs than institutional care. However, Medicare's payments for home health services are too high, and these excess payments diminish the service's value as a substitute for more costly services. On the basis of these findings, the Commission recommends that, for calendar year 2024, the Congress should reduce the 2023 base rate by 7 percent.

## Background

Medicare home health care consists of skilled nursing, physical therapy, occupational therapy, speech therapy, aide services, and medical social work provided to beneficiaries in their homes. To be eligible for Medicare's home health benefit, beneficiaries must need part-time (fewer than eight hours per day) or intermittent skilled care to treat their illnesses or injuries and must be unable to leave their homes without considerable effort. In contrast to coverage for skilled nursing facility services, Medicare does not require a preceding hospital stay to qualify for home health care. Also, unlike for most services, Medicare does not require copayments or a deductible for home health services. In 2021, about 3.0 million Medicare beneficiaries received home care, and the program spent $\$ 16.9$ billion on home health care services under the home health prospective payment system (PPS).

Medicare requires that a physician, nurse practitioner, clinical nurse specialist, or physician assistant certify a patient's eligibility for home health care. ${ }^{1}$ Medicare also requires that a beneficiary have a face-to-face encounter with the practitioner ordering home health care. The encounter must take place in the 90 days preceding or 30 days following the initiation of home health care. An encounter through telehealth services may be used to satisfy the requirement.

In 2020, CMS implemented major changes required by the Bipartisan Budget Act (BBA) of 2018: a new 30-day unit of payment and elimination of the number of in-person therapy visits as a factor in the payment system. CMS implemented the BBA of 2018 policies through a new case-mix system, the Patient-Driven Groupings Model (PDGM). Payments for a 30-day period are adjusted by the case-mix system to account for differences in patient severity. If beneficiaries need additional home health services at the end of the initial 30-day period, another period commences and Medicare makes an additional payment. Coverage for additional periods generally has the same requirements as the initial period (i.e., the beneficiary must be homebound and need skilled care). The PDGM applied to home health care services as of January 1, 2020 (an overview of the home
health PPS is available at https://www.medpac.gov/ wp-content/uploads/2021/11/MedPAC_Payment_ Basics_22_HHA_FINAL_SEC.pdf).

The coronavirus pandemic had a significant effect on home health care, just as it did on other sectors. The volume of services dropped in 2020, though most of this decline was confined to the first few months of the pandemic. CMS and the Congress made several policy changes in response to the pandemic that were intended to support or expand access to home health care (Centers for Medicare \& Medicaid Services 2020). These new policies included expanding home health agencies' (HHAs') use of telehealth, allowing nurse practitioners and physician assistants to order the home health benefit, and suspending the 2 percent sequester on Medicare payments required by the Budgetary Control Act of 2011. These policy changes could also have affected the mix and amount of home health care services provided in 2021. In addition, HHAs, like other providers, were eligible for relief funds such as the Paycheck Protection Program.

## Home health payments historically have been high

While the changes required by the BBA of 2018 substantially altered the home health PPS, they were not designed to reduce Medicare's payments for home health care services, which have substantially exceeded costs since the PPS was implemented in 2001. The Act required CMS to set the base rate for the PDGM at a level that was budget neutral relative to 2019, a year when the Commission reported high Medicare margins (over 15 percent) for freestanding agencies. (Medicare margins show the extent to which an agency's revenue from Medicare patients covers, exceeds, or falls below the cost of providing care for these patients.)

The BBA of 2018 requires that payments based on the PDGM be budget neutral (neither raising nor lowering aggregate home health care spending) relative to spending that would have occurred without the new model's implementation. For 2020 through 2026, CMS must determine how actual aggregate home health spending under the PDGM differs from spending that would have occurred in the absence of the payment system changes and must adjust the PPS base rate as needed to achieve budget neutrality. CMS is required to make permanent adjustments when it

# Rate of decline in home health agencies participating in Medicare has slowed 

|  |  | Prepandemic |  | Pandemic | Average annual <br> percent change |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |

Note: HHA (home health agency). "Active HHAs" includes all agencies operating during a year, including agencies that closed or opened at some point during the year. Average annual changes were calculated on unrounded data.

Source: MedPAC analysis of CMS's Quality, Certification and Oversight file and 2021 annual report of the Boards of Trustees of the Medicare trust funds.
determines that an observed deviation from expected behavior will continue in future years. The statute requires temporary (one-year) adjustments when CMS identifies overpayments or underpayments that occurred in a prior year.

In the 2023 payment rule for the home health PPS, CMS determined that the base rate was 7.85 percent above the budget-neutral level required by statute. CMS implemented a permanent reduction to the base rate of 3.925 percent for 2023 , half of the reduction it has identified as necessary. Assuming CMS's estimate of the budget-neutral level does not change, in future years CMS will have to implement another 3.925 percent reduction to keep spending at the level required by the BBA of 2018. CMS also found that spending in 2020 and 2021 was $\$ 2$ billion above the budgetary targets for these years, but it has not yet indicated when or how it plans to implement a temporary reduction to recover these funds.

Medicare has always overpaid for home health services under the PPS and will continue to do so even after CMS adjusts the PPS base rate as needed to achieve budget neutrality with 2019 payments. Margins of 23 percent in the first year of the PPS suggest that the base rate CMS established in 2001 was well in excess of agencies' costs to treat Medicare beneficiaries. Between 2001 and 2019, freestanding HHA margins averaged 16.4 percent.

## Are Medicare payments adequate in 2023?

The Commission reviews several indicators to determine the level at which payments will be adequate to cover the costs of an efficient provider in 2023. Specifically, we assess beneficiary access to care (by examining the supply of home health providers, annual changes in the volume of services, and marginal profit); quality of care; access to capital; and the relationship between Medicare's payments and providers' costs. In general, the payment adequacy indicators for home health care are positive.

## Beneficiaries' access to care: Almost all beneficiaries live in an area served by HHAs

Supply and volume indicators show that almost all beneficiaries have access to home health services. In 2021, over 98 percent of fee-for-service (FFS) beneficiaries lived in a ZIP code served by two or more HHAs, and 87.6 percent lived in a ZIP code served by five or more agencies. These findings are consistent with our prior reviews of access. ${ }^{2}$

## Supply of providers: Agency supply declined slightly in 2021

In 2021, the supply of agencies declined by 0.8 percent. This decline is smaller than the trend in recent years; between 2013 and 2019, the number of agencies fell an average of 1.7 percent per year (Table 8-1). The small

## In 2021, the share of FFS beneficiaries using home health care increased,

 while the number of in-person home health visits per user declined|  | Prepandemic |  |  | Pandemic |  | Average annual percent change |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2017 | 2018 | 2019 | 2020 | 2021 | 2017-2019 | 2020-2021 |
| Medicare FFS home health users (in millions) | 3.4 | 3.4 | 3.3 | 3.1 | 3.0 | -1.7\% | -7.1\% |
| Share of FFS beneficiaries using home health care | 8.8\% | 8.7\% | 8.5\% | 8.1\% | 8.3\% | -1.3 | 2.5 |
| Total visits (in millions) | 104.8 | 103.9 | 99.7 | 87.1 | 76.8 | -2.5 | -5.3 |
| In-person visits per user | 30.7 | 30.8 | 30.2 | 26.6 | 25.4 | -0.8 | -4.2 |
| 30-day periods (in millions) |  |  |  | 9.6 | 9.3 |  | -2.9 |
| 30-day periods per 100 FFS <br> Medicare beneficiaries |  |  |  | 25 | 26 |  | 0.7 |

Note: FFS (fee-for-service). Percentage change was calculated on unrounded data.
Source: MedPAC analysis of home health standard analytic files from CMS and the 2022 annual report of the Boards of Trustees of the Medicare trust funds.
decline in 2021 suggests that the industry has remained relatively stable in the aftermath of the coronavirus pandemic and the implementation of the PDGM in 2020.

HHA provider counts illustrate the overall size of the industry, but it is a limited measure of capacity. For example, HHAs can vary in size and the services they provide. Also, because home health care is not provided in a medical facility, HHAs can adjust their service areas as local conditions change. Even the number of employees may not be an effective metric because HHAs can use contract staff to meet their patients' needs.

## The share of FFS beneficiaries using home health care increased in 2021

In 2021, the number of Medicare FFS beneficiaries using home health care declined by 1.1 percent, and the volume of 30-day periods declined 2.9 percent
(Table 8-2). Though utilization and spending declined sharply during the coronavirus pandemic, home health care service volume was declining before the pandemic. Several factors likely account for the decline. More Medicare beneficiaries are enrolling in Medicare Advantage, reducing the demand for FFS Medicare services. In addition, aggregate and per capita hospitalizations, which are a common source of referrals to home health care, have declined in recent years. Since the onset of the pandemic, many home health care providers have reported that staffing shortages limit the volume of services they can provide.

However, notably, per capita use of the benefit increased 2.5 percent in 2021 (Table 8-2). In addition, the number of 30 -day periods per Medicare FFS beneficiary also increased. Thus, despite the 2021 decline in aggregate use, the higher rate of home health users in 2021 indicates that HHAs are serving a rising share of the Medicare FFS population.

## The number of home health periods per FFS beneficiary

 is similar in urban and rural areas, 2021Number of 30-day periods per 100 FFS beneficiaries

|  | Rural | Urban | All |
| :--- | :---: | :---: | :---: | :---: |
| Review Choice Demonstration states | 29.0 | 31.4 | 31.0 |
| All other states and territories | 23.4 | 22.3 | 22.5 |
| All states | 24.5 | 24.6 | 24.5 |

Note: FFS (fee-for-service). Under the Review Choice Demonstration, home health agencies in Florida, Illinois, Ohio, North Carolina, and Texas are subject to additional review of their Medicare claims.

Source: MedPAC analysis of home health standard analytic files from CMS and the 2022 annual report of the Boards of Trustees of the Medicare trust funds.

In general, the Commission has found that, historically, per capita utilization of home health care services has been comparable between urban and rural areas (Medicare Payment Advisory Commission 2021). Data for 2021 indicate a continuing trend despite any effects of the coronavirus pandemic and changes to the casemix system in 2020. In 2021, the number of periods per capita was almost equal in rural and urban areas, with beneficiaries in either area averaging about 24.5 thirtyday periods per 100 FFS beneficiaries (Table 8-3). This comparable utilization persists even when areas that are subject to program integrity concerns are excluded from the calculation. For example, when the five states subject to the Review Choice Demonstration for home health services-a demonstration focused on program integrity-are excluded, the rural areas had use rates of 23.4 thirty-day periods per 100 FFS beneficiaries, slightly higher than urban areas' rates, which averaged 22.3 thirty-day periods per 100 FFS beneficiaries. ${ }^{3}$

## Increased use of telehealth during the coronavirus

 pandemic makes it difficult to interpret the decline in in-person visits In 2021, the number of in-person visits per 30-day period fell by 0.4 visits, or 4.7 percent, relative to 2020 (Table 8-4). Since 2019, there has been a decline of 1.4 in-person visits per 30-day period. The three therapy disciplines (physical, occupational, and speech-language pathology) account for abouttwo-thirds of the decline in visits since 2019 (data not shown). Skilled nursing accounts for approximately 30 percent of the decline between 2019 and 2021.

Fewer in-person visits could, in part, reflect trends related to the coronavirus pandemic, such as the reluctance of beneficiaries to receive services in the home and the growth in the use of telehealth. Shortly after the onset of the pandemic, CMS expanded the use of telehealth in home health care, permitting agencies to provide virtual visits and other telehealth services under the benefit. The expanded coverage of telehealth was initially for the duration of the coronavirus pandemic but was later made permanent. A survey found that almost three-quarters of HHAs expanded their telehealth programs in 2020 (Shang et al. 2020). Several HHAs and industry experts we interviewed indicated that telehealth and virtual visits expanded substantially during the coronavirus pandemic, surging at the beginning and receding in later months. In 2023, CMS is requiring HHAs to report telehealth services, consistent with our recommendation in the March 2022 report to the Congress. ${ }^{4}$

## Marginal profits

Another factor we consider when evaluating access to care is whether providers have a financial incentive to expand the number of Medicare beneficiaries they serve. In determining whether to treat a patient, a provider with excess capacity compares the marginal

|  | Prepandemic$2019$ | Pandemic |  | 2019-2021 |  | 2020-2021 |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 2020 | 2021 | Change in number of visits | Average annual percentage change | Change in number of visits | Average annual percentage change |
| Skilled nursing | 4.6 | 4.6 | 4.3 | -0.3 | -3.7\% | -0.3 | -8.0\% |
| Physical therapy | 3.5 | 2.9 | 3.0 | -0.6 | -10.0 | 0.1 | 1.1 |
| Occupational therapy | 1.1 | 0.9 | 0.8 | -0.3 | -18.3 | -0.1 | -7.5 |
| Speech-language pathology | 0.2 | 0.2 | 0.2 | -0.1 | -20.5 | -0.1 | -5.2 |
| Medical social services | 0.1 | 0.1 | 0.1 | 0.1 | -20.8 | -0.1 | -8.4 |
| Home health aide | 0.7 | 0.6 | 0.5 | -0.2 | -18.5 | -0.1 | -14.5 |
| Total | 10.2 | 9.2 | 8.8 | -7.4 | -8.1 | -0.4 | -4.7 |

Note: Home health services initiated in 2019 were paid under 60-day episodes. For this table, home health care services initiated in 2019 were recalculated as 30-day periods to provide comparable units of service in the two years. Thirty-day periods are included in the year that the period ended. Components may not sum to totals due to rounding. Visit counts have been rounded. "Change in number of visits" and "average annual percentage change" columns were calculated on unrounded data.

Source: MedPAC analysis of 2019 home health Limited Data Set file and standard analytic files for 2020 and 2021.
revenue it will receive (i.e., the Medicare payment) with its marginal costs-that is, the costs that vary with volume. If Medicare payments exceed the marginal costs of treating an additional beneficiary, a provider has a financial incentive to increase its volume of Medicare patients. In contrast, if payments do not cover the marginal costs, the provider may have a disincentive to care for Medicare beneficiaries. ${ }^{5}$ In 2021, the average marginal profit for freestanding HHAs was 26.1 percent, indicating that these HHAs have a strong incentive to serve Medicare beneficiaries.

## Quality of care is difficult to assess during the pandemic

The quality of care in 2020 and 2021 is difficult to assess because of the effects of the coronavirus pandemic on beneficiaries and providers and because implementation of the 30-day unit of payment may have affected one of our measures. Data for these years likely reflect changes in the delivery of care and data limitations unique to the coronavirus pandemic rather than actual trends in quality. Changes in the use of other health care services, such as acute inpatient care or the increased use of telehealth by physicians,
could also have affected home health care outcomes. In addition, the Commission's quality metrics rely on riskadjustment models that use performance from previous years to predict beneficiary risk.

We evaluate quality of care using two measures: average risk-adjusted rates of successful discharge to the community and all-condition hospitalizations within a spell of home health care. Successful discharges to the community include only beneficiaries who did not have an unplanned hospitalization and did not die in the 30 days after their spell. The hospitalization measure captures all unplanned hospitalizations (admissions and readmissions) and outpatient observation stays that occur during the spell of service (beneficiaries who died during a home health stay are excluded from the measure). Discharges to hospice or beneficiaries with the hospice benefit are excluded from the calculation of both measures.

In 2021, the share of Medicare beneficiaries hospitalized during their home health stay was 18.2 percent, about equal to the share in 2020 but more than 3 percentage points lower than in 2019 (Table 8-5, p. 246). Given the various disruptions to the health care

HHAs' mean risk-adjusted rates of successful discharge to the community and all-cause hospitalizations between 2017 and 2021

| Measure | Provider type | Prepandemic |  |  | Pandemic |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 2017 | 2018 | 2019 | 2020 | 2021 |
| Successful discharge to the community | All HHAs | 69.6\% | 70.4\% | 72.2\% | 61.8\%* | 52.2\%* |
|  | For profit | 68.2 | 68.9 | 70.7 | 60.1* | 50.7* |
|  | Nonprofit | 76.6 | 77.5 | 78.9 | 70.4* | 59.7* |
|  | Freestanding | 69.0 | 69.8 | 71.6 | 61.7* | 51.5* |
|  | Hospital based | 75.3 | 76.2 | 77.5 | 68.4* | 58.2* |
| All-cause hospitalizations | All HHAs | 27.3\% | 21.5\% | 21.4\% | 18.4\% | 18.2\% |
|  | For profit | 22.0 | 22.1 | 22.0 | 18.8 | 18.6 |
|  | Nonprofit | 18.8 | 18.9 | 19.0 | 17.0 | 16.4 |
|  | Freestanding | 21.7 | 21.8 | 21.6 | 18.6 | 18.4 |
|  | Hospital based | 19.0 | 19.1 | 19.3 | 16.9 | 16.5 |

Note: HHA (home health agency). "Successful discharge to the community" includes beneficiaries discharged to the community who did not have an unplanned hospitalization or die in the 30 days after discharge. The hospitalization measure captures all unplanned hospital admissions and readmissions and outpatient observation stays that occurred during the stay. Both measures are uniformly defined and risk adjusted across the four post-acute care settings. Providers with at least 60 stays in the year (the minimum count to meet a reliability of 0.7 ) were included in calculating the average facility rate. These measures report results for Medicare fee-for-service beneficiaries. *A change to the home health payment system's unit of payment in 2020 affects the calculation of our discharge to community measure. Rates from 2020 and 2021 cannot be compared with those from prior years.

Source: MedPAC analysis of Medicare Provider Analysis and Review and home health standard analytic file.
delivery system in 2020, it is difficult to determine the factors that account for the stable hospitalization rate in 2021. Though the characteristics of beneficiaries receiving home health care in 2021 did not change significantly, our models may not have accounted for aspects of patient risk attributable to home health care beneficiaries during the coronavirus pandemic. The pandemic has changed how beneficiaries use inpatient and outpatient care, and these differences could have had some lasting impact on home health patients' hospitalization rates.

In 2021, the share of patients discharged successfully to the community was 52.2 percent. This rate appears to be almost 10 percentage points lower than in 2020 and 20 percentage points lower than in 2019. However, in addition to the many pandemic-related
disruptions beginning in 2020, the implementation of the 30-day unit of payment has lowered our reported rate of discharge to community. Before 2020, home health care was provided in 60-day episodes. The implementation of 30-day periods in 2020 shortened the length of time beneficiaries received home health care, and time periods between the 31st and 60th day of home health care that were previously (before 2020) included as part of a home health spell of care became part of a postdischarge period. As a result, data on some hospitalizations that previously would have occurred within a home health stay could have been captured as occurring postdischarge, resulting in a decline in the community discharge rate. Correspondingly, the data for 2019 and prior years reflect the 60-day unit of payment and thus cannot be compared with the 2021 data.

| HH-CAHPS ${ }^{\circledR}$ measure | 2017 | 2018 | 2019 | 2021 | Percentage point change, 2019-2021 |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Share of patients rating the home health agency a 9 or 10 out of 10 | 88\% | 88\% | 88\% | 88\% | 0 |
| Share of patients that would definitely recommend the home health agency to friends or family | 85 | 85 | 85 | 85 | 0 |
| Share of patients who reported that their home health provider: |  |  |  |  |  |
| Gave care in a professional way | 83 | 83 | 83 | 81 | -2 |
| Communicated well with them | 84 | 84 | 84 | 84 | 0 |
| Discussed medicines, pain, and home safety with them | 78 | 78 | 78 | 77 | -1 |

Note: HH-CAHPS ${ }^{\circledR}$ (Home Health Care Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$ ). HH-CAHPS is a standardized survey of patients' evaluations of home health. The survey items are combined to calculate measures of patient experience for each home health agency (HHA). Each year's results are based on a sample of surveys of HHAs' patients from January to December. CMS did not collect HH-CAHPS data for the first six months of 2020.

Source: CMS summary of $\mathrm{HH}-$ CAHPS public report of survey results tables.

We no longer include measures of patient functional improvement in our assessment of quality. The Commission contends that maintaining and improving functional status is a key goal of post-acute care, but has serious questions about the reliability of currently reported information (Medicare Payment Advisory Commission 2019). Because functional assessments are used in the case-mix system to establish payments, it is unlikely that this information can be divorced from payment incentives. In the June 2019 report to the Congress, the Commission discussed possible strategies to improve the assessment data, the importance of monitoring the reporting of these data, and alternative measures of function (such as patient-reported surveys) that do not rely on providercompleted assessments (Medicare Payment Advisory Commission 2019).

## Most patient experience measures remained stable in 2021

HHAs collect Home Health Care Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}\left(\mathrm{HH}-\mathrm{CAHPS}^{\circledR}\right)$
surveys from a sample of patients served, which CMS uses to calculate results for five measures of patient experience. ${ }^{6}$ The HH-CAHPS measures key components of quality by assessing whether something that should happen during a stay (such as clear communication) actually happened.

HH-CAHPS ratings in 2021 were comparable to 2019 on most measures, with the same share of patients reporting positive responses for three of the measures. (Data for calendar year 2020 are unavailable because CMS waived the requirement to collect HH-CAHPS data for the first six months of 2020.) The share of beneficiaries reporting that (1) HHAs communicated in a professional way and (2) HHAs discussed medicines, pain, and home safety declined by 2 percentage points and 1 percentage point, respectively (Table 8-6). These measures were steady before 2020, suggesting that the disruptions related to the coronavirus pandemic may have had a small effect on these patient experience measures.

## Providers' access to capital is adequate

In 2021, the all-payer margin for freestanding HHAs averaged 11.9 percent, indicating that many HHAs yield positive financial results that should appeal to capital markets. HHAs are not as capital intensive as other providers because they do not require extensive physical infrastructure, and most are too small to attract interest from capital markets. Few HHAs access capital through publicly traded shares or through public debt, such as issuance of bonds. In 2021, FFS Medicare accounted for about 49 percent of revenue for freestanding HHAs.

Information on publicly traded home health care companies provides limited insight into access to capital. Publicly traded companies may have other lines of business in addition to home health care, such as hospice, Medicaid-covered services, and private-duty nursing. Also, publicly traded companies are a small portion of the total number of HHAs in the industry. However, since they are the largest corporate entities in home health care, they provide some insight about the industry's financial status.

In 2022, some large for-profit firms reported that higher inflation and rising labor costs affected financial results (Seeking Alpha 2022). However, these firms also reported that increased Medicare Advantage (MA) enrollment was one of the most important factors affecting their operations (Enhabit Home Health \& Hospice 2022). Since private Medicare plans reportedly pay less than traditional FFS Medicare for home health care services, the publicly traded HHAs contend that their financial returns are reduced by this shift in volume. These firms are working to secure higher payment from MA plans but noted that private plan rates remain lower than Medicare FFS rates.

Despite these factors, recent activity indicates that the large for-profit companies have capital to invest in expansion and are attractive investments for outside firms. For example, the three largest publicly traded firms reported acquiring new HHAs in 2022 to expand capacity (Amedisys 2022, Enhabit 2022, LHC Group 2022). In addition, UnitedHealth Group announced that it was acquiring LHC Group, a large publicly traded home health company, in March 2022 (Reuters 2022). Their forthcoming acquisition follows Humana's purchase of another large publicly traded home health care firm, Kindred at Home, in 2021.

## Medicare payments and providers' costs: Reduced visits lowered costs in 2021

In 2021, as beneficiary enrollment in Medicare Advantage continued to rise, total Medicare FFS spending for home health care declined by 1.2 percent to $\$ 16.9$ billion. The average payment per 30-day period (that did not receive a low-use payment adjustment) for freestanding agencies was $\$ 1,810$. Though we typically report the annual increase in payments per home health period, new policies make that calculation more nuanced. For example, 2021 was the first full year with a new unit of payment. In 2020, a portion of claims were paid under the previous case-mix system and 60day unit of payment, so PDGM data for this year do not reflect a full year of utilization under the new system. As an alternative, we compared the average payment per in-person visit in 2019 and 2021 since in-person visits are a primary unit of service in the home health benefit and data on the number of visits are available for both years. Between 2019 and 2021, Medicare's payment per visit increased by 17.7 percent, from about $\$ 180$ per in-person visit to about $\$ 220$ per in-person visit. ${ }^{7}$ The per visit payment increase reflects the budget-neutrality requirement under the BBA of 2018, which required Medicare to set aggregate payments at a pre-PDGM baseline. The increase also reflects other payment policies in 2020 and 2021, including the annual payment updates, a percentage payment reduction that CMS implemented in 2020 in anticipation of coding changes under the PDGM, and the suspension of the sequester. Finally, a 4 percent increase in case-mix acuity also raised payments in 2020.

Fewer in-person visits per 30-day period is a substantial factor in the higher payment per visit under the PDGM. When setting the PDGM base rate, CMS assumed, consistent with the requirements of the BBA of 2018, that the number of in-person visits in a 30-day period would remain stable; thus, the rate is based on a higher level of utilization than occurred in 2021. ${ }^{8}$ The base rate also does not reflect the shift to a less costly mix of services due to the drop in therapy services. If telehealth visits had been counted, the 2021 per visit payment increase would likely have been lower, but HHAs will not be required to report telehealth services until July 2023.

The decline in in-person visits under the PDGM was similar to the result of the industry's behavioral response in 2000, when Medicare switched from a

# Historically high Medicare margins for freestanding home health agencies in 2021 

|  | Prepandemic <br> 2019 | Pandemic |  | Share of home health agencies, 2021 | Share of periods, 2021 |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 2020 | 2021 |  |  |
| All | 15.4\% | 20.2\% | 24.9\% | 100\% | 100\% |
| Geography |  |  |  |  |  |
| Majority urban | 16.1 | 20.0 | 24.8 | 85.0 | 85.1 |
| Majority rural | 14.2 | 21.6 | 25.2 | 15.0 | 14.9 |
| Type of ownership |  |  |  |  |  |
| For profit | 17.4 | 22.7 | 26.1 | 88.2 | 82 |
| Nonprofit | 17.4 | 12.4 | 20.2 | 11.8 | 18 |
| Volume quintile |  |  |  |  |  |
| First (smallest) | 9.7 | 17.6 | 14.0 | 20 | 2.5 |
| Second | 17.4 | 14.0 | 15.9 | 20 | 5.8 |
| Third | 13.3 | 17.0 | 19.3 | 20 | 10.4 |
| Fourth | 14.1 | 18.8 | 22.8 | 20 | 18.6 |
| Fifth (largest) | 17.5 | 22.4 | 28.3 | 20 | 62.6 |

[^15]Source: MedPAC analysis of Medicare home health cost report files from CMS.
cost-based home health reimbursement system to a PPS that used 60-day episodes of care. In that year, the number of visits per 60-day episode fell below what CMS had assumed when it set the base payment for the newly established PPS. As a result, in 2001, the Medicare margin for freestanding HHAs exceeded 20 percent. Though the number of in-person visits per period could rebound in future years as the effects of the coronavirus pandemic recede, the pattern of visits and payments observed after the implementation of the PDGM in 2020 is similar to the early experience of the home health PPS that led to years of payments well in excess of costs.

In 2021, the average cost per 30-day period declined by 2.9 percent for freestanding HHAs, due in large part to reductions in the number of in-person visits provided.

Reducing in-person visits allowed HHAs to offset reported price increases in labor and other services needed to deliver home health care, plus additional costs for personal protective equipment, along with economy-wide inflation. The reduction in the average cost per period contrasts with the 1.4 percent average annual increase in cost per 60-day episode between 2017 and 2019.

## Medicare margins for freestanding HHAs reached an all-time high in 2021

In 2021, the aggregate Medicare margin for freestanding HHAs was 24.9 percent (Table 8-7). The margin ranged from 6.9 percent for those at the 25th percentile to 34.3 percent at the 75th percentile of the margin distribution (data not shown). For-profit HHAs

| 8-8 Performance of relatively efficient home health agencies in 2021 |  |  |
| :---: | :---: | :---: |
| Provider characteristics | Relatively efficient providers | All other providers |
| Number of home health agencies | 409 | 2,443 |
| Share that are for profit | 74\% | 86.5\% |
| Median |  |  |
| Medicare margin | 28.4\% | 23.2\% |
| Hospitalization during home health spell | 16.1\% | 19.6\% |
| Successful discharge to community relative to expected | 1.08 | 0.97 |
| Standardized cost per 30-day period | \$1,294 | \$1,346 |
| Patient severity case-mix index | 1.10 | 1.03 |
| Visits per period |  |  |
| Standardized average in-person visits per period | 7.7 | 7.7 |
| Share of in-person visits by type |  |  |
| Skilled nursing | 45\% | 48\% |
| Aide | 5\% | 5\% |
| MSS | 1\% | 1\% |
| Therapy | 49\% | 45\% |
| HHA size |  |  |
| Median number of 30-day payment periods | 1,147 | 1,097 |
| Share of 30-day periods |  |  |
| Low-use 30-day periods | 9.3\% | 7.2\% |
| Outlier 30-day periods | 4.4\% | 3.5\% |
| Provided to rural beneficiaries | 12.7\% | 22.5\% |

[^16]Source: MedPAC analysis of Medicare cost reports and standard analytic file.
had higher margins than nonprofit HHAs, and rural HHAs had slightly higher margins than urban HHAs. Agencies with higher volume had better financial results, likely reflecting the economies of scale possible for larger operations. For example, margins for HHAs in the bottom quintile of volume averaged 14.0 percent, compared with a 28.3 percent average margin for HHAs in the top quintile.

In 2020, HHAs received substantial payments through pandemic-related relief programs, such as the Paycheck Protection Program and the Small Business Administration Loan Forgiveness program. When these relief funds are included, the Medicare aggregate margin for freestanding HHAs in 2021 was 25.9 percent (data not shown). ${ }^{9}$

The Commission includes hospital-based HHAs in its calculation of acute care hospitals' Medicare margins because these agencies operate in the financial context of hospital operations. In 2021, margins for hospital-based HHAs were - 18.1 percent (data not shown). The lower margins of hospital-based HHAs are attributable chiefly to their higher costs, some of which are a result of overhead costs allocated to the HHA from its parent hospital. Hospital-based HHAs help their parent institutions financially if they can shorten inpatient stays, lowering expenses in the more costly inpatient hospital setting.

## Relatively efficient HHAs serve patients similar to those at other HHAs

The Commission is required by the Medicare Prescription Drug, Improvement, and Modernization Act of 2003 to consider the costs associated with efficient providers. The analysis informs the Commission's update discussion by examining the adequacy of payments for those providers that perform relatively well on cost and quality measures.

The Commission follows two principles when selecting a set of efficient providers. First, the provider must do relatively well on both cost and quality metrics. Second, performance must be consistent, meaning that the provider cannot have poor performance on any metric in any of three consecutive years preceding the year under evaluation. The Commission's approach is to examine how many providers meet a preestablished set of criteria. It does not establish a set share (for example, 10 percent) of providers to be considered efficient and then define criteria to meet that pool size.

To identify efficient HHAs, we examined cost efficiency and quality at freestanding HHAs to identify a cohort that demonstrated better performance on these metrics relative to its peers (Table 8-8). The cost measure was on a per 30-dayperiod basis, adjusted for risk (patient's health status) and local wages; the quality measures were risk-adjusted rates of hospitalizations during the home health spell and rate of successful discharge to the community after the home health spell. Our approach categorized an HHA as relatively efficient if it was in the best-performing third on at least one measure (low cost per episode, a low hospitalization rate, or a high rate of beneficiaries with a successful
discharge to the community) and was not in the worst-performing third on any of these measures for three consecutive years (2017 to 2019). Providers also had to have complete claims, quality, and cost report data for 2017 to 2019 (as well as 2021). Because 2020 includes the effects of the PDGM implementation and coronavirus pandemic, we selected providers based on their performance in 2017 to 2019, a period without these two events. In 2021, about 14 percent of freestanding HHAs met the criteria to be classified as efficient.

In 2021, relative to other HHAs, efficient HHAs served a similar mix of patients and had a similar mix of nursing, therapy, aide, and social services visits but had a median cost per visit that was about 3.9 percent lower. Relatively efficient providers had a median hospitalization rate that was 3.5 percentage points lower (lower is better). Relatively efficient HHAs provided roughly the same number of in-person visits per period as other HHAs, and the former had a median margin that was 5.2 percentage points higher. Efficient providers were less likely to be for profit, tended to provide fewer 30-day periods in rural areas, and had a median Medicare margin of 28.4 percent.

## Projected Medicare margin for 2023

In modeling 2023 margins, we incorporate policy changes that will go into effect between the year of our most recent data, 2021, and the year for which we are making the margin projection, 2023. Table 8-9 (p. 252) shows the major payment policy changes in 2022 and 2023, including a permanent reduction to the base payment rate of 3.5 percent, as required to maintain budget neutrality following the implementation of the PDGM classification system and associated changes to the PPS. ${ }^{10}$ On the basis of these policies and assumptions, the Commission projects a margin of 17 percent in 2023.

The margin projection for 2023 assumes the rate of cost inflation indicated by the Medicare home health market basket for 2022 and 2023, 6.2 percent and 4.1 percent, respectively. However, this rate of inflation is high relative to past experience. As noted earlier, cost per period in 2021 has declined by 2.9 percent relative to 2020 (data not shown). In 2011 to 2019-the last nine years that the 60-day payment episode was in effect-the average increase in cost per episode was about 0.5 percent. The Commission's projection

20222023

| Home health policy changes: |  |  |
| :--- | :---: | :---: |
| Market basket | $3.1 \%$ | $4.1 \%$ |
| Productivity | -0.5 | -0.1 |
| Budget-neutrality adjustment under BBA of 2018 | $\mathrm{~N} / \mathrm{A}$ | -3.5 |
| Outlier threshold adjustment | 0.7 | 0.2 |
| Total | $\mathbf{3 . 2}$ | $\mathbf{0 . 6}$ |

Note: BBA (Bipartisan Budget Act). N/A (not applicable). Totals may not sum due to rounding and multiplicative relationship of payment factors.
assumes higher cost inflation than HHAs are likely to experience, so margins in 2023 could be higher.

## How should Medicare payments change in 2024?

In considering how payments should change for 2024, we note that current law is expected to increase home health payment rates by 2.9 percent in 2024. CMS will revise its estimates before the publication of the final rule. However, our review of payment adequacy for Medicare home health services indicates that access is more than adequate in most areas and that payments continue to substantially exceed costs, as they have for many years. These excess payments do not accrue to the advantage of the beneficiary or the Medicare program. Further, the high aggregate margin indicates that the HH PPS provides few incentives for HHAs to furnish care efficiently.

As noted above, in 2023 CMS implemented a permanent reduction to the 30-day period base rate of 3.925 percent, half the amount required by law to maintain budget neutrality following the implementation of the PDGM classification system and associated changes to the PPS. Assuming this estimate does not change, in future years CMS will have to reduce the base rate for 30 -day periods by an additional 3.925 percent to keep spending at the
level required by law. We note that, even after such a reduction, payments to home health agencies would remain far above costs.

## RECOMMENDATION 8

For calendar year 2024, the Congress should reduce the 2023 Medicare base payment rate for home health agencies by 7 percent.

## RATIONALE 8

Home health care can be a high-value benefit when it is appropriately and efficiently delivered. Medicare beneficiaries often prefer to receive care at home instead of in institutional settings, and home health care can be provided at lower costs than institutional care. However, Medicare's payments for home health services are too high, and the excess payments diminish the service's value as a substitute for more costly services. In addition, broad geographic variation in the use of the home health benefit indicates inefficiencies in some areas of the country.

A 7 percent reduction in 2024 would significantly address the magnitude of excess payments embedded in Medicare's home health payment rates. However, this reduction would likely be inadequate to align Medicare payments with providers' actual costs. Though the public health emergency was a disruption for HHAs, it did not significantly change the industry's financial
outlook or service delivery practices; in fact, Medicare margins in 2021 were much higher than in 2019.

## IMPLICATIONS 8

## Spending

- This recommendation would decrease federal program spending by $\$ 750$ million to $\$ 2$ billion in 2024 and by more than $\$ 10$ billion over five years.


## Beneficiary and provider

- We do not expect this recommendation to have adverse effects on beneficiaries' access to highquality home health care. Given the current level of payments, we do not expect the recommendation to affect providers' willingness to deliver home health care.


## Endnotes

1 The Medicare statute permits nurse practitioners, clinical nurse specialists, and physician assistants to order and supervise home health care services. State laws on medical scope of practice also govern the services these practitioners are permitted to deliver and may limit the ability of some nonphysician practitioners to order home health care.

2 As of November 2022, this measure of access is based on data collected and maintained as part of CMS's Home Health Compare database. The service areas listed are postal ZIP codes where an HHA has provided services in the past 12 months. This definition may overestimate access because HHAs need not serve the entire ZIP code to be counted as serving it. At the same time, the definition may understate access if HHAs are willing to serve a ZIP code but did not receive a request in the previous 12 months. The analysis excludes beneficiaries with unknown ZIP codes.

3 HHAs operating in Florida, Illinois, Ohio, North Carolina, and Texas are subject to additional review of their claims under the demonstration. HHAs subject to additional review can choose one of three options: prepayment claims review, postpayment claims review, or forgoing a review and accepting a 25 percent payment reduction. If an HHA that selects one of the first two options is found to have billed Medicare correctly for at least 90 percent of review claims, that HHA may elect a less burdensome review.

4 HHAs can voluntarily report telehealth services beginning on January 1, 2023, with mandatory reporting beginning July 1, 2023.

5 If we approximate marginal cost as total Medicare costs minus fixed building and equipment costs, then marginal profit can be calculated as follows:

Marginal profit = (Medicare payments - (total Medicare costs - fixed costs)) / Medicare payment.

This comparison is a lower bound on the marginal profit because we do not consider any potential labor costs that are fixed.

6 CAHPS is a registered trademark of the Agency for Healthcare Research and Quality.

7 These payment per visit amounts were computed by dividing the total Medicare PPS payments in each year by the total number of visits (for 2021, only payments and in-person visits for 30-day periods paid under the PDGM were included).

8 The BBA of 2018 required CMS to set spending under the PDGM so that it was equal to what Medicare would have spent under the predecessor payment system if the latter had been in effect in 2020.

9 The amount of the relief funds included in the calculation of Medicare margins was determined by applying the proportion of an HHA's revenues attributable to Medicare in 2019 to the total pandemic-related relief funds reported on the cost report.

10 The 3.925 percent reduction in the base rate in 2023 applies to about 92 percent of 30-day periods and does not apply to about 8 percent of 30-day periods that were paid on a per visit basis under the low-utilization payment adjustment. As a result, the aggregate reduction in 2023 is slightly lower at 3.5 percent.

## References

Amedisys. 2022. Quarterly report (Form 10-Q). Filing submitted to the Securities and Exchange Commission. https:// d18rn0p25nwr6d.cloudfront.net/CIK-0000896262/d476c2c8-f5ee-4dd4-95b4-ce5e31f8bf8c.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2020. Home health agencies: CMS flexibilities to fight COVID-19. https://www.cms.gov/files/ document/home-health-agencies-cms-flexibilities-fight-covid-19.pdf.

Enhabit. 2022. Quarterly report (Form 10-Q). Filing submitted to the Securities and Exchange Commission. https:// d18rn0p25nwr6d.cloudfront.net/CIK-0001803737/2ded071f-cecc-4428-b492-fd339df584ec.pdf.

Enhabit Home Health \& Hospice. 2022. Enhabit Home Health \& Hospice second quarter 2022 earnings conference call. August 2. https://s201.q4cdn.com/374903510/files/doc_ downloads/2022/08/Transcript_Enhabit-Home-Health-and-Hospice-Q2-2022-Earnings-Call_5248158_final.pdf.

LHC Group. 2022. LHC Group to acquire home health provider in Georgia. Press release. August 16. https://lhcgroup.com/ newsroom/lhc-group-to-acquire-home-health-provider-ingeorgia/.

Medicare Payment Advisory Commission. 2021. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2019. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Reuters. 2022. UnitedHealth to buy LHC Group for $\$ 5.4$ billion in home healthcare push. March 29. https://www.reuters.com/ business/healthcare-pharmaceuticals/unitedhealth-buy-lhc-group-about-54-billion-2022-03-29/.

Seeking Alpha. 2022. Amedisys Inc (AMED) CEO Chris Gerard on Q2 2022 results. Earnings call transcript. https://seekingalpha. com/article/4527133-amedisys-inc-amed-ceo-chris-gerard-on-q2-2022-results-earnings-call-transcript.

Shang, J., A. M. Chastain, U. G. E. Perera, et al. 2020. COVID-19 preparedness in US home health care agencies. Journal of the American Medical Directors Association 21, no. 7 (July): 924-927.

## Inpatient rehabilitation facility services



# Inpatient rehabilitation facility services 

## Chapter summary

Inpatient rehabilitation facilities (IRFs) provide intensive rehabilitation services to patients after illness, injury, or surgery. Rehabilitation programs are supervised by rehabilitation physicians and include services such as physical and occupational therapy, rehabilitation nursing, speech-language pathology, and prosthetic and orthotic services. In 2021, Medicare spent $\$ 8.5$ billion on 379,000 fee-for-service (FFS) IRF stays in about 1,180 IRFs nationwide. On average, the FFS Medicare program accounted for about 52 percent of IRF discharges.

## Assessment of payment adequacy

In 2021, most IRF payment adequacy indicators remained positive or improved, despite the continued impact of the coronavirus pandemic on IRFs' daily operations; however, indicators continued to vary substantially across IRFs.

Beneficiaries' access to care-Despite the impact of the coronavirus pandemic, our analysis of IRF supply and volume of services provided and IRFs' marginal profit under the IRF prospective payment system (PPS) suggest that access remains adequate.

## In this chapter

- Are Medicare payments adequate in 2023?
- How should Medicare payments change in 2024 ?
- Capacity and supply of providers-Between 2020 and 2021, the number of IRFs and IRF beds slightly increased. The aggregate IRF occupancy rate was 68 percent, indicating that capacity is more than adequate to meet demand.
- Volume of services-From 2020 to 2021, Medicare cases per 10,000 FFS beneficiaries increased by about 4 percent.
- Marginal profit-The marginal profit, an indicator of whether IRFs with excess capacity have an incentive to treat more Medicare beneficiaries, was 22 percent for hospital-based IRFs and 41 percent for freestanding IRFs-a very strong indicator of access.

Quality of care-In 2021, the mean facility risk-adjusted rate of successful discharge to the community from IRFs was 67.6 percent and the mean facility risk-adjusted rate of hospitalizations was 7.2 percent. The coronavirus pandemic and related policies confound our measurement and assessment of trends in our quality measures.

Providers' access to capital-Between 2020 and 2021, freestanding IRFs' allpayer total margin grew from 10.2 percent to 14.0 percent, and the largest IRF chain (which accounted for almost a third of all Medicare FFS IRF discharges) continued to open new IRFs and enter joint ventures with other organizations, suggesting strong access to capital. Hospital-based IRFs continued to have strong access to capital through their parent hospitals.

Medicare payments and providers' costs-IRFs' Medicare margin increased to 17.0 percent in 2021, driven by slow cost growth. The Medicare margin for relatively efficient IRFs was even higher, at about 20 percent, as these IRFs were generally able to leverage greater economies of scale. We anticipate that the 2023 margin will decrease to 11 percent, driven in part by the expiration of public health emergency-related increases in Medicare payments to IRFs.

## How should payment rates change in 2024?

Given our positive payment adequacy indicators, the Commission recommends that, for fiscal year 2024, the 2023 IRF base payment rate be reduced by 3 percent. This recommendation would continue to provide IRFs with sufficient revenues to maintain beneficiaries' access to IRF care while bringing IRF PPS payment rates closer to the cost of delivering high-quality care efficiently.

## Background

After illness, injury, or surgery, some patients need intensive inpatient rehabilitative care, including speech-language pathology, physical, and occupational therapy. Such services can be provided in inpatient rehabilitation facilities (IRFs). ${ }^{1}$ IRFs must be focused primarily on treating conditions that typically require intensive rehabilitation, among other requirements. IRFs can be freestanding facilities or specialized units within acute care hospitals (ACHs). To qualify for a covered IRF stay, a beneficiary must, among other criteria, be able to tolerate and benefit from intensive therapy and must have a condition that requires frequent, face-to-face supervision by a rehabilitation physician. To reimburse IRFs for their facility's costs of providing inpatient services, fee-forservice (FFS) Medicare sets per discharge payment rates under the IRF prospective payment system (PPS). ${ }^{2}$ In 2021, Medicare spent $\$ 8.5$ billion on 379,000 IRF stays paid under the IRF PPS in about 1,180 IRFs nationwide. On average, the FFS Medicare program accounted for about 52 percent of IRF discharges.

Under the IRF PPS, each Medicare patient is assigned to a rehabilitation impairment category (RIC) based on the principal diagnosis or impairment and further classified to a case-mix group (CMG) within the RIC based on the patient's age and level of motor and cognitive function. ${ }^{3}$ And within each CMG, patients are further classified into one of four tiers based on the presence of certain comorbidities that have been found to increase the cost of care. The IRF PPS also has outlier payments for patients who are extraordinarily costly. ${ }^{4}$

## Medicare facility requirements for IRFs

To qualify as an IRF for Medicare payment, a facility must meet the Medicare conditions of participation for ACHs. ${ }^{5}$ It must also:

- have a preadmission screening process to determine that each prospective patient is likely to benefit significantly from an intensive inpatient rehabilitation program;
- ensure that the patient receives close medical supervision and provide-through qualified
personnel-rehabilitation nursing, physical therapy, occupational therapy, and, as needed, speechlanguage pathology and psychological (including neuropsychological) services, social services, and orthotic and prosthetic services;
- have a medical director of rehabilitation with training or experience in rehabilitation who provides services in the facility on a full-time basis for freestanding IRFs or at least 20 hours per week for hospital-based IRF units;
- use a coordinated interdisciplinary team led by a rehabilitation physician that includes a rehabilitation nurse, a social worker or case manager, and a licensed therapist from each therapy discipline involved in the patient's treatment;
- have a treatment plan for each patient, which is established, reviewed, and revised as needed by a physician in consultation with other professional personnel who provide services to the patient; and
- meet the compliance threshold, which requires that no less than 60 percent of patients admitted to an IRF have as a primary diagnosis or comorbidity at least 1 of 13 conditions specified by CMS. ${ }^{6}$ The intent of the compliance threshold is to distinguish IRFs from ACHs. If an IRF does not meet the compliance threshold, Medicare pays for all its cases based on the inpatient hospital PPS rather than the IRF PPS.


## Medicare coverage criteria for beneficiaries

Medicare applies additional criteria that govern whether IRF services are covered for an individual Medicare beneficiary. For an IRF claim to be considered reasonable and necessary, the patient must be reasonably expected to meet the following requirements at admission: ${ }^{7}$

- The patient requires active and ongoing therapy in at least two modalities, one of which must be physical or occupational therapy.
- The patient can actively participate in and benefit from intensive therapy that most typically consists of three hours of therapy a day at least five days a week.

In 2021, more IRFs opened than closed, and the majority of new IRFs were freestanding and for profit


Note: IRF (inpatient rehabilitation facility). "Other" includes government, hospital-based for-profit, and freestanding nonprofit facilities
Source: MedPAC analysis of Provider of Services data

- The patient is sufficiently stable at the time of admission to actively participate in the intensive rehabilitation program.
- The patient requires supervision by a rehabilitation physician. This requirement is satisfied by face-toface physician visits with a patient at least three days a week. Beginning with the second week of admission to the IRF, a nonphysician practitioner who is determined by the IRF to have specialized training and experience in inpatient rehabilitation may conduct one of the three required face-to-face visits with the patient per week, provided that such duties are within the nonphysician practitioner's scope of practice under applicable state law.
- The patient requires an intensive and coordinated interdisciplinary team approach to the delivery of rehabilitative care.


## Are Medicare payments adequate in 2023?

To assess whether payments for fiscal year 2023 are adequate to cover the costs providers incur and how much providers' costs are expected to change in the coming year (2024), we examine several indicators of payment adequacy. Specifically, we assess beneficiaries' access to care by examining the capacity and supply of IRFs and changes over time in the volume of services provided, quality of care, providers' access to capital, and the relationship between Medicare payments and providers' costs.

In general, our indicators of IRF payment adequacy are positive.

The number of IRFs continued to grow in 2021

|  | Share of Medicare | Number of IRFs |  |  |  |  | Average annual change |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Type of IRF | discharges 2021 | 2017 | 2018 | 2019 | 2020 | 2021 | 2017-2019 | 2020-2021 |
| All IRFs | 100\% | 1,178 | 1,170 | 1,152 | 1,159 | 1,181 | -7.1\% | 1.9\% |
| Urban | 90 | 1,019 | 1,014 | 1,000 | 1,004 | 1,021 | -0.9 | 1.7 |
| Rural | 6 | 159 | 156 | 152 | 155 | 160 | -2.2 | 3.2 |
| Freestanding | 55 | 279 | 290 | 299 | 310 | 329 | 3.5 | 6.1 |
| Hospital based | 41 | 899 | 880 | 853 | 849 | 852 | -2.6 | 0.4 |
| Nonprofit | 33 | 655 | 642 | 634 | 623 | 620 | -7.6 | -0.5 |
| For profit | 60 | 392 | 400 | 393 | 414 | 436 | 0.1 | 5.3 |
| Government | 6 | 125 | 121 | 116 | 113 | 175 | -3.7 | 1.8 |

Note: IRF (inpatient rehabilitation facility), FFS (fee-for-service). Components may not sum to totals due to missing data.
Source: MedPAC analysis of Provider of Services data and Medicare Provider Analysis and Review data from CMS.

## Beneficiaries' access to care: IRF supply and service volume suggest sufficient access

We have no direct indicators of beneficiaries' access to IRF care. Although there are IRF admission criteria, it is not clear when IRF care is required for a given patient. Other potentially lower-cost post-acute care (PAC) providers such as a skilled nursing facility (SNF) can provide similar care. The absence of IRFs in some areas of the country implies that beneficiaries in these areas receive similar services in other settings. Nevertheless, our analysis of IRF supply and volume of services suggests that capacity remains adequate to meet demand. Moreover, the marginal profit, an indicator of whether IRFs with excess capacity have an incentive to treat more Medicare beneficiaries, was robust in 2021 for both freestanding and hospital-based IRFs, a very strong indicator of patient access.

## Number of IRFs and occupancy rates suggest adequate capacity and supply

In 2021, there were 22 IRF openings and 5 closures (Figure 9-1). The majority of IRFs that opened were freestanding and for profit, and most closures were hospital-based nonprofits.

In 2021, the number of IRFs continued to increase (Table 9-1). After gradually declining from 2017 to 2019, the number of IRFs rose between 2019 and 2020 from 1,152 to 1,159 in 2020. This trend continued in 2021, with the number of IRFs increasing by 1.9 percent to 1,181 facilities. The majority of IRFs are located in urban areas; only about 14 percent of all IRFs are located in rural areas. In 2021, the number of both urban and rural IRFs grew, by 1.7 percent and 3.2 percent, respectively. From 2017 to 2019, freestanding and for-profit IRFs continued an upward trajectory, growing by 3.5 percent and 0.1 percent, respectively. In contrast, hospitalbased and nonprofit IRFs have been on a steady decline for many years. Between 2017 and 2019, the number of hospital-based IRFs fell by 2.6 percent and the number of nonprofit IRFs fell by 1.6 percent. Yet, between 2020 and 2021, there were slight increases in multiple categories of IRFs, including the number of hospitalbased IRFs.

Though the number of freestanding IRFs has risen from year to year, the share of hospital-based IRFs is still greater than freestanding IRFs. In 2021, over 70 percent of IRFs were hospital based; the rest were freestanding facilities. However, because hospital-based units have,

## Stroke, other neurological conditions, and debility remain the most common conditions in IRFs


[^17]Source: MedPAC analysis of Inpatient Rehabilitation Facility-Patient Assessment Instrument data from CMS.
on average, fewer beds and a lower share of Medicare discharges, they accounted for only 41 percent of Medicare discharges. In contrast, freestanding facilities made up about 28 percent of the IRF supply but accounted for about 55 percent of Medicare discharges. Similarly, for-profit IRFs made up about 37 percent of the total number of IRFs but accounted for about 60 percent of Medicare discharges. For-profit IRFs are disproportionately freestanding.

In 2021, the aggregate IRF occupancy rate slightly increased to 68 percent ( 67 percent in 2020). From 2020 to 2021, the aggregate occupancy rate rose from 69 percent to 71 percent among freestanding IRFs, while the aggregate occupancy rate for hospital-
based IRFs remained stable at 65 percent. These rates suggest that capacity is more than adequate to meet demand for IRF services. Although IRFs provide a more intense level of therapy, IRFs are not the sole providers of rehabilitation services in communities. SNFs also provide rehabilitation services in an institutional setting, and home health agencies, comprehensive outpatient rehabilitation facilities, and independent therapy providers furnish care at home or on an outpatient basis. Given the number and distribution of these other rehabilitation therapy providers, it is unlikely that areas exist where IRFs are the only provider of rehabilitation therapy services available to Medicare beneficiaries.

|  | Freestanding |  | Hospital based |  |
| :---: | :---: | :---: | :---: | :---: |
| Condition | For profit | Nonprofit | For profit | Nonprofit |
| Stroke | 15\% | 24\% | 16\% | 23\% |
| Other neurological conditions | 21 | 8 | 10 | 9 |
| Fracture of the lower extremity | 10 | 8 | 15 | 13 |
| Debility | 14 | 14 | 16 | 14 |
| Brain injury | 11 | 12 | 13 | 11 |
| Other orthopedic conditions | 8 | 6 | 7 | 6 |

Note: FFS (fee-for-service), IRF (inpatient rehabilitation facility). "Other neurological conditions" includes multiple sclerosis, Parkinson's disease, polyneuropathy, and neuromuscular disorders. "Fracture of the lower extremity" includes hip, pelvis, and femur fractures. Patients with debility have generalized deconditioning not attributable to other conditions. "Other orthopedic conditions" excludes fractures of the hip, pelvis, and femur, and hip and knee replacements. "Brain injury" includes both traumatic and non-traumatic injuries. All FFS Medicare IRF cases with valid patient assessment information were included in this analysis.

Source: MedPAC analysis of Inpatient Rehabilitation Facility-Patient Assessment Instrument data from CMS.

## Patterns of use in IRFs

In 2021, the most common condition treated by IRFs was stroke-accounting for almost one-fifth of casesfollowed by other neurological conditions and debility (Table 9-2).

Debility cases have steadily risen since 2017. Between 2017 and 2021, the share of IRF cases with debility increased from 10.7 percent to 14.0 percent of IRF discharges (Table 9-2). Unlike the other conditions treated in IRFs, debility has a broader definition that encompasses many types of impairment. This condition includes a mix of patients with a state of general weakness or discomfort that may be an outcome of one or more conditions, including coronavirus disease 2019 (COVID-19) (Czeisler et al. 2020, Encompass Health 2021). During the coronavirus public health emergency (PHE), CMS has waived two IRF criteria: the " 3 -hour rule" and the " 60 percent rule." The waiver of the 3-hour rule allows IRFs to admit patients even if they are not able to tolerate three hours of intense therapy a day; the waiver of the 60 percent rule allows IRFs to forgo the requirement that at least 60 percent of patients admitted to an IRF have as a primary diagnosis or comorbidity at least 1 of 13 qualifying conditions (for
a description of IRF PHE waivers, see the IRF chapter of our March 2022 report to the Congress). The waiver of these rules allows IRFs to treat a broader mix of patients, including those without a qualifying condition or who were unable to tolerate intensive therapy, possibly leading IRFs to admit a greater number of cases categorized as debility in more recent years.

The distribution of case types differs by type of IRF and ownership (Table 9-3). For example, in 2021, only 15 percent of cases in freestanding for-profit IRFs were admitted for rehabilitation following a stroke, compared with 23 percent of cases in hospital-based nonprofit IRFs. By contrast, 21 percent of cases in freestanding for-profit IRFs were admitted with other neurological conditions, over twice the share admitted to hospital-based nonprofit IRFs. Cases with fracture of the lower extremity made up a higher share of cases in hospital-based for-profit facilities than in all other IRF types. The share of cases with debility, brain injury, or other orthopedic conditions was generally similar across IRF types. The Commission has previously reported that some case types are more profitable than others under the IRF PPS (for more details, see the IRF chapter of our March 2022 report to the Congress); we while cases per beneficiary increased to near prepandemic levels

|  | Prepandemic |  | Coronavirus pandemic |  | Average annual change |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2017 | 2019 | 2020 | 2021 | 2017-2019 | 2020-2021 |
| Number of FFS cases | 396,000 | 409,000 | 379,000 | 379,000 | 1.6\% | 0.0\% |
| Cases per 10,000 FFS beneficiaries | 102.0 | 106.0 | 100.9 | 104.6 | 2.0 | 3.6 |
| ALOS (in days) | 12.7 | 12.6 | 12.9 | 12.9 | -0.6 | -0.2 |
| Number of users | 355,000 | 363,000 | 335,000 | 335,000 | 1.2 | -0.1 |

Note: IRF (inpatient rehabilitation facility), FFS (fee-for-service), ALOS (average length of stay). The number of FFS cases and the number of beneficiaries are rounded.

Source: MedPAC analysis of Medicare Provider Analysis and Review data from CMS.
further discuss profitability by IRF case type below (see p. 269).

## In 2021, FFS Medicare beneficiaries' IRF stays held steady, but IRF cases per beneficiary neared prepandemic levels

Between 2017 and 2019, the number of FFS cases steadily rose, reaching over 409,000 cases by 2019 (Table 9-4). In 2020, however, the total number of FFS IRF cases fell by 7.4 percent to about 379,000 cases. The number of cases fell in April 2020 and subsequently rebounded by July 2020, reaching about 95 percent of prepandemic levels for the rest of the year. A large portion of IRF volume comes from patients who are transferred from the ACH setting after surgery. The drop in volume in April 2020 is consistent with a temporary suspension of elective surgeries in ACHs from March 2020 through May 2020. The rebound in volume in summer 2020 was likely the result of the pent-up demand for surgical services after many FFS beneficiaries' surgeries had been canceled or delayed.

From 2020 to 2021, the number of FFS cases was stable at about 379,000 cases (Table 9-4). However, controlling for the number of FFS beneficiaries, the number of cases increased 3.6 percent in 2021. The
number of FFS IRF users remained steady in 2021 at about 335,000 . Average length of stay remained stable at 12.9 days.

## Marginal profit provides incentive to treat more Medicare beneficiaries

Another measure of access is whether providers have a financial incentive to expand the number of Medicare beneficiaries they serve. In considering whether to treat a patient, a provider with excess capacity compares the marginal revenue it will receive (i.e., the Medicare payment) with its marginal costs-that is, the costs that vary with volume. If Medicare payments are larger than the marginal costs of treating an additional beneficiary, a provider has a financial incentive to care for Medicare beneficiaries. ${ }^{8,9} \mathrm{We}$ found that Medicare payments in 2021 exceeded marginal costs by a substantial amount-22 percent for hospital-based IRFs and 41 percent for freestanding IRFs-suggesting that IRFs with available beds have a strong incentive to admit Medicare patients.

## Quality of care is difficult to assess

The quality of IRF care in 2020 and 2021 is difficult to assess due to the effects of the coronavirus pandemic on beneficiaries and providers. Each year, we track

| Measure | Provider subgroup | Prepandemic |  | Coronavirus pandemic |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  |  | 2017 | 2019 | 2020 | 2021 |
| All-condition hospitalizations within an IRF stay | All IRFs | 7.9\% | 7.8\% | 7.8\% | 7.2\% |
|  | Nonprofit | 7.8 | 7.7 | 7.8 | 7.3 |
|  | For profit | 7.9 | 7.9 | 7.8 | 7.2 |
|  | Hospital based | 7.8 | 7.7 | 7.8 | 7.2 |
|  | Freestanding | 8.0 | 7.8 | 8.0 | 7.2 |
| Successful discharge to community | All IRFs | 64.8\% | 65.5\% | 67.3\% | 67.6\% |
|  | Nonprofit | 64.9 | 65.6 | 67.6 | 68.0 |
|  | For profit | 64.7 | 65.3 | 66.8 | 67.0 |
|  | Hospital based | 65.2 | 66.0 | 67.9 | 68.1 |
|  | Freestanding | 63.6 | 64.2 | 66.0 | 66.5 |

Note: IRF (inpatient rehabilitation facility). "Successful discharge to the community" includes beneficiaries discharged to the community (including those discharged to the same nursing home) who did not have an unplanned hospitalization or die in the 30 days after discharge. The allcondition hospitalization measure captures all unplanned hospital admissions and readmissions and outpatient observation stays that occur during the stay. Both measures are uniformly defined and risk adjusted across the four PAC settings. Providers with least 60 stays in the year (the minimum count to meet a reliability of 0.7) were included in calculating the average facility rate. High rates of successful discharge to the community indicate better quality. High rates of hospitalizations during a stay indicate worse quality.

Source: MedPAC analysis of IRF claims and linked inpatient hospital stays from 2017 through 2021 for fee-for-service beneficiaries.
changes in the quality measures and assess whether they improved, declined, or stayed the same. While we report 2021 results for our quality measures, we have not used those results to inform our conclusions about trends in IRFs' quality of care. The results reflect temporary changes in the delivery of care and data limitations unique to the coronavirus pandemic rather than trends in quality of care provided to beneficiaries. In addition, the Commission's IRF quality metrics rely on risk-adjustment models developed using data from previous years. COVID-19 is a relatively new diagnosis and therefore is not included in the current riskadjustment models, though many associated conditions are. As a result, our models may not adequately represent the acuity and mix of patients receiving care from IRFs in 2021. Therefore, we report the changes observed in the quality measures but do not draw conclusions about whether quality has improved, worsened, or stayed the same.

We report two quality-of-care measures: average risk-adjusted rates of successful discharge to the community and all-condition hospitalizations during an IRF stay. Discharges to hospice and beneficiaries with the hospice benefit are excluded from the calculation of both measures. Both measures are uniformly defined and are risk adjusted across all PAC settings. ${ }^{10}$

## Hospitalizations within an IRF stay

In 2021, the national average rate of risk-adjusted allcondition hospitalizations within FFS Medicare IRF stays was 7.2 percent (Table $9-5$ ). There were not large differences by type of IRF. The hospitalization measure captures all unplanned hospitalizations (admissions and readmissions) and outpatient observation stays that occur during the IRF stay. (Beneficiaries who died during the IRF stay are excluded from the measure.) Rehospitalizations expose beneficiaries to hospitalacquired infections, increase the number of transitions
between settings (which are disruptive to patients), and can result in medical errors (such as medication errors). In addition, they unnecessarily increase Medicare spending. Because IRFs are also hospitals, the rate of rehospitalizations is typically lower than for other PAC settings.

## Discharges from IRF to community

In 2021, the rate of successful discharge to the community was 67.6 percent (Table 9-5, p. 267). There were not large differences by ownership. This measure includes beneficiaries discharged to the community who did not have an unplanned hospitalization and did not die in the succeeding 30 days. ${ }^{11}$

## IRFs' access to capital remained strong in 2021

Almost three-quarters of IRFs are hospital-based units that access any necessary capital to maintain, modernize, or expand through their parent hospitals. Overall, as detailed in the hospital chapter of this report (Chapter 3), general acute care hospitals' access to capital strengthened in 2021: The all-payer operating margin among hospitals paid under the inpatient PPSs reached a record high despite a decline in federal relief funds. Additionally, hospitals maintained strong access to bond markets. While the effect of the coronavirus pandemic on hospitals' finances varied substantially across hospitals, we have no evidence that it has had a negative effect on hospitals' long-term access to the capital markets.

In 2021, the all-payer total margins for freestanding IRFs remained strong at 14.0 percent, up from 10.2 percent in $2020 .{ }^{12}$ Profitability varied by ownership: For-profit freestanding IRFs had an all-payer total margin of 15.8 percent, compared with about 9.3 percent for nonprofit freestanding IRFs.

In 2021, the IRF industry's largest chain, Encompass Health-which owned almost 45 percent of freestanding IRFs and accounted for about 31 percent of all Medicare IRF discharges-opened 8 IRFs and added 117 beds to existing IRFs. The company opened nine new IRFs in 2022 and has plans to open eight in 2023. Most of the expansion activity is located in Florida, following the recent partial repeal of Florida's certificate-of-need law, ${ }^{13}$ effective July 2021 (Encompass Health 2022). In addition, in 2021,

Encompass Health acquired or opened 25 home health and hospice locations, including sites in three frontier states where it had not operated previously: Alaska, Montana, and Washington (Encompass Health 2022). More recently, on July 1, 2022, Encompass Health completed its spinoff of Enhabit Home Health and Hospice, which is now a publicly traded company that is separate from its inpatient rehabilitation line of business.

Most other freestanding IRFs are independent or local chains with a limited number of facilities. The extent to which these nonchain IRFs have access to capital is less clear.

## Medicare payments and providers' costs: IRFs' Medicare margin remained high in 2021

In 2021, the aggregate Medicare margin remained high, rising above prepandemic levels. IRFs' Medicare margin increased to 17 percent, up from 13 percent in 2020. Including an estimated Medicare share of federal relief funds proportional to FFS Medicare's share of IRFs' revenue in 2019, IRFs' FFS Medicare margin was 17.5 percent. ${ }^{14}$

## In 2021, IRFs' payments per case continued to grow faster while growth in costs per case returned to the prepandemic trend

From 2020 to 2021, IRFs' payments per case grew 6.3 percent, which was higher than prepandemic payment growth but slightly lower than growth from 2019 to 2020. The faster growth in payments relative to prior years resulted from several factors:

- Higher annual update to payment rates: In 2021, the annual update to IRF PPS base rates was 2.4 percent. This update was higher than in prior years primarily because the budgetary reductions mandated through 2019 expired. ${ }^{15}$
- Increase in Medicare payments during part of the pandemic: Effective May 1, 2020, through March 31, 2022, the Congress increased Medicare IRF payments by suspending the 2 percent sequestration on the Medicare program's share of all FFS payments. That sequester relief applied to only half of fiscal year 2020 but to the entirety of fiscal year 2021. ${ }^{16}$
- Growth in outlier payments: Outlier payments to IRFs climbed about 27 percent in 2021, increasing total payments by almost 1 percent.
- Growth in case mix: After rising 11 percent in 2020, IRFs' overall case-mix index (CMI), which measures the severity of patients' health status, increased by almost 1 percent in 2021.

Meanwhile, in 2021, IRFs' cost growth decreased to slightly below prepandemic levels. Specifically, IRFs' cost per case grew 2.0 percent, compared with 2.3 percent in 2019 and 8.6 percent in 2020.

## In 2021, IRFs' Medicare margin increased to 17 percent, but margins across IRFs continued to vary significantly

In 2021, the aggregate IRF Medicare margin increased to 17.0 percent ( 17.5 percent when including Medicare's share of federal relief funds) from 13.4 percent in 2020 (14.9 percent when including Medicare's share of federal relief funds). The aggregate Medicare margin rose among all subgroups of IRFs we examined, though there continues to be significant variation (Table 9-6, p. 270). For example, the hospital-based IRF Medicare margin was 5.8 percent, compared with 25.8 percent for freestanding IRFs. While there was variation within each group of IRFs, in aggregate, the Medicare margin continued to be higher and positive-with or without federal relief funds-at IRFs that were freestanding, for profit, urban, larger, and had a greater share of FFS Medicare patients. In contrast, the Medicare margin continued to be lower among IRFs that were hospital based, nonprofit, and smaller.

FFS Medicare margins also vary by IRFs' share of low-income patients (Table 9-6, p. 270). Similar to the disproportionate share hospital adjustment for hospitals paid under the inpatient PPSs, IRFs receive low-income percentage (LIP) payments that are intended to offset costs incurred by treating a large or disproportionate number of low-income patients. In 2021, the Medicare margin for IRFs with a large share of low-income patients (constituting more than 25 percent of the facility's discharges) was 9.7 percent. In comparison, the Medicare margin for IRFs with a small share of low-income patients (less than 5 percent of a facility's discharges) was 20.0 percent.

## Patient mix contributes to differences in IRF profitability

As previously noted in our March 2021 report to the Congress, multiple factors account for the disparity in margins between hospital-based and freestanding IRFs, including differences in economies of scale and stringency of cost control, but also in service and patient mix. We reported that profitability appeared to vary by IRF rehabilitation impairment categories (RICs). For example, using fiscal year 2017 data, we showed that "other neurological" stays were more profitable than stroke stays (the "other neurological" RIC had an average payment-to-cost ratio (PCR) of 1.20 compared with an average PCR of 1.07 for stroke stays) (Medicare Payment Advisory Commission 2021).

Using more recent data, we found that profitability also differs for stays by CMGs within RICs. Higherseverity CMGs within a RIC were more profitable (i.e., had higher PCRs) compared with lower-severity CMGs. For example, among cases with stroke, the least severe (highest motor score) CMG had payments that were 5 percent lower than costs on average (i.e., a PCR of 0.95), while the most severe (lowest motor score) CMG had payments that exceeded costs by 17 percent on average (i.e., a PCR of 1.17) (Figure 9-2, p. 271). Profitability steadily increased as severity worsened, except for one CMG. We found similar inverse relationships between profitability and functional severity among the CMGs of other IRF conditions.

A general principle of payment systems is that payment weights should reflect differences in the expected relative costs of providing care to patients across CMGs. That is, a case that costs twice as much to treat as another should have twice the payment weight. Having payments aligned with costs is intended to minimize incentives for providers to admit one type of patient over another. A payment system that overpays for more severe cases and underpays for less severe ones might induce providers to differentially select the most severe cases (or code those patients into the most severe category) over less severe (and less profitable) cases.

Differences in profitability by CMG may contribute to variation in provider profitability if some providers tend to admit more profitable cases (or code patients into more profitable CMGs). The CMI, or the average

## IRFs' aggregate Medicare margin increased to $\mathbf{1 7}$ percent in 2021

| Type of IRF | Prepandemic |  |  | Coronavirus pandemic |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2017 | 2018 | 2019 | 2020 | 2021 |
| All IRFs | 13.9\% | 14.7\% | 14.3\% | 13.4\% | 17.0\% |
| Hospital based | 1.4 | 2.6 | 2.2 | 1.7 | 5.8 |
| Freestanding | 25.7 | 25.4 | 24.7 | 23.4 | 25.8 |
| Nonprofit | 2.0 | 2.6 | 1.4 | -0.1 | 5.3 |
| For profit | 24.3 | 24.6 | 24.3 | 23.5 | 25.3 |
| Government | N/A | N/A | N/A | N/A | N/A |
| Urban | 14.2 | 15.0 | 14.7 | 13.7 | 17.4 |
| Rural | 8.7 | 9.9 | 8.6 | 9.5 | 17.5 |
| Number of beds |  |  |  |  |  |
| 1 to 10 | -10.6 | -5.9 | -4.3 | -7.3 | -2.4 |
| 11 to 24 | 0.7 | 2.3 | 2.1 | 2.3 | 5.7 |
| 25 to 64 | 15.7 | 16.9 | 16.0 | 15.1 | 18.9 |
| 65 or more | 22.0 | 21.2 | 20.9 | 19.3 | 22.1 |
| FFS Medicare share |  |  |  |  |  |
| <50\% | 7.8 | 8.7 | 8.6 | 7.5 | 11.5 |
| 50\% to 75\% | 18.4 | 19.2 | 18.5 | 17.3 | 20.5 |
| >75\% | 12.8 | 14.0 | 15.0 | 17.4 | 20.4 |
| Low-income patient share |  |  |  |  |  |
| 0\% to 5\% | 18.2 | 16.9 | 16.5 | 15.7 | 20.0 |
| 5\% to 10\% | 16.8 | 18.2 | 18.1 | 16.3 | 19.1 |
| 10\% to 15\% | 14.4 | 16.7 | 15.0 | 14.3 | 17.3 |
| 15\% to 20\% | 14.6 | 13.6 | 15.2 | 15.5 | 16.7 |
| 20\% to 25\% | 2.6 | 5.8 | 2.4 | 7.6 | 17.2 |
| >25\% | 7.0 | 6.3 | 6.6 | 4.8 | 9.7 |

Note: IRF (inpatient rehabilitation facility), FFS (fee-for-service), N/A (not applicable). Government-owned facilities operate in a different financial context from other facilities, so their margins are not necessarily comparable. Their margins are not presented separately here, although they are included in the margins for other groups (e.g., "all IRFs"), where applicable. Percentages may not sum to 100 due to rounding.

Source: MedPAC analysis of cost report data from CMS
payment weight across a provider's stays, is a measure of the severity of a provider's patient panel: Providers with higher CMIs serve higher-severity patient panels, all else equal. We found that CMIs have increased over time. In 2021, nearly 60 percent of IRFs had a CMI of
1.3 or more, and only 2 percent had a CMI between 1.0 and 1.1 (Figure $9-3$, p. 272). In contrast, in 2007, most providers had a CMI between 1.0 and 1.2. A variety of factors has contributed to the increase in CMI, including CMS policy changes related to coverage criteria, the


Stroke case-mix group ( $M=$ motor score, $C=\operatorname{cognitive}$ score, $A=$ age)

Note: IRF (inpatient rehabilitation facility), PCR (payment-to-cost ratio), FY (fiscal year). There are 10 case-mix groups within the IRF stroke rehabilitation impairment group (RIC), which increase in severity from left to right. PCRs are calculated by dividing aggregate payments by aggregate costs for stays assigned to each stroke case-mix group.

Source: Urban Institute's analysis of FY 2019 Medicare fee-for-service claims and cost reports from CMS.

60 percent compliance threshold, and calculation of the functional motor score, as well as demographic and pandemic-related changes to the patient population. Differential coding practices may be another contributor to the upward shift in CMIs, and we will continue to investigate these patterns in future work. ${ }^{17}$

Consistent with our finding of higher PCRs for higherseverity case-mix groups, we found that, in 2021, IRFs with higher CMIs tended to be more profitable, on average (Figure 9-4, p. 273). IRFs with CMIs that were 1.3 or higher had payments that exceeded costs by 27 percent (average PCR of 1.27), while IRFs with CMIs that were 1.0 or less had costs that were higher than payments (average PCR of 0.75). In contrast, no such pattern of higher case mix/higher profitability existed in 2007.

The IRF landscape appears to have changed over time, with widening gaps in profitability. The Commission plans to conduct additional analyses to determine whether these changes are related to the methodology used to calculate the payment weights under the IRF PPS. Further investigation is critical since differences in profitability by CMG could induce providers to select some cases over others, undermining access to care for some patients. Moreover, these patterns further incentivize coding patients as more functionally disabled than they truly are. In 2016, the Commission found evidence of such coding practices among the most profitable providers (Medicare Payment Advisory Commission 2016). We continue to observe similar patterns in more recent data and suggest a


Note: IRF (inpatient rehabilitation facility), FY (fiscal year). The provider case-mix index was obtained from the variable "Estimated Average Weight Per Discharge" for each provider. The percentages may not sum to 100 percent due to rounding.

Source: Inpatient rehabilitation facility prospective payment final rule rate setting files for FY 2009 and FY 2023.
strategy that would mitigate incentives to code certain functional ability responses in order to boost payment (see text box on accuracy of IRF assessments, pp. 274275).

## Relatively efficient IRFs continued to have higher quality and lower Medicare costs than other IRFs

Table 9-7 (p. 276) details the characteristics of relatively efficient providers by quality measures; cost and payment measures; and facility differences in case mix, length of stay, occupancy rates, number of beds, and discharges for stroke and other neurological conditions. (For a more detailed discussion of the Commission's methodology for identifying relatively efficient IRFs, see text box, p. 277.)

Our analysis included the 1,012 IRFs that met data requirements and minimum case counts (60). About

17 percent of these IRFs were identified as relatively efficient providers. Hospital-based nonprofit IRFs represented about 45 percent of the relatively efficient group, while freestanding for-profit IRFs made up about 34 percent of the group.

In 2021, relatively efficient IRFs continued to have higher quality and lower costs than other IRFs. Relatively efficient IRFs had lower (better) rates of hospitalization and higher (better) rates of successful discharge to the community. While payment rates to relatively efficient IRFs and all other IRFs were similar, standardized costs per discharge for the relatively efficient group were about 17 percent lower, leading to a large difference in the median Medicare margin (20.4 percent for relatively efficient IRFs compared with 9.5 percent for other IRFs (Table 9-7, p. 276).


Note: IRF (inpatient rehabilitation facility), CMI (case-mix index), PCR (payment-to-cost ratio), FY (fiscal year). PCRs were calculated using variables from the annual rate setting files. We divided total estimated payments by number of discharges multiplied by the estimated average cost per discharge for each provider and calculated a weighted average across providers using the number of discharges. The provider case-mix index was obtained from the estimated average weight per discharge for each provider. We aggregated IRFs into CMI groups, as shown in the figure.

Source: Inpatient rehabilitation facility prospective payment final rule rate setting files for FY 2009 and FY 2023 (https://www.cms.gov/Medicare/ Medicare-Fee-for-Service-Payment/InpatientRehabFacPPS/IRF-Rules-and-Related-Files).

Relatively efficient IRFs were, on average, larger and had higher occupancy rates compared with other IRFs (Table 9-7, p. 276), leading to greater economies of scale. The share of stroke cases was similar between the relatively efficient and other IRFs. On the other hand, the share of other neurological conditions was higher for relatively efficient IRFs compared with other IRFs.

## IRFs' Medicare margin in 2023 is projected to be lower than in 2021

Our best estimate is that IRFs' Medicare margin in 2023 will decrease relative to 2021, driven by higher cost growth in 2022 and 2023 than in prepandemic years.

To estimate 2023 payments, costs, and margins with 2021 data, the Commission considers policy changes effective in 2022 and 2023. These changes include:

- an update of 1.9 percent in 2022 based on an IRF market basket increase of 2.6 percent and an offsetting total productivity adjustment of 0.7 percent;
- the suspension of the 2 percent Medicare sequestration through the end of March 2022 and 1 percent relief from April 2022 through the end of June 2022 due to the coronavirus pandemic;
- an update of 3.9 percent in 2023 based on an IRF market basket increase of 4.2 percent and an


## Improving the accuracy of the IRF patient assessment information

In 2016, the Commission found that patients admitted by more-profitable inpatient rehabilitation facilities (IRF) were less severely ill in the acute care hospital but were coded as more functionally disabled upon admission to the IRF (thereby boosting payment) compared with patients admitted by less-profitable IRFs (Medicare Payment Advisory Commission 2016). This pattern was observed across various conditions (such as stroke, neuromuscular disorders, debility) and within a condition, such as stroke with and without paralysis.

The inverse relationship between an IRF patient's functional abilities at admission and the profitability of the case may be exacerbated by the methodology for computing the functional motor score in the IRF payment system. The motor score is calculated primarily from 16 functional ability items collected on the Inpatient Rehabilitation Facility Patient Assessment Instrument (IRF-PAI) assessment tool when a patient is admitted to an IRF. ${ }^{18}$ IRF patients are assessed from "most dependent" (01) to "fully independent" (06) based on their functional ability on various self-care and mobility items: ${ }^{19}$

- Independent (06)
- Setup or clean-up assistance (05)
- Supervision or touching assistance (04)
- Partial/moderate assistance (03)
- Substantial/maximal assistance (02)
- Dependent (01)

The clinician assessing the patient may select an "activity not attempted" (ANA) code if a functional ability item cannot be assessed for any of the following reasons:

- patient refused
- assessment not applicable ${ }^{20}$
- not attempted due to environmental limitations (e.g., lack of equipment, weather constraints)
- not attempted due to medical conditions or safety concerns

If the clinician uses any of the ANA codes, the item is recoded to the most dependent category (01) when computing the motor score, which, all else equal, results in a lower motor score and raises the payment for the stay. ${ }^{21}$

In 2021, 87 percent of IRF stays had an ANA code for at least 1 of the 16 functional items. ANA coding varied by the item, from a low of 3 percent of stays for functional ability items such as eating and toileting hygiene to a high of 82 percent for walking 150 feet (Figure 9-5). ${ }^{22}$ "Not attempted due to medical conditions or safety concerns" was the most common ANA code. Not surprisingly, higher-complexity function items (such as walking longer distances and stepping) were more frequently not assessed for these reasons compared with other items. For example, medical conditions or safety concerns accounted for 92 percent of stays for which walking 10 feet was not assessed. Patient refusal was the next most common ANA code and was most frequently used for oral hygiene and shower/bathing. Eighteen percent of stays had at least four items that were not assessed, and 6 percent had at least six items not assessed.

## Financial incentives to use "activity not attempted" responses

In many cases, ANA codes are clinically appropriate; it may be harder to assess patients with higher complexity (for medical or safety reasons, for example). However, there is a financial incentive to use ANA codes because they lower the motor score and raise the payment for the stay, all else equal. A 2016 MedPAC study found that patient severity based on the prior acute hospitalization was lower, on average, among high-margin IRFs compared with low-margin IRFs (Medicare Payment Advisory Commission 2016). That is, factors beyond patient severity, such as coding practices, may play a role in IRF profitability.

## Alternative recoding when functional ability items cannot be assessed

Researchers have found that the "most dependent" (01) response may not be the most appropriate

Improving the accuracy of the IRF patient assessment information (cont.) higher-complexity functional ability items, FY 2021


Motor score functional ability item

Note: IRF (inpatient rehabilitation facility), FY (fiscal year). Figure includes assessments for fee-for-service and Medicare Advantage enrollees. *If an individual was not assessed for walking 10 feet, then walking 50 feet with turns and walking 150 feet were automatically skipped in the assessment tool. Skipped responses were included in these percentages.

Source: MedPAC analysis of Inpatient Rehabilitation Facility Patient Assessment Instrument (IRF-PAI) data from CMS.
status for patients who could not be assessed on a functional ability item. In a 2022 report to the Congress regarding a proposed unified post-acute care payment system, the Research Triangle Institute (RTI) used Rasch modeling to examine patients' ability to perform functional ability items that were not coded as ANA and used the resulting relationships to recode ANA items to what the authors considered to be a more appropriate and (most often) higher level of function (RTI International 2022). Of the nine functional ability items that RTI examined, six were recoded one level higher than "most dependent,"
and one item was recoded two levels higher. In addition, as part of the development of functional outcome quality measures for post-acute care, CMS considered use of an imputation model to impute ANA codes based on the other patient characteristics available on the assessment tool (Acumen LLC 2022). Employing an alternative approach to recode ANA to empirically determined responses rather than automatically recoding them to "most dependent" functional status would promote appropriate use of ANA codes.

## Relatively efficient IRFs continued to have higher quality and lower Medicare costs than other IRFs in 2021


[^18]offsetting multifactor productivity adjustment of 0.3 percent; and

- changes to the high-cost outlier amount in 2022 and 2023, which lowered payments by 0.4 percentage point in 2022 and will lower
payments by 0.6 percentage point in 2023 (Table 9-8, p. 278).

Historically, cost growth in this sector has been at or below market basket levels, though between 2019

## Identifying relatively efficient inpatient rehabilitation facilities

TThe Commission is required by the Medicare Prescription Drug, Improvement, and Modernization Act of 2003 to consider the costs associated with an efficient provider. To make this assessment, we examined the financial performance of inpatient rehabilitation facilities (IRFs) that had consistently low costs per discharge and high quality using our new cross-sector postacute care quality measures. We calculated the cost per discharge using cost report and claims data and adjusted for differences in area wages; mix of cases; and prevalence of high-cost outliers, short-stay outliers, and transfer cases. For quality measures, we used risk-adjusted rates of successful discharge to the community and all-condition hospitalizations during a stay. To be included in the group of IRFs that furnished relatively low-cost, high-quality care, an IRF had to be (1) in the best-performing third of the distribution of adjusted cost per discharge or of one of the quality measures for three consecutive years (2017 through 2019) ${ }^{23}$ and (2) not in the worstperforming third of the distribution of adjusted cost per discharge or either of the quality measures for three consecutive years. Only IRFs with at least 60

Medicare fee-for-service discharges were included in the analysis.

The method we used to assess performance attempts to limit drawing incorrect conclusions about performance based on poor data. Using three years (rather than just one year) of data to categorize IRFs as efficient avoids categorizing providers based on random variation or on one "unusual" year. After determining whether an IRF was relatively efficient based on having relatively low costs and good quality care for three years in a row, we calculated performance on several quality and cost measures in 2021. By first assigning an IRF to a group (relatively efficient or other) and then examining the group's performance in the next year, we avoid having a facility's poor data affect both its own categorization and the assessment of the group's performance. Thus, an IRF's erroneous data in 2017,2018 , or 2019 could result in its inaccurate assignment to a group, but because the group's performance is assessed with data from 2021, these "bad" data would not directly affect the assessment of the group's performance.
and 2020, cost growth exceeded the market basket, increasing by 8.6 percent. Many factors related to the coronavirus pandemic drove cost growth in 2020, including faster growth in case mix, spreading fixed costs over fewer IRF cases, labor cost increases, increase in supplies, and longer average length of stay. In 2021, cost growth returned to a level below the market basket, at about 2.0 percent. While the cost growth in the IRF sector is generally low and the rate of cost growth is lower than prepandemic levels in 2021 (2.3 percent in 2019), some effects of the coronavirus pandemic, such as higher costs of labor, could persist through 2023. For that reason, the Commission's margin projection for 2023 conservatively assumes that costs in 2022 and 2023 will increase an average of 4.8 percent a year. Considering these assumptions, we
project an aggregate Medicare margin of 11 percent for IRFs in 2023. However, if cost growth remains low, the aggregate margin will be higher.

## How should Medicare payments change in 2024?

Our payment adequacy indicators suggest that Medicare payments to IRFs were generally adequate in 2021.

For fiscal years 2009 through 2017, the Commission recommended a 0 percent update to the IRF payment rate. For fiscal years 2018 through 2022, however, as the

|  | $\mathbf{2 0 2 1}$ | $\mathbf{2 0 2 2}$ | $\mathbf{2 0 2 3}$ |
| :--- | :--- | :---: | :---: |
| Market basket | $2.4 \%$ | $2.6 \%$ | $4.2 \%$ |
| Productivity | 0.0 | -0.7 | -0.3 |
| High-cost outlier adjustment | 0.4 | -0.4 | -0.6 |
| Total | $\mathbf{2 . 8}$ | $\mathbf{1 . 5}$ | $\mathbf{3 . 3}$ |

## Note: IRF (inpatient rehabilitation facility)

Source: Centers for Medicare \& Medicaid Services final rules for IRFs, 2020-2022.
payment adequacy indicators remained positive and the aggregate Medicare margin neared historic highs, the Commission recommended that the Congress reduce IRF payment rates by 5 percent. Because our recommendations were not enacted and because, in the absence of legislative action, CMS is required by statute to apply an adjusted market basket increase, payments have continued to rise. IRFs' aggregate Medicare margin has remained above 13 percent since 2015.

The final updates for 2024 will not be set until summer 2023, but CMS's third-quarter 2022 forecasts would result in the IRF base rate increasing by 3.1 percent, absent congressional action. Reducing the payment rate for IRFs would better align Medicare payments with the costs of efficiently providing high-quality IRF care.

## RECOMMENDATION 9

## For fiscal year 2024, the Congress should reduce the 2023 Medicare base payment rate for inpatient rehabilitation facilities by 3 percent.

## RATIONALE 9

IRFs' high Medicare margin of 17 percent in 2021 and our projected margin of 11 percent for 2023 indicate that Medicare payments continue to substantially exceed the costs of caring for beneficiaries.

For every fiscal year since 2009, the Commission has recommended that the update to the IRF payment rate be eliminated or that the payment rate be reduced.

However, CMS has been required by statute to apply an adjusted market basket increase each year. Reducing the payment rate for IRFs by 3 percent would better align Medicare payments with the costs of efficiently providing high-quality IRF care.

## IMPLICATIONS 9

## Spending

- Relative to current law, this recommendation would decrease Medicare spending.


## Beneficiary and provider

- We do not expect this recommendation to have an adverse effect on either Medicare beneficiaries' access to care or out-of-pocket spending. This recommendation could increase financial pressure on some providers. We expect that relatively efficient providers will continue to be willing and able to care for Medicare beneficiaries.


## Endnotes

1 More frequently, Medicare beneficiaries receive inpatient rehabilitation services in skilled nursing facilities (SNFs), in part because there are many more SNFs than IRFs nationwide.

2 More information about the prospective payment system for IRFs is available at https://www.medpac.gov/wp-content/ uploads/2021/11/MedPAC_Payment_Basics_22_IRF_ FINAL_SEC.pdf.

3 In fiscal year 2020, the IRF PPS case-mix groups were revised. Cognition was not included in the new CMGs; only motor score and age were included.

4 More information about the prospective payment system for IRFs is available at https://www.medpac.gov/wp-content/ uploads/2021/11/MedPAC_Payment_Basics_22_IRF_ FINAL_SEC.pdf.

5 During the public health emergency (PHE), some exceptions have been made to Medicare's facility requirements for IRFs to help health care providers in affected communities manage patient flow. For example, during the PHE, an IRF that agrees to admit a patient to help a nearby hospital free up an acute care bed may exclude that patient from its compliance threshold calculation as long as the patient's medical record properly indicates that the patient was admitted solely to respond to the pandemic (Centers for Medicare \& Medicaid Services 2020). The compliance threshold (commonly referred to as the " 60 percent rule") requires that no less than 60 percent of patients admitted to an IRF have as a primary diagnosis or comorbidity at least 1 of 13 conditions specified by CMS.

6 The 13 conditions are stroke; spinal cord injury; congenital deformity; amputation of a lower limb; major multiple trauma; hip fracture; brain injury; certain other neurological conditions (multiple sclerosis, Parkinson's disease, cerebral palsy, and neuromuscular disorders); burns; three arthritis conditions for which appropriate, aggressive, and sustained outpatient therapy has failed; and hip or knee replacement when it is bilateral, the patient's body mass index is greater than or equal to 50 , or the patient is age 85 or older.

7 During the PHE, some exceptions have been made to IRF Medicare coverage criteria for beneficiaries to help health care providers contain the spread of coronavirus disease 2019 (COVID-19). For example, the Secretary waived Section 412.622(a)(3)(ii), commonly referred to as the " 3 -hour rule," the criterion that patients treated in IRFs generally receive at least 15 hours of therapy per week. IRFs are expected to
provide typical IRF levels of care for beneficiaries admitted during the PHE who require and can benefit from such care (Centers for Medicare \& Medicaid Services 2020).

8 In contrast, if payments do not cover the marginal costs, the provider could have a disincentive to care for Medicare beneficiaries.

9 If we approximate marginal cost as total Medicare cost minus fixed building and equipment cost, then:

Marginal profit = (payments for Medicare services - (total Medicare costs - fixed building and equipment costs)) / Medicare payments.

10 The risk adjustment for the measure of successful discharge to the community includes the age and sex of the beneficiary, end-stage renal disease (ESRD) and disability status for entitlement, principal diagnosis, comorbidities, the length of the preceding hospital stay (if there was one), and a count of the hospitalizations during the preceding year. Risk adjusters for the hospitalization measure include primary diagnosis, comorbidities and severity of illness, special conditions (severe wounds, difficulty swallowing, and bowel incontinence), age and sex, disability and ESRD status, hospitalization in the previous month, days in the intensive care unit during a preceding hospitalization (if there was one), a count of the hospitalizations during the preceding year, and the provision of ventilator care during the PAC stay. Providers with at least 60 stays in the year, the minimum count to meet a reliability of 0.7 , were included in calculating the average facility rate.

11 In prior reports, we have erroneously characterized a discharge to community as inclusive of stays that end in a return to the nursing facility from which a beneficiary was admitted. Rather, Medicare-covered IRF stays that end in a discharge to a nursing home are not considered a discharge to the community.

12 Hospital cost reports do not require hospitals to report an all-payer margin specifically for their IRF or other hospitalbased units.

13 Effective July 1, 2021, certain specialty hospitals, including inpatient rehabilitation facilities, are exempt from the certificate-of-need (CON) review in Florida. A CON requires the state to determine whether there is enough demand for the services before construction of a new health care facility begins.

14 We estimated the aggregate margin with reported relief funds included based on FFS Medicare's share of 2019 allpayer operating revenue.

15 The Affordable Care Act of 2010 required a budgetary reduction to IRF PPS payments in each year from 2010 to 2019.

16 From April 1, 2022, through June 30, 2022, there was a 1 percent payment adjustment. The full 2 percent adjustment was reinstated July 1, 2022.

17 In FY 2020, CMS transitioned from using Functional Independence Measure ${ }^{\mathrm{TM}}\left(\mathrm{FIM}^{\mathrm{TM}}\right)$ items on the Inpatient Rehabilitation Facility Patient Assessment Instrument (IRFPAI) to Section GG functional ability items to calculate CMGs. CMS re-estimated payment weights for the new CMGs, which may have affected the CMI in FY 2021 shown in Figure 9-3 (p. 272). However, we observed shifts toward higher CMIs before FY 2020.

18 Two other IRF-PAI items, related to bladder and bowel continence, are also part of the motor score.

19 IRF-PAI version 4.0, effective October 1, 2022.

20 "Not applicable" should be selected if the activity was "not attempted and the patient did not perform this activity prior to the current illness, exacerbation, or injury" (IRF-PAI version 4.0, effective October 1, 2022).

21 The motor score is calculated by summing across the 16 functional ability and 2 bladder and bowel continence items, with equal weight given to each of the 18 items. The functional ability item responses range from 01 to 06 , and the bladder and bowel continence items range from 01 to 04; thus, the motor score ranges from 18 to 104.

22 If the individual was not assessed for walking 10 feet, then items for walking 50 feet with turns and walking 150 feet were automatically skipped in the assessment tool (and recoded to 01 (dependent)).

23 This year, in our efficient provider analysis, we used three consecutive prepandemic years (2017 to 2019) to determine efficient IRF providers.

## References

Acumen LLC. 2022. Technical Expert Panel (TEP) for cross-setting function measure development. Report prepared by Acumen for the Center for Medicare \& Medicaid Innovation. Burlingame, CA: Acumen. April. https://mmshub.cms.gov/sites/default/files/ PAC-Function-TEP-Summary-Report-Jan2022-508.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2020. Inpatient rehabilitation facilities: CMS flexibilities to fight COVID-19. https://www.cms.gov/files/ document/covid-inpatient-rehab-facilities.pdf.

Czeisler, M. E., K. Marynak, K. E. N. Clarke, et al. 2020. Delay or avoidance of medical care because of COVID-19-related concerns - United States, June 2020. Morbidity and Mortality Weekly Report 69, no. 36 (September 11): 1250-1257.

Encompass Health. 2022. Fourth quarter earnings call. https:// s22.q4cdn.com/748396774/files/EHC-Q4-2022-Earnings-Slides_as-filed.pdf.

Encompass Health. 2021. Fourth quarter earnings call January 27, 2021 supplemental information. https://s22.q4cdn. com/748396774/files/Events/2021/EHC-Q4-2020-Earnings-Slides_01.26.21_As-Filed.pdf.

Medicare Payment Advisory Commission. 2021. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2016. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

RTI International, Department of Health and Human Services. 2022. Report to Congress: Unified payment for Medicare-covered post-acute care. Research Triangle Park, NC: Centers for Medicare \& Medicaid Services. https://www.cms.gov/files/ document/unified-pac-report-congress-july-2022.pdf.


Hospice services


## Hospice services

## Chapter summary

The Medicare hospice benefit covers palliative and support services for beneficiaries who are terminally ill with a life expectancy of six months or less if the illness runs its normal course. When beneficiaries elect to enroll in the Medicare hospice benefit, they agree to forgo Medicare coverage for conventional treatment of their terminal illness and related conditions. In 2021, more than 1.7 million Medicare beneficiaries (including almost half of decedents) received hospice services from 5,358 providers, and Medicare hospice expenditures totaled $\$ 23.1$ billion.

## Assessment of payment adequacy

The indicators of payment adequacy for hospices-beneficiary access to care, quality of care, provider access to capital, and Medicare payments relative to providers' costs-are generally positive.

Beneficiaries' access to care-In 2021, indicators of beneficiary access to care were mostly positive. Some measures of volume were stable while others declined. The declining measures appear to stem from the effects of changing death rates and patterns of care due to the coronavirus pandemic and are not a reflection of Medicare payment adequacy.

## In this chapter

- Are Medicare payments adequate in 2023?
- How should Medicare payments change in 2024 ?
- Capacity and supply of providers-In 2021, the number of hospice providers increased by about 6 percent as more for-profit hospices entered the market, a trend that has extended for more than a decade.
- Volume of services-Total deaths among Medicare beneficiaries increased sharply in 2020 and declined by just 0.1 percent in 2021, while the number of Medicare decedents using hospice services dropped slightly between 2020 and 2021, from 47.8 percent to 47.3 percent. Although the overall rate of hospice use among decedents fell, the pattern varied by beneficiary characteristics, with hospice use growing among some groups. Among all beneficiaries (not limited to decedents), the number of beneficiaries who received hospice services and the number of hospice days furnished was stable. For decedents, average lifetime length of stay fell by almost 5 days in 2021 to 92.1 days, similar to the prepandemic level. Between 2020 and 2021, median length of stay declined slightly, from 18 days to 17 days.
- Medicare marginal profit-In 2020, Medicare payments to hospice providers exceeded marginal costs by 18 percent. This rate of marginal profit suggests that providers have a strong incentive to treat Medicare patients and is a positive indicator of patient access.

Quality of care-Quality of care in 2021 is difficult to assess. While we report the most recent data from hospice patient experience and process measures, we have not used those results to inform our conclusions about trends in the quality of care provided to Medicare hospice beneficiaries and its relationship to Medicare payment adequacy. Scores on the Hospice Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$ were stable in the most recent period. Scores on a composite of seven processes of care at admission were generally topped out (meaning scores are so high and unvarying that meaningful distinctions and improvement in performance can no longer be made). The provision of in-person visits at the end of life was stable in 2021, after declining modestly in 2020 due to the coronavirus pandemic. CMS also launched a new claims-based quality measure, based on 10 indicators, that identifies outlier patterns of care among hospice providers.

Providers' access to capital-Hospices are not as capital intensive as other provider types because they do not require extensive physical infrastructure. Continued growth in the number of for-profit providers (an increase of over 8 percent in 2021) and reports of strong investor interest in the sector suggest that capital is available to these providers. Less is known about access to capital for nonprofit freestanding providers, for which capital may be more
limited. Hospital-based and home health-based hospices have access to capital through their parent providers.

Medicare payments and providers' costs-Hospice margins are presented through 2020 because of the data lag required to calculate cap overpayment amounts. Between 2019 and 2020, average cost per day increased just 1.1 percent, which helped boost the 2020 Medicare aggregate margin to 14.2 percent, up from 13.4 percent in 2019. If Medicare's share of pandemic-related relief funds are included, the estimated 2020 aggregate Medicare margin rises to about 16 percent. Growth in hospice cost per day increased 4.2 percent in 2021. We project an aggregate Medicare margin for hospices of about 8 percent in 2023.

In addition to indicators of hospice payment adequacy, this chapter also assesses the hospice aggregate cap. The cap limits the aggregate payments a hospice provider can receive in a year. This cap functions as a mechanism that reduces payments to hospices with long stays and high margins. We estimate that 18.6 percent of hospices exceeded the cap in 2020; the aggregate Medicare margin for these hospices was about 23 percent before and 8 percent after application of the cap. Each year since 2020, the Commission has recommended that the hospice aggregate cap be wage adjusted and reduced by 20 percent to reduce overpayments to providers with disproportionately long stays and high margins.

## How should Medicare payments change in 2024?

Based on the generally positive indicators of payment adequacy and strong margins, the Commission concludes that a reduction to aggregate payments is warranted. However, in this sector, with the range of financial performance across providers and the existence of the hospice aggregate cap, there is the potential to focus payment reductions on providers with disproportionately long stays and high margins. Therefore, the Commission recommends that the Congress wage adjust and reduce the hospice aggregate cap by 20 percent while maintaining the current-law update for fiscal year 2024. Under this recommendation, payments would increase for many hospice providers by an estimated 2.9 percent, while payments would be reduced for providers with very long lengths of stay and low costs relative to payments.

## Background

The hospice benefit covers palliative and support services for Medicare beneficiaries who are terminally ill with a medical prognosis indicating that the individual's life expectancy is six months or less if the illness runs its normal course. In 2021, more than 1.7 million Medicare beneficiaries received hospice services, and Medicare hospice expenditures totaled about $\$ 23.1$ billion.

The hospice benefit covers a broad set of services for palliation of the terminal condition and related conditions (e.g., visits by nurses, aides, social workers, physicians, and therapists; drugs, durable medical equipment, and supplies; short-term inpatient care and respite care; bereavement services for the family; and other services for palliation of the terminal condition and related conditions). To receive hospice services, a beneficiary must elect the hospice benefit and agree to forgo Medicare coverage for conventional treatment of the terminal illness and related conditions. Medicare continues to cover items and services unrelated to the terminal illness and its related conditions outside of hospice. Most commonly, hospice care is provided in patients' homes, but hospice services may also be provided in nursing facilities, assisted living facilities, hospice facilities, and other inpatient settings.

Beneficiaries elect hospice for defined benefit periods. When a beneficiary first elects hospice, two physicians-a hospice physician and the beneficiary's attending physician-are required to certify that the beneficiary has a life expectancy of six months or less if the illness runs its normal course. ${ }^{1}$ The first hospice benefit period spans up to 90 days. After the first benefit period, the hospice physician can recertify the patient for a second 90-day period and for an unlimited number of 60 -day periods after that, as long as the patient's terminal condition continues to engender a life expectancy of 6 months or less. Beneficiaries can disenroll from hospice at any time (referred to as "revoking hospice") and can reelect hospice for a subsequent period as long as they meet the eligibility criteria.

Between 2010 and 2021, hospice spending grew substantially, increasing 5.4 percent per year on average, from $\$ 12.9$ billion to $\$ 23.1$ billion. Between

2020 and 2021, Medicare hospice spending increased 2.8 percent, largely driven by a 2.4 percent update in the 2021 hospice base payment rates and the suspension of the 2 percent sequester for the entirety of 2021 (compared with only a portion of 2020). Not included in the payment totals for 2020 are the coronavirus pandemic-related federal relief funds some providers received in 2020 and 2021. According to the Medicare cost reports, in cost report years 2020 and 2021, these relief payments for freestanding hospice providers totaled about $\$ 590$ million and $\$ 330$ million, respectively. Although the intent of these funds was to provide relief broadly to support care for all patients regardless of payer, the vast majority of hospice patients are Medicare beneficiaries (accounting for more 90 percent of all hospice patient days in 2021).

## Medicare payment for hospice services

The Medicare program pays a daily rate to hospice providers. The hospice provider assumes all financial risk for costs and services associated with care for the patient's terminal illness and related conditions. The hospice provider receives payment for every day a patient is enrolled, regardless of whether the hospice staff visits the patient or otherwise provides a service each day. This payment design is intended to encompass not only the cost of visits but also costs that a hospice incurs for palliation and management of the terminal condition and related conditions (e.g., on-call services, care planning, and nonvisit services like drugs and medical equipment).

Payments are made according to a fee schedule that has four levels of care (Table 10-1, p. 290). Routine home care (RHC) accounted for 98.7 percent of Medicarecovered hospice days in 2021. Three other specialized levels of care are available to address patient needs in certain circumstances, including continuous home care (CHC), general inpatient care (GIP), and inpatient respite care (IRC). The level of care can vary throughout a patient's hospice stay as the patient's needs change.

Beginning in January 2016, Medicare pays two per diem rates for RHC-a higher rate for the first 60 days of a hospice episode and a lower rate for days 61 and beyond. (Previously, RHC was paid a single, uniform daily rate.) Medicare also makes additional payments for registered nurse and social worker visits that occur during the last seven days of life for patients

| $\begin{gathered} \text { TABLE } \\ 10-1 \end{gathered}$ | Medicare hospice payment categories and rates |  |
| :---: | :---: | :---: |
| Category | Description | Base payment rate, FY 2023 |
| Routine home care* | Home care provided on a typical day: Days 1-60 | \$211 per day |
|  | Home care provided on a typical day: Days 61+ | \$167 per day |
| Continuous home care | Home care provided during periods of patient crisis | \$63 per hour |
| General inpatient care | Inpatient care to treat symptoms that cannot be managed in another setting | \$1,171 per day |
| Inpatient respite care | Inpatient care for a short period to provide respite for primary caregiver | \$492 per day |

Note: FY (fiscal year). Payment rates are rounded in the table to the nearest dollar. Payment for continuous home care ( CHC ) is an hourly rate ( $\$ 63.42$ per hour, with a maximum payment per day equal to about $\$ 1,522$ ) for care delivered during periods of crisis if care is provided in the home for 8 or more hours within a 24 -hour period beginning at midnight. In addition, a nurse must deliver more than half of the hours of this care to qualify for CHC -level payment. The above rates apply to providers that met the requirements for the hospice quality reporting program and received a full annual update. Providers that do not meet the quality reporting requirements receive slightly lower rates based on a 2 percentage point reduction to the annual update. The percentages may not sum to 100 percent due to rounding
*In addition to the daily rate, Medicare pays about $\$ 63$ per hour for registered nurse and social worker visits (up to four hours per day) that occur during the last seven days of life for beneficiaries receiving routine home care.

Source: CMS Manual System Pub 100-04 Medicare Claims Processing, Transmittal 11542, "Update to Hospice Payment Rates, Hospice Cap, Hospice Wage Index, and Hospice Pricer for FY 2023," August 4, 2022.
receiving RHC. In fiscal year 2020, CMS rebased the payment rates for the three higher-intensity, less frequently provided levels of hospice care (CHC, IRC, GIP), increasing those payment rates significantly and reducing the RHC payment rate by 2.7 percent.

Beneficiary cost sharing for hospice services is minimal. Hospices can, but are not required to, charge coinsurance of 5 percent for each prescription provided outside the inpatient setting (not to exceed $\$ 5$ ) and for inpatient respite care (not to exceed the inpatient hospital deductible). ${ }^{2}$

Medicare fee-for-service (FFS) pays for hospice care for beneficiaries enrolled in both traditional FFS Medicare and Medicare Advantage (MA). ${ }^{3}$ Once a beneficiary in an MA plan elects hospice care, the beneficiary receives hospice services through a provider paid by FFS Medicare (while Medicare continues paying the MA plan for Part D services and extra benefits, but not Part A and Part B services). In March 2014, the Commission urged that this policy be changed, recommending that hospice be included in
the MA benefit package (Medicare Payment Advisory Commission 2014). In January 2021, as part of its value-based insurance design (VBID) models in MA, CMS's Center for Medicare \& Medicaid Innovation (CMMI) launched a demonstration permitting MA organizations to provide hospice and palliative care services for their enrollees to test the effects of adding the hospice benefit to MA (Centers for Medicare \& Medicaid Services 2020b). According to a CMS contractor evaluation report, 9,630 MA beneficiaries received hospice paid for by MA plans in 2021. The number of MA plans offering hospice will increase in the remaining three years of the demonstration. (For example, in 2023, 15 MA organizations, comprising 119 plan benefit packages, will furnish hospice benefits under the VBID model (Centers for Medicare \& Medicaid Services 2022a).

## Medicare hospice payment limits ("caps")

The Medicare hospice benefit was designed to provide beneficiaries with a choice in their end-of-life care to forgo conventional treatment and die at home. The

Congress expanded the Medicare benefit to include hospice care in 1983 in part because it was thought that the new benefit would be a less costly alternative to conventional end-of-life care (Government Accountability Office 2004, Hoyer 2007). Studies show that beneficiaries who elect hospice incur less Medicare spending in the last one or two months of life than comparable beneficiaries who do not, but also that Medicare spending for beneficiaries is higher for hospice enrollees than for nonenrollees in the earlier months before death. In essence, a hospice's net reduction in Medicare spending decreases the longer the patient is enrolled, and beneficiaries with long hospice stays tend to incur higher Medicare spending than those who do not elect hospice (Medicare Payment Advisory Commission 2008). Studies have been mixed on whether hospice has saved the Medicare program money in the aggregate compared with conventional care. ${ }^{4}$ Research by a Commission contractor examined the literature and conducted a market-level analysis of hospices' effect on Medicare expenditures. That study found that while hospice produces savings for some beneficiaries, such as those with cancer, overall, hospice has not reduced net Medicare program spending and may have even increased net spending because of very long stays among some hospice enrollees (Direct Research 2015).

When the Congress established the hospice benefit, it included two limitations, or "caps," on payments to hospices in an effort to make cost savings more likely. The first cap limits the share of inpatient care days that a hospice can provide to 20 percent of its total Medicare patient care days. This cap is rarely exceeded; any inpatient days provided in excess of the cap are paid at the RHC payment rate.

The second cap limits the aggregate Medicare payments that an individual hospice can receive. Under the aggregate cap, if a hospice's total Medicare payments exceed the total number of Medicare beneficiaries it served multiplied by the cap amount ( $\$ 32,486.92$ in 2023), it must repay the excess to the program. ${ }^{5}$ Beneficiaries who receive hospice care in multiple cap years or from multiple hospice providers are reflected in the beneficiary count of the cap calculation for a particular cap year and hospice provider in a prorated manner. ${ }^{6}$ The cap is not applied individually to the payments received for
each beneficiary, but rather to the total payments across all Medicare patients served by the hospice in the cap year. In other words, the cap is not a limit on Medicare's coverage of hospice services for patients. Rather, it limits how much Medicare will pay a hospice provider in the aggregate for its patient population. After the year ends, Medicare totals all its payments to the provider, and if that amount exceeds the number of beneficiaries multiplied by the aggregate cap amount, Medicare requires the hospice to repay the excess to the Medicare program. In 2020, we estimate 18.6 percent of hospices exceeded the cap.

## Are Medicare payments adequate in 2023?

To address whether payments in 2023 are adequate to cover the costs of the efficient delivery of care and how much providers' payments should change in the coming year (2024), we examine several indicators of payment adequacy. Specifically, we assess beneficiaries' access to care by examining the capacity and supply of hospice providers, changes over time in the volume of services provided, quality of care, providers' access to capital, and the relationship between Medicare's payments and providers' costs.

## Beneficiaries' access to care: Indicators were generally favorable

Our analysis of access indicators-including trends in the supply of providers, utilization of hospice services, and Medicare marginal profit-shows that beneficiaries' access to care in 2021 was generally favorable.

## Capacity and supply of providers: In 2021, supply of hospices continued to grow, driven by an increase in for-profit providers

In 2021, 5,358 hospices provided care to Medicare beneficiaries, a 6 percent increase from the prior year (Table 10-2, p. 292). Market entry of for-profit, freestanding providers drove the growth in supply. Forprofit hospices accounted for all of the net increase-an over 8 percent increase-while the number of nonprofit and government hospices declined by about 2 percent. In 2021, about three-quarters of hospices were for profit; however, they furnished care to just over half of Medicare hospice patients because, on average, for-

## Increase in total number of hospices driven by growth in for-profit providers

| Category | 2017 | 2018 | 2019 | 2020 | 2021 | Average annual percent change 2017-2020 | $\begin{gathered} \text { Percent } \\ \text { change } \\ \text { 2020-2021 } \end{gathered}$ |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| All hospices | 4,488 | 4,639 | 4,840 | 5,058 | 5,358 | 4.1\% | 5.9\% |
| For profit | 3,101 | 3,234 | 3,436 | 3,691 | 4,008 | 6.0 | 8.6 |
| Nonprofit | 1,226 | 1,245 | 1,255 | 1,220 | 1,195 | -0.2 | -2.0 |
| Government | 161 | 159 | 148 | 146 | 143 | -3.2 | -2.1 |
| Freestanding | 3,525 | 3,701 | 3,936 | 4,189 | 4,511 | 5.9 | 7.7 |
| Hospital based | 470 | 453 | 429 | 413 | 396 | -4.2 | -4.7 |
| Home health based | 471 | 463 | 456 | 437 | 434 | -2.5 | -0.7 |
| SNF based | 22 | 22 | 19 | 19 | 17 | -4.8 | -10.5 |
| Urban | 3,605 | 3,762 | 3,974 | 4,196 | 4,505 | 5.2 | 7.4 |
| Rural | 878 | 871 | 859 | 853 | 845 | -7.0 | -0.9 |

Note: SNF (skilled nursing facility). Some categories do not sum to total because of missing data for some providers. The rural and urban definitions used in this chart are based on updated definitions of the core-based statistical areas (which rely on data from the 2010 census). Type of hospice reflects the type of cost report filed (a hospice files a freestanding hospice cost report or the hospice is included in the cost report of a hospital, home health agency, or skilled nursing facility).

Source: MedPAC analysis of Medicare cost reports, Provider of Services file, and Medicare hospice claims data from CMS
profit providers were smaller than nonprofit providers (latter data not shown). Freestanding providers also accounted for all the net growth in hospice providers, while the number of home health-based, hospitalbased, and SNF-based providers declined. ${ }^{7}$ In 2021, about 84 percent of hospices were freestanding, and these hospices furnished care to 86 percent of Medicare hospice patients (latter data not shown).

The number of hospice providers is not necessarily an indicator of beneficiary access to hospice because the number does not capture the size of providers, their capacity to serve patients, or the size of their service areas. In the past, we have concluded that no relationship exists between the supply of hospice providers and the rate of hospice use across states (Medicare Payment Advisory Commission 2010). A more recent analysis of 2019 data yields similar findings: Variation in hospice use rates across states appears unrelated to a state's number of hospice
providers per 10,000 beneficiaries (Medicare Payment Advisory Commission 2021).

The number of rural hospices has declined in recent years, falling about 0.9 percent between 2020 and 2021 (Table 10-2). As of 2021, 84 percent of hospices were in urban areas and 16 percent were in rural areas (which is roughly similar to the share of Medicare beneficiaries living in rural areas, 17 percent). As noted above, the number of hospices in rural areas is not reflective of hospice access for rural beneficiaries because it does not capture the size of those hospice providers, their capacity to serve patients, or the size of their service area. Further, some urban hospices provide services in rural areas. Indeed, despite the decline in the number of rural hospices, the share of rural decedents using hospice has grown overall since 2010 (Table 10-3).

In 2021, most of the growth in the number of hospice providers was concentrated in California and Texas (data not shown). Between 2020 and 2021, California gained

## Share of decedents using hospice declined overall in 2021 but increased for some beneficiary groups

$\left.\begin{array}{lccccc} \\ & & \text { Share of Medicare decedents who used hospice }\end{array}\right]$

[^19][^20]167 hospices and Texas gained 56 hospices, continuing the trend in recent years of substantial market entry by hospice providers in these two states. ${ }^{8}$ In addition, several other states experienced sizable gains in the number of hospices: 21 in Arizona, 9 in Nevada, and 7 in Georgia, Michigan, and Virginia (each). Some states saw the number of hospice providers decline, although these changes were generally modest. Connecticut and Nebraska experienced the largest net decrease (three hospices each).

Patterns of care among new hospices in California and Texas suggest additional oversight is warranted, particularly given the rapid entry of new providers in these states. In our March 2021 report to the Congress, an analysis of new hospices in California and Texas found that these providers tended to be small and had long average lengths of stay, high live-discharge rates, and high rates of exceeding the aggregate cap. Nearly all were for profit (Medicare Payment Advisory Commission 2021). Recently, the state of California passed two laws to address concerns about rapid growth in the number of hospices and questionable business practices among some providers in the state. California placed a moratorium on new hospice licenses beginning January 2022 and bolstered its state laws governing hospice referral and patient enrollment practices (California Legislature 2021). In addition, the California state auditor issued a report on hospice care in Los Angeles County, stating that "growth in the number of hospice agencies in Los Angeles County has vastly outpaced the need for hospice services" and identifying "numerous indicators of fraud and abuse" (Tilden 2022). ${ }^{9}$

## Nationally, hospice use among Medicare decedents declined slightly in 2021, though use increased among some beneficiary groups

In 2021, about 47.3 percent of Medicare decedents received hospice services that year, a slight decrease from 47.8 percent in 2020 (Table 10-3, p. 293). Prior to 2020, hospice use among Medicare decedents rose substantially: Between 2010 and 2019, use grew from 43.8 percent to 51.6 percent. With the onset of the coronavirus pandemic, growth in beneficiary deaths in 2020 outpaced growth in the number of hospice users; the share of decedents using hospice in 2020 declined to 47.8 percent (Table 10-3). In 2021, total deaths among Medicare beneficiaries fell 0.1 percent, and the number of Medicare decedents who used hospice fell
1.3 percent, which explains the slight decline in the share of decedents using hospice (Table 10-4).

The share of decedents using hospice in 2021 continues to be affected by the coronavirus pandemic. Corresponding to waves of the pandemic, months with the highest numbers of deaths had the lowest hospice use rates (Figure 10-1, p. 296). Deaths among Medicare beneficiaries exceeded 300,000 in January, declined to a low of just under 200,000 in June, and increased again to just over 250,000 in December. The share of decedents using hospice moved in the opposite direction, with the lowest use rate ( 42 percent) in January when the number of deaths was highest, and the highest use rate in summer ( 51 percent) when the monthly number of deaths declined to a level more typical of prepandemic levels (Figure 10-1). This pattern largely reflects that elderly people who die of COVID-19, similar to those who die of pneumonia and influenza, are much more likely to die in the hospital and less likely to die at home or in a nursing facility than elderly people who die of other illnesses. For example, analysis of 2021 data from the CDC indicates that about 69 percent of decedents ages 65 and older who died of COVID-19 died in an inpatient setting, which is roughly similar to the share of decedents who died of pneumonia in an inpatient setting (76 percent) and influenza ( 69 percent). In contrast, only 26 percent of elderly individuals who died of other causes in 2021 died in inpatient settings (Centers for Disease Control and Prevention 2022b). ${ }^{10}$ Thus, the slight drop in share of decedents using hospice during the coronavirus pandemic is not a reflection of Medicare payment adequacy.

Despite the decline nationally in the share of decedents using hospice, the pattern was not uniform, and hospice use increased among some decedent populations. For example, between 2020 and 2021, the share of decedents ages 85 and older who used hospice rose while hospice use rates fell for younger age groups (Table 10-3, p. 293). Hospice use remained more common among older decedents: 25 percent of decedents under age 65 used hospice compared with more than 60 percent of decedents ages 85 and older.

Between 2020 and 2021, hospice use rates increased or were stable among Black, Hispanic, Asian American, and North American Native beneficiaries, while the use rate declined for White beneficiaries. Nevertheless, hospice use rates continued to be

# Hospice use rates were stable or declined in 2021, following the 2020 increase 

|  |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |

## Medicare utilization and spending for all hospice users (not limited to decedents)*

|  |  |  |  |  |  |  |  |
| :--- | :---: | :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Total spending (in billions) | $\$ 12.9$ | $\$ 20.9$ | $\$ 22.4$ | $\$ 23.7^{*}$ | 5.5 | 7.4 | $2.8^{*}$ |
| Number of Medicare hospice <br> users (in millions) | 1.15 | 1.61 | 1.72 | $1.77^{*}$ | 3.8 | 6.6 | $0.0^{*}$ |
| Number of hospice days for all <br> Nospice beneficiaries <br> (in millions) <br> n | 81.6 | 121.8 | 127.8 | $127.6^{*}$ | 4.6 | 4.9 | $-0.1^{*}$ |

Note: Lifetime length of stay is calculated for decedents who were using hospice at the time of death or before death and reflects the total number of days the decedent was enrolled in the Medicare hospice benefit during their lifetime. The percent change displayed in the table may not equal the percent change calculated using the yearly data displayed in the table due to rounding.
*These estimates are based on Medicare paid hospice claims, which excludes hospice care paid for by a small number of MA plans participating in the CMMI hospice MA VBID hospice model beginning in 2021. A CMS contractor report stated that 9,630 MA beneficiaries received hospice services in 2021 under the MA VBID program (Khodyakov et al. 2022)

Source: MedPAC analysis of data from the Common Medicare Enrollment file and hospice claims data from CMS.
lower for non-White decedents (Table 10-3, p. 293). The reasons for these differences are not fully understood. Researchers have cited a number of possible factors, such as cultural or religious beliefs, preferences for end-of-life care, disparities in access to care or information about hospice, socioeconomic factors, and mistrust of the medical system (Barnato et al. 2009, Cohen 2008, Crawley et al. 2000, LoPresti et al. 2016, Martin et al. 2011).

In 2021, hospice use rates declined in both rural and urban areas. Between 2020 and 2021, urban areas and frontier areas experienced a slight decline ( 0.3 and 0.4 percentage point, respectively), while the decline was largest in micropolitan areas ( 1.7 percentage points). Although a greater share of urban decedents than rural decedents have used hospice, hospice use grew across all rural categories between 2010 and 2019 (before the pandemic) (Table 10-3, p. 293).


Note: The share of Medicare decedents who used hospice reflects decedents who used hospice in the last calendar year of life. Analysis excludes beneficiaries without Medicare Part A because hospice is a Part A benefit.

Source: MedPAC analysis of data from the Common Medicare Enrollment file and hospice claims data from CMS.

In 2021, the hospice use rate was unchanged for FFS decedents and declined for MA decedents. Historically, more decedents in MA than in FFS have used hospice, although the difference has been shrinking in recent years. Growth in the share of newly eligible, younger beneficiaries choosing to enroll in MA plans rather than in traditional FFS Medicare has contributed to a declining aggregate hospice use rate among MA decedents (because younger decedents are less likely to enroll in hospice than older decedents) (Table 10-3, p. 293).

Also in 2021, location of care continued to shift because more decedents received hospice care at home. Fewer received hospice care in nursing facilities for reasons related to the coronavirus pandemic, not payment adequacy. The share of decedents receiving hospice in nursing homes declined to 15 percent (down from 18
percent in 2020 and 21 percent in 2019), while the share of decedents receiving hospice at home increased to 56 percent (up from 53 percent in 2020 and 49 percent in 2019). The decline of hospice care in nursing facilities has been driven by several pandemic-related factors, including (1) fewer patients residing in nursing facilities compared with prepandemic levels; (2) temporarily (in 2020) limited access to patients in nursing facilities (by outside staff, including hospice providers); and (3) beneficiaries with COVID-19 being more likely to die in the hospital or die suddenly than patients who die from chronic illnesses. ${ }^{11}$

## Volume of services: Trends in hospice use and length of stay were mixed in 2021

In 2021, measures of hospice utilization for all hospice enrollees (not just decedents) were stable. That year,


Note: Lifetime length of stay is calculated for decedents who were using hospice at the time of death or before death and reflects the total number of days the decedent was enrolled in the Medicare hospice benefit during their lifetime.

Source: MedPAC analysis of the Common Medicare Enrollment file and the Medicare Beneficiary Database from CMS.
1.71 million Medicare beneficiaries received hospice services, similar to 1.72 million beneficiaries in 2020 and up from 1.61 million beneficiaries in 2019 (Table 10-4, p. 295). The number of hospice days furnished was also stable at about 128 million days (Table 10-4). ${ }^{12}$

Hospice length of stay declined among decedents in 2021 (Table 10-4). Average lifetime length of stay among decedents was 92.1 days, down from 97.0 days in 2020 but similar to the 2019 average of 92.5 days. Median length of stay declined slightly to 17 days from 18 days in 2020. Most hospice decedents have short stays, but some have very long stays (Figure 10-2). Between 2020 and 2021, length of stay among decedents with the shortest stays remained the same (2 days at the 10th percentile and 5 days at the

25th percentile), but it fell for those with longer stays (from 87 days in 2020 to 79 days at the 75th percentile in 2021 and from 287 days to 264 days at the 90th percentile, respectively) (Figure 10-2).

Length of stay has implications for our broader assessment of payment adequacy because patient length of stay affects provider profitability. Hospices furnish more services at the beginning and end of a hospice episode and fewer services in the middle, making long stays more profitable for providers than short stays. Hospice lengths of stay vary by observable patient characteristics-such as patient diagnosis and location-so hospice providers can identify and enroll patients likely to have long (more profitable) stays if they choose to do so. For example, in 2021, average

## TABLE <br> 10-5 <br> Nearly 60 percent of Medicare hospice spending in 2021 was for patients with stays exceeding 180 days

|  |
| :--- |
| All hospice users in 2021 |
| Medicare <br> hospice spending, <br> 2021 <br> (in billions) |
| Beneficiaries with LOS > 180 days |
| Days 1-180 |
| Days 181-365 |
| Days 366+ |

lifetime length of stay was longer among decedents with neurological conditions and chronic obstructive pulmonary disease ( 155 days and 140 days, respectively) than among decedents with cancer (51 days). Length of stay was also longer among patients in assisted living facilities (165 days) or nursing facilities (109 days) compared with patients at home ( 95 days). ${ }^{13}$

For-profit hospices have substantially longer average lengths of stay than nonprofit hospices (110 days compared with 71 days in 2021). For-profit hospices have more patients with diagnoses that tend to have longer stays, but they also have longer stays than nonprofit hospices for all types of diagnoses. These differences in patient mix and length of stay contribute to the variation in profitability observed among providers' profit margins.

Although most patients have short hospice stays, long stays account for the majority of Medicare spending on hospice. In 2021, Medicare spent about $\$ 13.6$ billion,
nearly 60 percent of hospice spending that year, on patients with stays exceeding 180 days (Table 10-5). About $\$ 5$ billion of that spending was on additional hospice care for patients who had already received at least one year of hospice services (which is already twice the presumptive eligibility period for the hospice benefit).

Among the hospices with very long stays are those that exceed the hospice aggregate cap. In 2020, we estimate that about 18.6 percent of hospices exceeded the aggregate payment cap, similar to the prior year (19.0 percent in 2019) (Table 10-6). ${ }^{14}$ On average, abovecap hospices exceeded the cap by about $\$ 422,000$ in 2020, up from $\$ 384,000$ in 2019. Above-cap hospices have fewer patients per year, on average, than belowcap hospices and are more likely to be for-profit, freestanding, recent entrants to the Medicare program and located in urban areas (Medicare Payment Advisory Commission 2022). Above-cap hospices have substantially longer stays than below-cap hospices, even for patients with similar diagnoses. Above-cap hospices also have substantially higher rates than other hospices of discharging patients alive. As the Commission has noted in past reports, these length-of-stay and live-discharge patterns suggest that abovecap hospices are admitting patients who do not meet the hospice eligibility criteria, which merits further investigation by the Office of Inspector General (OIG) and CMS.

## In-person hospice staff visits increased slightly in 2021 after declining in 2020

In 2021, following a decline in in-person visits in 2020 related to the coronavirus pandemic, in-person hospice visits increased slightly. Medicare hospice patients received an average of 3.8 in-person visits per week, up from 3.6 visits in 2020 (Table 10-7). This increase resulted from a slight uptick in the average number of nurse visits and aide visits per week.

However, the average number of in-person visits per week remained below prepandemic levels. Some of these visits may have been replaced by telehealth visits. To facilitate access to care during the coronavirus public health emergency, CMS gave hospice providers the flexibility to provide visits using telecommunication systems in certain circumstances. ${ }^{15}$ We lack data on telehealth visits provided by hospices except for

| TABLE $10-6$$\quad$ Hospices | exceeded Medicare's annual payment cap, 2016-2020 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2016 | 2017 | 2018 | 2019 | 2020 |
| Estimated share of hospices exceeding the cap | 12.7\% | 14.0\% | 16.3\% | 19.0\% | 18.6\% |
| Average payments over the cap per hospice exceeding it (in thousands) | \$295 | \$273 | \$334 | \$384 | \$422 |
| Payments over the cap as share of overall Medicare hospice spending | 1.0\% | 1.0\% | 1.3\% | 1.7\% | 1.8\% |

Note: The aggregate cap statistics reflect the Commission's estimates and may differ from the CMS claims processing contractors' calculations. Our estimates assume all hospices use the proportional methodology and rely on claims data through 15 months after the end of each cap year (except for 2016 , which used 14 months). The claims processing contractors may reopen the hospice cap calculation for up to three years; the reopening process and timing may vary across contractors. To illustrate the potential effect of reopening, we reestimated cap overpayments for 2017 using an additional 36 months of claims data (i.e., a 51 month run-out). With the additional 36 months of data, the estimated share of hospices exceeding the cap increased by just under 2 percentage points, the average payments over the cap per hospice exceeding the cap increased by roughly $\$ 25,000$, and payments over the cap as a share of overall Medicare hospice spending increased by 0.3 percentage point. Spending in cap year 2017 reflects an 11-month period from November 1, 2016, to September 30, 2017. For years before 2017 , the cap year was defined as the period beginning November 1 and ending October 31 of the following year. Beginning in 2018 , the cap year is aligned with the federal fiscal year (October 1 to September 30 of the following year)

Source: MedPAC analysis of Medicare hospice claims data, Medicare hospice cost reports, and Medicare Provider of Services file from CMS
social worker phone calls, which limits our ability to determine the extent to which telehealth visits have been used to supplement in-person visits. In our March 2022 report, the Commission recommended that CMS require hospice providers to report telehealth visits on hospice claims to enhance the agency's ability to monitor access to care. ${ }^{16}$

Another measure of access is whether providers have a financial incentive to expand the number of Medicare beneficiaries they serve. In considering whether to treat a patient, a provider with excess capacity compares the marginal revenue it will receive (i.e., the Medicare payment) with its marginal costs-that is, the costs that vary with volume. If Medicare payments are

## Average number of hospice visits and calls per patient per week increased slightly in 2021

## Average number of visits or calls per patient per week

|  | 2018 | 2019 | 2020 | 2021 |
| :---: | :---: | :---: | :---: | :---: |
| Total visits | 4.4 | 4.3 | 3.6 | 3.8 |
| Nurse visits | 1.8 | 1.8 | 1.6 | 1.7 |
| Aide visits | 2.2 | 2.2 | 1.7 | 1.8 |
| Social worker visits | 0.3 | 0.3 | 0.2 | 0.3 |
| Social worker calls and visits | 0.4 | 0.4 | 0.3 | 0.3 |

[^21][^22]larger than the marginal costs of treating an additional beneficiary, a provider has a financial incentive to increase its volume of Medicare patients. In contrast, if payments do not cover the marginal costs, the provider could have a disincentive to care for Medicare beneficiaries. ${ }^{17}$ We found that the 2020 Medicare marginal profit for hospice providers was roughly 18 percent, suggesting that providers with the capacity to do so had a strong incentive to treat Medicare patients.

## Quality of care is difficult to assess but appears stable

Quality of care in 2021 is difficult to assess due to effects of the coronavirus pandemic on beneficiaries and providers. While we report the most recent data from hospice patient experience and process measures, we have not used those results to inform our conclusions about trends in the quality of care provided to Medicare hospice beneficiaries and those trends' relationship to Medicare payment adequacy. Due to the pandemic, hospice quality data submitted by providers-the Hospice Item Set and the Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}\left(\right.$ CAHPS $\left.^{\circledR}\right)$ Hospice Survey-were suspended for the first and second quarters of 2020. CMS now reports quality data for periods after the second quarter of 2020, although the most recent data reporting period for CAHPS combines data from parts of 2019, 2020, and 2021.

We found, based on the most recent available data, that scores on available quality metrics were stable overall. Scores on the CAHPS survey were stable in the most recent period. Scores on a composite of seven processes of care at admission increased slightly in 2021 but are generally topped out. The provision of in-person visits at the end of life was stable, after modestly declining in 2020 due to the coronavirus pandemic.

Recently enacted legislation will increase the penalty for hospices that do not report quality data. Nonreporters currently face a 2 percent payment penalty, which will increase to 4 percent in 2024, per the Consolidated Appropriations Act, 2021. ${ }^{18}$

## Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$

The Hospice Quality Reporting Program requires hospice providers to participate in a CAHPS hospice survey. The survey gathers information from the
patient's informal caregiver (typically a family member) after the patient's death. ${ }^{19}$ The survey addresses aspects of hospice care that are thought to be important to patients and for which informal caregivers are positioned to provide information. Areas of focus include how the hospice performed on the following measures: communicating, providing timely care, treating patients with respect, providing emotional support, providing help for symptom management, providing information on medication side effects, and training family or other informal caregivers in the home setting. Respondents are also asked to rate the hospice on a scale of 1 to 10 and whether they would recommend the hospice. In August 2022, CMS began reporting star ratings for hospices based on the CAHPS scores.

CAHPS scores were stable in the most recent period (April 2019 to September 2021, excluding the first half of 2020) compared with the prior period (January 2018 to December 2019). CAHPS scores were highest on measures related to providing emotional support and treating patients with respect ( 90 percent of caregivers chose the most positive response in those areas), while scores were lowest in the areas of providing help for pain and symptoms, providing timely care, and training caregivers (with scores ranging from 75 percent to 78 percent in those areas) (Table 10-8). In terms of star ratings, most providers scored 3 stars or 4 stars ( 36 percent and 39 percent, respectively), while some providers scored higher ( 10 percent received 5 stars) or lower (14 percent received 2 stars and 1 percent received 1 star).

## Process measures

Hospices are required to report data on seven processes of care that are important for patients newly admitted to hospice. These processes include pain screening, pain assessment, dyspnea screening, dyspnea treatment, documentation of treatment preferences, addressing beliefs and values if desired by the patient, and provision of a bowel regimen for patients treated with an opioid. CMS has a composite measure that reflects the share of admitted patients for whom the hospice performed all seven activities appropriately (or appropriately performed all the activities relevant to the patient). Hospice providers' scores on the composite measure are very high and increased slightly in the most recent period. The

## Scores on hospice CAHPS quality measures and hospice star ratings

Prior period
(January 2018 - December 2019)

Most recent period
(April 2019- December 2019; July 2020 - September 2021)

| Share of respondents giving a top rating on: |  |  |
| :--- | :---: | :---: |
| Providing emotional support | $90 \%$ | $90 \%$ |
| Caregiver rates hospice 9 or 10 | 81 | 81 |
| Caregiver recommends hospice | 84 | 84 |
| Treating patients with respect | 91 | 90 |
| Help for pain and symptoms | 75 | 75 |
| Hospice team communication | 81 | 81 |
| Providing timely help | 78 | 78 |
| Caregiver training | 76 | 76 |
|  |  | $\mathrm{~N} / \mathrm{A}$ |
| Percent of providers by star rating score | $\mathrm{N} / \mathrm{A}$ | $1 \%$ |
| 1 star | $\mathrm{N} / \mathrm{A}$ | 14 |
| 2 star | $\mathrm{N} / \mathrm{A}$ | 36 |
| 3 star | $\mathrm{N} / \mathrm{A}$ | 39 |
| 4 star |  | 10 |

Note: CAHPS (Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$ ), N/A (not available). The CAHPS scores in the eight listed domains reflect the share of respondents who reported the "top-box"-meaning the most positive survey response across all providers.

Source: CAHPS data from CMS.
provider-level median score was 95.3 percent, up from 93.8 percent in the previous period. The high scores on the composite measure suggest that it has become topped out.

In August 2022, CMS added two new claims-based process measures to public reporting. ${ }^{20}$ One is the Hospice Care Index, which identifies providers with outlier patterns of care based on hospice providers' performance across 10 indicators. These indicators include four related to the provision of visits to hospice patients, four related to aspects of live discharge, one that reflects Medicare hospice spending per beneficiary, and one that gauges whether the provider furnished any high-intensity care (continuous home care or general inpatient care). The first public reporting of this measure for the period April 2019 to September 2021 (excluding the first half of 2020)
indicated that 14 percent of providers were an outlier on at least 3 of 10 measures, and 2 percent were an outlier on at least half of the measures.

The second new claims-based process measure in the public reporting program focuses on visits by hospice nurses and social workers at the end of life. Measures of these visits are thought to be indicators of quality because patients' and caregivers' need for symptom management and support tends to increase in the last week of life. The new measures calculate the share of hospice decedents who received in-person nurse or social worker visits on at least two of the last three days of life. The first public reporting period covered April 2019 through September 2021 (excluding the first half of 2020), and provider performance varied substantially, with scores ranging from 34 percent at the 25th percentile to 69 at the 75th percentile. In a

Hospice in-person nurse and social worker visits during the last seven days of life, 2018-2021
$2018 \quad 2019 \quad 2020 \quad 2021$

## Nurse visits in last 7 days of life

| Share of days with visit | $64 \%$ | $66 \%$ | $62 \%$ | $63 \%$ |
| :--- | :--- | :--- | :--- | :--- |
| Average length of each visit (in 15-minute increments) | 4.56 | 4.44 | 4.37 | 4.23 |
| Average visit time per day (in 15-minute increments) | 2.94 | 2.94 | 2.70 | 2.68 |

## Social worker visits in last 7 days of life

| Share of days with visit | $10 \%$ | $10 \%$ | $7 \%$ | $9 \%$ |
| :--- | :--- | :--- | :--- | :--- |
| Average length of visits (in 15-minute increments) | 4.02 | 4.01 | 3.79 | 3.78 |
| Average visit time per day (in 15-minute increments) | 0.41 | 0.42 | 0.28 | 0.32 |

Note: Nurse visits include both registered nurse and licensed practical nurse visits.
Source: MedPAC analysis of Medicare hospice claims data from CMS.
separate claims analysis, the Commission examined the aggregate trend from 2018 to 2021 in nurse and social worker in-person visits in the last seven days of life. After a modest decline in 2020 in the frequency and length of these visits in the last seven days of life, provision of these visits was generally stable in 2021 compared to the prior year (Table 10-9).

## Future quality measures

The Commission consistently maintains that, with quality measurement in general, outcome measures are preferable to process measures. Although outcome measures for hospice are particularly challenging, the Commission believes that outcome measures such as patient-reported pain and other symptom management measures warrant further exploration. In the hospice final rule for fiscal year 2022, CMS indicated that as part of the hospice patient assessment instrument currently under development (referred to as the Hospice Outcomes \& Patient Evaluation (HOPE)), CMS has been working with a technical expert panel to explore three candidate outcome measures related to symptom management: timely reduction of pain
impact, reduction in pain severity, and timely reduction of symptoms. In addition, CMS has been exploring development of additional process measures related to timely reassessment of pain and other symptoms (Abt Associates 2022). The agency has also been exploring development of measures in several other areas. Recently, CMS began work with a technical expert panel to develop health equity structural composite measures for hospice and home health (Centers for Medicare \& Medicaid Services 2022c). CMS has also indicated interest in exploring additional quality measures that combine multiple types of data such as patient assessment data and claims data (e.g., hospitalizations during a hospice election and patterns of live discharges) (Centers for Medicare \& Medicaid Services 2022b).

## High rates of live discharge from hospice could signal problems

As the Commission has noted over the years, high rates of live discharge may signal poor quality or program integrity issues. Hospice providers are expected to have some live discharges because patients may
change their mind about using the hospice benefit and disenroll from hospice or their condition may improve and they no longer meet the hospice eligibility criteria. However, providers with substantially higher rates of live discharge than their peers signals a problem, such as a hospice provider not meeting the needs of patients and families or admitting patients who do not meet the eligibility criteria.

In 2021, the aggregate rate of live discharge (that is, live discharges as a share of all discharges) was 17.2 percent, an increase from 15.4 percent in 2020 but similar to the rate of 17.4 percent in 2019. As in prior years, hospice claims data show "beneficiary revocation" and "beneficiary not terminally ill" as the most common reasons for live discharge (each accounting for 6.3 percent of hospice discharges in 2021). ${ }^{21}$ Among providers with more than 30 discharges, the median live-discharge rate was about 19 percent, but 10 percent of providers had live-discharge rates of 50 percent or more. Hospices with very high livedischarge rates were disproportionately for profit and recent entrants to the Medicare program (entered in 2010 or after) and had an above-average rate of exceeding the aggregate payment cap.

## Very short hospice stays signal opportunities for quality improvement

For many years, a significant share of hospice stays have been very short. More than one-quarter of hospice decedents enroll in hospice only in the last week of life, a length of stay that is commonly thought to benefit patients less than enrolling somewhat earlier. Very short hospice stays occur across a wide range of diagnoses, often stemming from broader issues in the health care delivery system that precede the hospice referral (Medicare Payment Advisory Commission 2022). These short stays are generally unrelated to the adequacy of Medicare's hospice payment rates. For example, some physicians are reluctant to have conversations about hospice or tend to delay such discussions until death is imminent; some patients and families have difficulty accepting a terminal prognosis; and financial incentives in the FFS system encourage increased volume of clinical services (compared with palliative care furnished by hospice providers) (Medicare Payment Advisory Commission 2009). In addition, some analysts point to the requirement that beneficiaries forgo intensive conventional care to enroll
in hospice as a factor that contributes to deferring hospice care, resulting in short hospice stays.

Initiatives are under way that seek to address concerns about potentially late hospice enrollment and to improve the quality of end-of-life care more generally. Since 2016, under the physician fee schedule, Medicare has paid for advance care planning conversations between beneficiaries and their physicians, advanced practice registered nurses, or physician assistants. In 2016, CMS also launched a demonstration program (called the Medicare Care Choices Model (MCCM)) that permitted certain FFS beneficiaries who were eligible for hospice (but not enrolled in the Medicare hospice benefit) to enroll in the demonstration and receive palliative and supportive care from a hospice provider while continuing to receive "curative" care from other providers. ${ }^{22}$ An evaluation of the first four years of the MCCM reported that participants were more likely to enroll in hospice before death and to do so earlier than the comparison group of decedents. The fourth evaluation found, based on the experience of 4,574 MCCM enrollees who enrolled between January 2016 and September 2020 and died by March 2021, that the MCCM was associated with a 14 percent net reduction in Medicare expenditures for these beneficiaries due to greater hospice use and lower acute care costs at the end of life (Kranker et al. 2022). The report cautioned against broadly extrapolating from these findings because the model involved a small number of beneficiaries and hospice providers, and the report noted uncertainty over the magnitude of the effect on spending. ${ }^{23}$

In March 2014, the Commission recommended that hospice be included in the MA benefit package, which would give plans greater incentive to develop and test new models aimed at improving end-of-life care and care for beneficiaries with advanced illnesses (Medicare Payment Advisory Commission 2014). As noted earlier, CMMI launched a VBID demonstration in January 2021 that tests, for MA plans participating in the demonstration, the inclusion of hospice services in the MA benefit. Participating plans may also offer enrollees palliative care outside the hospice benefit, transitional concurrent hospice and curative care, and hospice supplemental benefits (e.g., waiver of hospice cost sharing for drugs and respite care or additional inhome caregiver support).

In 2021, the first year of the hospice VBID, 9 MA parent organizations offered hospice in 52 plan benefit packages. The first-year evaluation report stated that about 9,630 beneficiaries received hospice care from an MA plan through the VBID in 2021 (Khodyakov et al. 2022). In VBID participating plans, hospice use was similar in 2021 and 2020, the year before VBID began (Khodyakov et al. 2022). In addition, the report indicated that some beneficiaries received transitional concurrent care ( 146 beneficiaries), hospice supplemental benefits ( 525 beneficiaries), and nonhospice palliative care ( 2,596 beneficiaries), although the report stated that there was less use of these additional benefits than expected. According to the report, MA plans and hospice providers reported implementation challenges, but they reported that these challenges lessened over time. Experience with VBID hospice continues to evolve as the number of plans participating increases in future years of the model. In 2023, 15 MA parent organizations will offer hospice in 119 plan benefit packages.

In addition to MA plans, accountable care organizations (ACOs)-which are accountable for a defined Medicare population's total spending, including end-of-life care and hospice-are entities that could provide hospice care and potentially reduce costs by implementing policies that would facilitate beneficiaries' use of end-of-life care in a way that is consistent with their preferences. Research examining the effect of ACOs on patterns of end-of-life care and hospice use are nascent, but findings to date suggest that the effects are modest (Gilstrap et al. 2018).

## Providers' access to capital: Hospices have good access to capital

Hospices in general require less capital than many other provider types because they do not need extensive physical infrastructure (although some hospices have built their own inpatient units, requiring significant capital). Overall, access to capital for hospices appears adequate, given the continued entry of for-profit providers in the Medicare program.

In 2021, the number of for-profit providers grew by more than 8 percent, indicating that these providers have been able to access capital. Although the coronavirus pandemic has affected hospice providers' operations in a number of ways, financial reports indicate that publicly traded companies continued to
have strong financial performance through the third quarter of 2022 (Amedisys 2022, Chemed 2022, Enhabit 2022). Several companies reported that admissions and average daily censuses had not yet returned to prepandemic levels. Some pointed to constraints on their capacity to accept new patients in some locations because of a shortage of staff and hiring challenges. The reports suggest that staffing shortages were particularly pronounced in the first half of 2022; while not fully resolved, these staffing issues have eased somewhat in the third quarter. Several companies reported using hiring bonuses, retention bonuses, or both as part of their hiring strategy and that they faced increased labor costs. Some companies continued to report lower average daily censuses because nursing facilities' and assisted living facilities' referrals had not rebounded to prepandemic levels. Despite these issues, publicly traded companies' margins continue to be strong. Furthermore, the hospice sector continues to garner substantial investment interest from private equity firms and investors, and market valuations of hospice companies are high (Parker 2022, Vossel 2022a, Vossel 2022b). Among nonprofit freestanding providers, less is known about access to capital, which may be limited. Hospital-based and home health-based nonprofit hospices have access to capital through their parent providers, and both sectors currently appear to have adequate access to capital.

A provider's all-payer total margin-which reflects how its total revenues compare with its total costs for all lines of business and all payers-can influence a provider's ability to obtain capital. Irregularities in the way some hospices report their total revenue and total expense data on cost reports prevent us from calculating a reliable estimate of all-payer total margins for hospices. Among hospice payers, however, Medicare accounts for about 90 percent of hospice days, and hospices' Medicare margins are strong.

## Medicare payments and costs: Aggregate payments exceed costs

Hospice costs per day increased 4.2 percent between 2020 and 2021, up considerably relative to historical cost growth. Hospice costs per day vary substantially by providers' average length of stay, with hospices with longer stays having lower costs per day on average. Hospice margins are presented through 2020 because of the data lag required to calculate cap overpayment
amounts. Average cost per day increased just 1.1 percent between 2019 and 2020, which helped boost the 2020 Medicare aggregate margin to 14.2 percent ( 16 percent including pandemic relief funds), up from 13.4 percent in 2019. Given the acceleration in cost growth in 2021 and the reinstatement of the 2 percent sequester beginning July 2022, we project a Medicare aggregate margin for hospices of about 8 percent in 2023.

## Hospice costs

In 2021, hospice costs per day across all levels of care and hospice providers averaged about $\$ 156$, rising 4.2 percent from 2020. Between 2019 and 2020 (the year of our margin estimate), hospice costs per day grew 1.1 percent.

Hospice costs per day vary substantially by type of provider (Table 10-10), which is one reason for differences in hospice margins across provider types. In 2021, freestanding hospices had lower average costs per day than provider-based hospices (i.e., home health-based and hospital-based hospices). For-profit and rural hospices also had lower average costs per day than their respective counterparts. Many factors contribute to variation in hospice costs across providers. One factor is length of stay. Hospices with longer stays have lower costs per day on average. Freestanding and for-profit hospices have substantially longer stays than other hospices and thus have lower costs per day (Medicare Payment Advisory Commission 2022). Another factor is overhead costs. Included in the costs of provider-based hospices are overhead costs allocated from the parent provider, which contributes to provider-based hospices' higher costs compared with freestanding providers. The Commission maintains that payment policy should focus on the efficient delivery of services and that if freestanding hospices are able to provide high-quality care at a lower cost than provider-based hospices, payment rates should be set accordingly; the higher costs of provider-based hospices should not be a reason for increasing Medicare payment rates.

## Hospice margins

In 2020, the Medicare aggregate margin for hospice providers was 14.2 percent, up from 13.4 percent in 2019 (Table 10-11, p. 306). ${ }^{24}$ Medicare aggregate margins varied widely across individual hospice providers: -4.5 percent at the 25th percentile, 14.1 percent at the 50th percentile, and 27.6 percent at the 75 th percentile

10-10 Total hospice costs per day varied by type of provider, 2021

## Average total cost per day

| All hospices | $\$ 156$ |
| :--- | :---: |
| Freestanding | 150 |
| Home health based | 167 |
| Hospital based | 231 |
| For profit | 138 |
| Nonprofit | 184 |
| Urban | 158 |
| Rural | 142 |

Note: Data reflect aggregate costs per day for all types of hospice care combined (routine home care, continuous home care, general inpatient care, and inpatient respite care) for all payers. "Days" reflects the total number of days for which the hospice is responsible for care of its patients, regardless of whether the patient received a visit on a particular day. Data are not adjusted for differences in case mix or wages across hospices.

Source: MedPAC analysis of Medicare hospice cost reports and Medicare Provider of Services file from CMS.
(data not shown). Our estimates of Medicare aggregate margins exclude overpayments to above-cap hospices and are calculated based on Medicare-allowable, reimbursable costs, consistent with our approach used in other Medicare sectors. ${ }^{25}$ In addition, these aggregate Medicare margin estimates do not include federal relief funds related to the coronavirus pandemic that were received by hospice providers in 2020. However, if a portion of these relief funds received by freestanding hospice providers in 2020 were included in our margin estimates, the aggregate Medicare margin would have been about 16 percent (compared with our estimated 14.2 percent). ${ }^{26}$

Hospice margins vary by provider characteristics, such as type of hospice (freestanding or provider based), type of ownership (for profit or nonprofit), patient volume, and urban or rural location (Table 1011, p. 306). In 2020, freestanding hospices had higher Medicare aggregate margins ( 16.7 percent) than home health-based (11.2 percent) or hospital-based hospices (-18.2 percent) (Table 10-11). Provider-based hospices

| Category | Share of hospices 2020 | 2016 | 2017 | 2018 | 2019 | 2020 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| All | 100\% | 10.9\% | 12.5\% | 12.4\% | 13.4\% | 14.2\% |
| Freestanding | 83 | 14.0 | 15.3 | 15.1 | 16.2 | 16.7 |
| Home health based | 9 | 6.2 | 8.1 | 8.4 | 9.6 | 17.2 |
| Hospital based | 8 | -16.7 | -13.8 | -16.5 | -18.4 | -18.2 |
| For profit | 73 | 17.9 | 20.0 | 19.0 | 19.2 | 20.5 |
| Nonprofit | 24 | 2.2 | 2.5 | 3.8 | 6.0 | 5.8 |
| Urban | 83 | 17.4 | 12.9 | 12.6 | 13.6 | 14.3 |
| Rural | 17 | 6.3 | 8.9 | 10.3 | 17.5 | 13.5 |
| Patient volume (quintile) |  |  |  |  |  |  |
| Lowest | 20 | -3.1 | -7.1 | -3.1 | -4.5 | -2.1 |
| Second | 20 | 6.2 | 6.7 | 5.6 | 6.2 | 4.9 |
| Third | 20 | 11.2 | 13.8 | 13.8 | 13.5 | 14.2 |
| Fourth | 20 | 13.1 | 15.2 | 14.0 | 15.8 | 17.9 |
| Highest | 20 | 17.1 | 12.5 | 12.7 | 13.9 | 14.4 |
| Below cap | 81 | 10.7 | 12.6 | 12.5 | 13.8 | 14.8 |
| Above cap (excluding cap overpayments) | 19 | 12.6 | 12.1 | 10.1 | 10.0 | 7.7 |
| Above cap (including cap overpayments) | 19 | 20.2 | 21.9 | 21.8 | 22.5 | 22.8 |
| Share of stays > 180 days |  |  |  |  |  |  |
| Lowest quintile | 20 | -5.4 | -4.5 | -3.0 | -2.5 | -0.4 |
| Second quintile | 20 | 5.8 | 7.0 | 8.5 | 10.3 | 11.8 |
| Third quintile | 20 | 14.8 | 17.1 | 16.8 | 19.9 | 20.0 |
| Fourth quintile | 20 | 20.0 | 22.1 | 20.8 | 22.8 | 24.1 |
| Highest quintile | 20 | 15.0 | 17.8 | 17.6 | 13.4 | 13.4 |
| Share of patients in nursing facilities and assisted living facilities |  |  |  |  |  |  |
| Lowest half | 50 | 4.8 | 6.3 | 6.1 | 6.6 | 7.5 |
| Highest half | 50 | 16.2 | 18.1 | 17.3 | 18.7 | 18.9 |

Note: Margins for all provider categories exclude overpayments to above-cap hospices, except where specifically indicated. Medicare aggregate margins are calculated based on Medicare-allowable, reimbursable costs. Margin by hospice ownership status is based on hospices' ownership designation from the Medicare cost report. The rural and urban definitions used in this chart are based on updated definitions of the corebased statistical areas (which rely on data from the 2010 census).

Source: MedPAC analysis of Medicare hospice cost reports, Medicare hospice claims data, and Medicare Provider of Services file from CMS.
typically have lower Medicare aggregate margins than freestanding hospices for several reasons, including their shorter stays and the allocation of overhead costs from the parent provider to the provider-based
hospice. In 2020, the Medicare aggregate margin was considerably higher for for-profit hospices (20.5 percent) than for nonprofit hospices ( 5.8 percent). The Medicare aggregate margin for freestanding
nonprofit hospices was higher ( 9.5 percent) than the margin for nonprofit hospices overall (data not shown). Generally, hospices' Medicare aggregate margins vary by the provider's volume-hospices with more patients have higher margins on average. Hospices in urban areas had a slightly higher overall Medicare aggregate margin ( 14.3 percent) than those in rural areas ( 13.5 percent). Between 2016 and 2020, the gap in margins between urban and rural hospices shrank, from over 5 percentage points in 2016 to less than 1 percentage point in 2020.

In 2020, above-cap hospices had favorable margins even after the return of overpayments. Above-cap hospices had a Medicare aggregate margin of about 22.8 percent before the return of overpayments but had a margin of 7.7 percent after the return of overpayments. The Medicare aggregate margin for below-cap hospices was 14.8 percent.

Hospice profitability is closely related to length of stay. Hospices with longer stays have higher margins. For example, in an analysis of hospice providers based on the share of their patients' stays exceeding 180 days, the Medicare aggregate margin ranged from -0.4 percent for hospices in the lowest quintile to 24.1 percent for hospices in the second-highest quintile (Table 10-11). Hospices in the quintile with the greatest share of their patients exceeding 180 days had a 13.4 percent Medicare aggregate margin after the return of cap overpayments, but without the hospice aggregate cap, these providers' margins would have averaged 22.7 percent (latter figure not shown in table).

Hospices with a large share of patients in nursing facilities and assisted living facilities have higher Medicare aggregate margins than other hospices (Table 10-11). For example, in 2020, the 50 percent of hospices with the highest share of patients residing in nursing facilities and assisted living facilities had an aggregate Medicare margin that was more than double the margin for providers with fewer patients residing in facilities. The higher margin among hospices treating more facility patients is driven in part by the diagnosis profile and length of stay of patients residing in facilities. In addition, treating hospice patients in a centralized location may create efficiencies in terms of mileage costs and staff travel time, as well as facilities serving as referral sources for new patients. Nursing facilities can also be a more efficient setting for hospices to provide
care because of the overlap in responsibilities between the hospice and the nursing facility.

## Projected 2023 Medicare aggregate margin

To project the 2023 Medicare aggregate margin, we model the policy changes that went into effect between 2020 (the year of our most recent margin estimates) and 2023. The policies include annual payment updates in 2021, 2022, and 2023 of 2.4 percent, 2.0 percent, and 3.8 percent, respectively. The updates for these years reflect the market basket update and a productivity adjustment. In addition, our margin projection reflects reinstatement of the 2 percent sequester beginning in July 2022. (The sequester was suspended from May 2020 to March 2022 and was reinstated at 1 percent from April to June 2022.) We assume a rate of cost growth equal to 4.2 percent in 2021 (the observed rate for that year) and the projected growth in the market basket in 2022 and 2023, which reflects the most current data available on wage growth. Taking these factors into account, for 2023, we project a Medicare aggregate hospice margin of about 8 percent.

## Policy to modify the hospice aggregate cap

In its March 2022 report to the Congress, the Commission determined that the aggregate level of hospice payments exceeded the amount necessary to provide high-quality care and that payments could be reduced in 2022. Rather than recommend an across-the-board reduction, the Commission recommended that payments in fiscal year 2023 be frozen at fiscal year 2022 levels and that the aggregate level of payments be reduced through a policy to modify the cap.

The Commission recommended that the aggregate cap be wage adjusted and reduced by 20 percent. Because the hospice payments are wage adjusted but the aggregate cap is not, the cap is more generous in some areas of the country than in others. Wage adjusting the cap would make it equitable across all providers. ${ }^{27}$ The Commission also recommended that the aggregate cap be reduced by 20 percent. This reduction would focus payment reductions on providers with disproportionately long stays and high margins while leaving the majority of providers unaffected by the cap reduction. The Congress did not

## Simulated share of hospice providers exceeding the aggregate cap in 2020 under a policy to modify the aggregate cap

|  | 2020 share of providers exceeding the cap |  |
| :---: | :---: | :---: |
|  | Actual | Simulation of modified cap policy |
| All | 18.6\% | 33.5\% |
| Freestanding | 21.7 | 38.6 |
| Home health based | 4.4 | 13.3 |
| Hospital based | 0.7 | 3.2 |
| For profit | 24.6 | 43.0 |
| Nonprofit | 2.1 | 8.4 |
| Urban | 21.3 | 36.7 |
| Rural | 4.2 | 17.3 |

Note: This analysis simulates the effect of a policy to wage adjust and reduce the cap by 20 percent using 2020 data. The simulation assumes no changes in utilization in response to the policy. Although we are not able to incorporate potential behavioral changes in our simulation, it is possible that some providers might respond to cap changes by adjusting their admissions practices to remain under the cap.

Source: MedPAC analysis of Medicare claims data for hospice providers.
act on the Commission's recommendation to modify the aggregate cap.

Last year, we simulated the effect of the cap recommendation using historical data (from 2019). We have repeated that simulation with the most recently available data (from 2020) to provide an updated sense of its impact. An important caveat to our cappolicy simulations is that the simulations are based on historical data and make no projections or behavioral assumptions. Although we are not able to incorporate potential behavioral changes in our simulation, we note the possibility that some providers might respond to cap changes by adjusting their admissions practices to remain under the cap.

Under the Commission's cap recommendation-that the aggregate cap be wage adjusted and lowered-we estimate that the share of hospices exceeding the cap would increase, while the majority of providers would remain under the cap. In our simulation, the estimated share of hospices exceeding the cap in 2020 would
increase from 18.6 percent (the estimated actual rate) to 33.5 percent (Table 10-12). The additional providers estimated to exceed the cap would be predominantly for profit ( 89 percent) and freestanding ( 93 percent), with a long average length of stay (244 days as of the end of 2020 for all patients, not limited to decedents) and a high 2020 Medicare aggregate margin (25 percent) (data not shown). ${ }^{28}$ Our simulation estimates that about twothirds of providers would remain under the cap, with many of these providers being substantially below the cap. Across all providers, our simulation finds that about 40 percent of hospices would be 25 percent or more below the cap under this policy. In addition, a greater share of rural hospices (nearly two-thirds), nonprofit hospices (over three-quarters), and provider-based hospices (over three-quarters) would remain 25 percent or more below the cap.

We estimate that our proposed cap policy would have reduced aggregate Medicare program payments in 2020 by about 3.3 percent (assuming no changes in utilization) (Table 10-13). The reductions in payments

| $\begin{aligned} & \text { TABLE } \\ & 10-13 \end{aligned}$ | Simulated effect on hospice payments of policy to modify the aggregate cap |
| :---: | :---: |
|  | Percent change in Medicare payments based on simulation of recommended policy to wage adjust and reduce the cap by 20\% |
| All | -3.3\% |
| Freestanding | -3.8 |
| Home health based | -7.2 |
| Hospital based | -0.1 |
| For profit | -5.2 |
| Nonprofit | -0.7 |
| Urban | -3.2 |
| Rural | -4.3 |
| Share of stays > 180 days |  |
| Lowest quintile | 0.0 |
| Second quintile | 0.0 |
| Third quintile | -0.2 |
| Fourth quintile | -6.7 |
| Highest quintile | -17.2 |

Note: This analysis simulates the effect of a policy to wage adjust and reduce the cap by 20 percent using 2020 data. The simulation assumes no changes in utilization in response to the policy. Although we are not able to incorporate potential behavioral changes in our simulation, it is possible that some providers might respond to cap changes by adjusting their admissions practices to remain under the cap.

Source: MedPAC analysis of Medicare claims data for hospice providers.
would occur among a subset of providers with disproportionately long stays and high margins. For example, our simulation finds that the cap policy change would reduce payments for hospices in the top two length-of-stay quintiles (by about 7 percent in the fourth quintile and about 17 percent in the fifth (highest) quintile), while payments for other hospices would remain largely unchanged (Table 10-13). The effects of the cap policy by category of hospice provider depend on the prevalence of providers in each category with disproportionately long stays. Per category, for-profit and freestanding hospices are estimated to receive reduced payments under the policy to modify the cap, while payments to nonprofit and hospital-based providers (the two groups with the lowest margins) would be largely unaffected.

Under the modified cap policy, we expect that beneficiaries will continue to have good access to hospice care. As discussed in our March 2020 report, the current aggregate cap is equivalent to the amount that Medicare pays for a routine home care stay of about 179 days (assuming a wage index of 1.0). Because the cap is applied in the aggregate across the provider's entire patient population (including both short and long stays) and not at the individual level, a hospice provider can provide a substantial number of long stays and remain under the cap. For example, we can consider a hypothetical hospice with a wage index of 1.0 whose patients received only RHC. Under the current cap, if half of the hospice's patients each had a length of stay of 30 days, the other half could have an average length of stay of up to 335 days before that provider would

|  | 2020 payment-to-cost ratios |  |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | All providers |  | Urban |  | Rural |  |
|  | Actual | Simulation of recommended policy to wage adjust and reduce cap | Actual | Simulation of recommended policy to wage adjust and reduce cap | Actual | Simulation of recommended policy to wage adjust and reduce cap |
| Lowest quintile | 1.00 | 1.00 | 1.00 | 1.00 | 0.94 | 0.94 |
| Second quintile | 1.13 | 1.13 | 1.14 | 1.14 | 1.17 | 1.17 |
| Third quintile | 1.25 | 1.25 | 1.25 | 1.25 | 1.21 | 1.21 |
| Fourth quintile | 1.32 | 1.23 | 1.32 | 1.23 | 1.35 | 1.27 |
| Highest quintile | 1.15 | 0.96 | 1.13 | 0.95 | 1.36 | 1.04 |

Note: This analysis, using 2020 data, simulates the effect of a policy to wage adjust and reduce the cap by 20 percent. The simulation assumes no changes in utilization in response to the policy.

Source: MedPAC analysis of Medicare claims and cost report data for hospice providers
exceed the cap. ${ }^{29}$ The length-of-stay patterns in this hypothetical example are much longer than typical for the hospice population (for patients with both short and long stays), demonstrating the extent to which hospices that exceed the current cap have outlier utilization patterns. In the hypothetical example, if the hospice cap were reduced by 20 percent, the hospice provider could have half of its patients with 30-day stays and the other half with an average stay of 257 days before the provider would exceed the reduced aggregate cap amount.

There is evidence suggesting that some hospices are inappropriately using live discharges as a way to limit their cap liabilities. CMS and OIG should monitor this type of behavior under current policy and any changes under a policy to reduce the cap. In addition, there could be merit in considering a payment penalty for hospices with unusually high rates of live discharges. For example, live-discharge rates could be included in a compliance threshold policy, as discussed in our March 2021 report.

In aggregate, both urban and rural providers are estimated to experience reduced payments under the cap policy modification; however, these payment reductions would occur among the subset of urban and rural providers with disproportionately long stays and high margins. For example, both urban and rural providers in the two highest length-of-stay quintiles had substantial Medicare aggregate margins in 2020, with payment-to-cost ratios ranging from 1.13 to 1.36; these providers' payments would decline under the cap policy modification, as seen in Table 10-14. ${ }^{30}$ Table 10-14 also shows that rural providers with fewer long-stay patients and lower margins (e.g., providers in the two lowest length-of-stay quintiles) would see no change in their payments.

## How should Medicare payments change in 2024?

Under current law, Medicare's base payment rates for hospice care are increased annually based on the
projected increase in the hospice market basket, less an amount for productivity improvement. The final update for 2024 will not be set until summer 2023, but to get a sense of the update level, we note that CMS's third-quarter 2022 projections of the market basket (3 percent) and productivity adjustment ( 0.1 percent) would result in an increase in hospice payment rates of 2.9 percent.

Our indicators of payment adequacy for hospicesbeneficiary access to care, quality of care, provider access to capital, and Medicare payments relative to providers' costs-are generally positive. The Commission has concluded that a reduction in aggregate payments is warranted. However, in this sector, with the range of financial performance across providers and the existence of the hospice aggregate cap, there is the potential to focus payment reductions on providers with disproportionately long stays and high margins. Therefore, the Commission recommends that the hospice aggregate cap be wage adjusted and reduced by 20 percent while maintaining the current-law update for fiscal year 2024. Under this recommendation, payments would increase for many hospice providers by an estimated 2.9 percent, while payments would be reduced for providers with very long lengths of stay and low costs relative to payments.

## RECOMMENDATION 10

For fiscal year 2024, the Congress should update the $\mathbf{2 0 2 3}$ Medicare base payment rates for hospice by the amount specified in current law and wage adjust and reduce the hospice aggregate cap by 20 percent.

## RATIONALE 10

Our indicators of access to care are generally positive, and there are signs that the aggregate level of payment for hospice care exceeds the level needed to furnish high-quality care to beneficiaries. In 2021, the number of providers increased by 6 percent. The number of beneficiaries receiving hospice care and total days of hospice care were stable. Nationally, the share of Medicare decedents using hospice declined slightly, while use rates increased among some decedent populations. Average length of stay, which increased in 2020, declined in 2021 to its 2019 level. The 2020 Medicare marginal profit was about 18 percent. Access to capital appears good, as the number of for-profit
providers increased by more than 8 percent and financial reports suggest the sector is viewed favorably by investors. The 2020 Medicare aggregate margin was 14.2 percent ( 16 percent if relief funds related to the coronavirus pandemic are included). The projected 2023 Medicare aggregate margin is about 8 percent.

## IMPLICATIONS 10

Spending

- This recommendation would decrease federal program spending relative to the statutory update by $\$ 250$ million to $\$ 750$ million in one year and between $\$ 5$ billion and $\$ 10$ billion over five years.


## Beneficiary and provider

- We do not expect this recommendation to have an adverse effect on beneficiaries' access to care or on providers' willingness or ability to care for Medicare beneficiaries.


## Endnotes

1 If a beneficiary does not have an attending physician, they can initially elect hospice based on the certification of the hospice physician alone.

2 For a more complete description of the hospice payment system, see https://www.medpac.gov/wp-content/ uploads/2021/11/MedPAC_Payment_Basics_22_hospice_ FINAL_SEC.pdf.

3 Throughout this chapter, we use the term "FFS Medicare" or "traditional Medicare" as equivalents for the CMS term "Original Medicare." Collectively, we distinguish the payment model represented by these terms from other models such as Medicare Advantage or advanced alternative payment models that may use FFS mechanisms but are designed to create different financial incentives.

4 Some studies have found large cost savings due to hospice, while others have found little or no savings overall. A contractor report sponsored by the Commission examined the difference in methodologies used in the literature (Direct Research 2015). The report found that large hospice cost savings found by some studies are likely an artifact of the methodology used rather than a reflection of the effect of hospice on Medicare spending. In particular, the report reviewed the methodology used by six studies. Four studies that looked at a fixed time period prior to death (e.g., the last year or half year) showed small costs or small savings for hospice users, depending on time period and population studied. By contrast, two studies that looked only at the period of hospice enrollment (and compared it with a "pseudo"-enrollment period created for nonhospice decedents) showed very large (e.g., 24 percent) cost savings for hospice decedents. The report suggested that, because the date of enrollment or pseudo-enrollment influences the calculated savings or costs, issues with assigning a pseudo-enrollment date to nonhospice enrollees make this methodology biased to find savings.

5 The cap is increased each year by a measure of inflation. Through 2016, it was increased annually by the rate of growth in the consumer price index for all urban consumers for medical care. In accord with the statute, the aggregate cap from 2017 through 2032 is updated annually by the same factor as the hospice payment rates (market basket net of productivity and other adjustments). After 2032, the aggregate cap will revert to being updated based on the consumer price index.

6 The beneficiary count starts with the number of beneficiaries treated by the hospice in the cap year. If a beneficiary
receives care from more than one hospice, in more than one cap year, or both, that beneficiary is generally represented as a fraction in the beneficiary count of the cap calculation. In general, the fraction is calculated based on a proportional methodology and reflects the number of days of hospice care in a cap year the beneficiary received from that hospice as a percent of all days of hospice care received by that beneficiary from all hospices in all years. Because the fraction a beneficiary represents in a prior year's cap calculation can change going forward as that beneficiary continues to receive hospice care in subsequent cap years, CMS claims processing contractors can revisit the cap calculation for up to three years to update the beneficiary count and collect additional overpayments. Some hospices have elected an alternative methodology for handling the beneficiary count when a patient receives care in more than one cap year, called the streamlined methodology. For a detailed description of the two methodologies for the beneficiary count and when they are applicable, see our March 2012 report (Medicare Payment Advisory Commission 2012).

7 Type of hospice reflects the type of cost report filed (a hospice files a freestanding hospice cost report or the hospice is included in the cost report of a hospital, home health agency, or skilled nursing facility). The type of cost report does not necessarily reflect where patients receive care. For example, all hospice types may serve some nursing facility patients.

8 From 2017 to 2021, California averaged gains of about 123 hospices each year, and Texas averaged gains of 48 hospices each year.

9 The California auditor's report stated: "The fraud indicators we found particularly in Los Angeles County include the following: A rapid increase in the number of hospice agencies with no clear correlation to increased need. Excessive geographic clustering of hospices with sometimes dozens of separately licensed agencies located in the same building. Unusually long durations of hospice services provided to individual patients. Abnormally high rates of still-living patients discharged from hospice care. Hospice agencies using possibly stolen identities of medical personnel" (Tilden 2022).

10 In 2021, about 22 percent of elderly individuals who died of COVID-19, pneumonia, or influenza died at home or in a nursing facility compared with 59 percent of elderly individuals who died of other causes (Centers for Disease Control and Prevention 2022a).

11 In March 2020, to limit coronavirus exposure and spread among nursing facility residents, CMS issued guidance restricting nursing facility visitations by all visitors and nonessential health care personnel, except in certain compassionate-care situations, such as end-of-life situations (Centers for Medicare \& Medicaid Services 2020a). Although CMS's guidance permitted visits by outside hospice staff, hospice industry groups reported that some facilities limited access to these staff. Over time, CMS provided additional guidance to states and facilities about phased reopening and expanded visitation (Centers for Medicare \& Medicaid Services 2020c). In November 2021, CMS issued guidance that visits would again be allowed for all residents at all times (Centers for Medicare \& Medicaid Services 2021).

12 This comparison of hospice use in 2020 and 2021 is based on paid Medicare claims. It slightly understates hospice use in 2021 because it excludes the roughly 9,630 beneficiaries who received hospice care that was paid for by MA plans participating in the hospice VBID demonstration.

13 In 2021, hospice patients in assisted living had markedly longer stays compared with those in other settings, even for the same diagnosis, which warrants further monitoring and investigation in CMS's medical review efforts.

14 The Commission bases these estimates of the share of hospices that exceed the cap in our analysis. While they are intended to approximate CMS claims processing contractors' calculations, differences in available data, methodology, and the timing of the calculations can lead to different estimates. Our estimates assume all hospices use the proportional methodology and rely on claims data through 15 months after the end of each cap year (except for cap year 2016, which uses data through 14 months after the close of the cap year). The claims processing contractors may reopen the hospice cap calculation for up to three years; the reopening process and timing may vary across contractors. To illustrate the potential effect of reopening, we re-estimated cap overpayments for 2017 using an additional 36 months of claims data (i.e., a 51-month period). With the additional 36 months of data, the estimated share of hospices exceeding the cap would increase by just under 2 percentage points, the average payments over the cap per hospice exceeding the cap would increase by roughly $\$ 25,000$, and payments over the cap as a share of overall Medicare hospice spending would increase by 0.3 percentage point.

15 For beneficiaries receiving the RHC level of care, hospices can provide services using telehealth during the public health emergency, if feasible and appropriate, to ensure that beneficiaries continue to receive reasonable and necessary services for palliation of the terminal illness and related conditions. Provision of telehealth visits must be included in the patient's plan of care and tied to patient-specific needs.

16 We made a similar recommendation for home health agencies. CMS is implementing mandatory telehealth reporting by home health agencies in 2023.

17 If we approximate marginal cost as total Medicare costs minus fixed building and equipment costs, then marginal profit can be calculated as follows:

Marginal profit = (payments for Medicare services - (total Medicare costs - fixed building and equipment costs)) / Medicare payments.

This comparison is a lower bound on the marginal profit because we do not consider any potential labor costs that are fixed.

18 In 2021, about 20 percent of hospices did not report the required quality measures or did not meet the timely reporting requirement and face a 2 percentage point reduction in Medicare payment rates for fiscal year 2023. On average, these hospices tend to be small, as they accounted for only about 7 percent of total payments in 2021.

19 The response rate for the hospice CAHPS in the most recent period was 29 percent (https://www.hospicecahpssurvey. org/en/scoring-and-analysis).

20 For both of the new claims-based quality measures, the public reporting program uses an 8-quarter reference period, with the aim of increasing the sample size at the provider level to enable CMS to report data on as many providers as possible.

21 Our analysis focuses on the broadest measure of live discharges, including live discharges initiated by the hospice (because the beneficiary is no longer terminally ill or because the beneficiary is discharged for cause) and live discharges initiated by the beneficiary (because the beneficiary revokes hospice enrollment, transfers hospice providers, or moves out of the area). Some stakeholders argue that live discharges initiated by the beneficiary are outside the hospice's control and should not be included in a live-discharge measure. Because beneficiaries choose to revoke hospice for a variety of reasons, which in some cases are related to the hospice provider's business practices or quality of care, we include revocations in our analysis. A CMS contractor, Abt Associates, found that rates of live discharge-due to beneficiary revocations and discharges because beneficiaries are no longer terminally ill-increase as hospice providers approach or surpass the aggregate cap (Plotzke et al. 2015). The contractor's report suggested that this pattern could reflect hospice-encouraged revocations or inappropriate live discharges and merit further investigation.

22 The term "curative care" is often used interchangeably with "conventional care" to describe treatments intended to be disease modifying.

23 Eligibility for the MCCM model was limited to beneficiaries with a life expectancy of 6 months or less who had certain diagnoses, utilization history, and location of care (diagnoses of cancer, congestive heart failure, chronic obstructive pulmonary disease, or HIV/AIDS; at least 1 hospital encounter and at least 3 office visits in the last 12 months; no election of hospice in the last 30 days; lived in a traditional home continuously for the last 30 days). While 89 hospices participated in the model, 5 hospices provided care to nearly half of the model's beneficiaries. The report stated that "these results might not generalize from the relatively small number of MCCM hospices and enrollees to other hospice providers or beneficiaries. And, although the evaluation has many strengths, some of the estimated differences in outcomes between MCCM enrollees and matched comparison beneficiaries could be due to unobserved differences between the two groups, such as having clinicians more likely to recommend hospice to their patients. Sensitivity analyses suggest these unobserved differences would have to be very large to fully negate the findings, but perhaps true impacts were not quite as large as we estimated" (Kranker et al. 2022).

24 The aggregate Medicare margin is calculated as follows:
((sum of total Medicare payments to all providers) - (sum of total Medicare costs of all providers) / (sum of total Medicare payments to all providers)).

Estimates of total Medicare costs come from providers' cost reports. Estimates of Medicare payments and cap overpayments are based on Medicare claims data.

25 Hospices that exceed the Medicare aggregate cap are required to repay the excess to Medicare. We do not consider the overpayments as part of hospice revenues in our margin calculation. We also exclude from our margin calculation nonreimbursable bereavement and volunteer costs, which are reported in nonreimbursable cost centers on the Medicare cost report. Statute requires that hospices offer bereavement services to family members of their deceased Medicare patients (Section 1861(dd)(2)(A)(i) of the Social Security Act); however, the statute prohibits Medicare payment for these services (Section 1814(i)(1)(A)). Including nonreimbursable bereavement and volunteer costs in our margin calculation would reduce the aggregate Medicare margin for 2020 by at most 1.2 percentage points and 0.3 percentage point, respectively.

26 Because federal relief funds were intended to help cover lost revenue and payroll costs-including lost revenue from

Medicare patients and the cost of staff who help treat these patients-this alternate margin estimate includes a portion of these relief funds (based on the amount of relief funds received by each provider in cost report year 2020 multiplied by the provider's 2019 ratio of hospice days for Medicare patients to hospice days for all patients). Using this method, the alternate margin calculation allocates about 91 percent of federal relief funds that freestanding hospices reported on their 2020 cost reports toward hospices' care of Medicare beneficiaries in 2020.

27 As discussed in our March 2020 report, the hospice cap could be wage adjusted in the following manner: For each provider, Medicare could calculate the provider's wage index ratio and adjust the aggregate cap accordingly. Wage index ratio = provider's actual payments in cap year / amount that provider's payments would have been without wage adjustment. Wage-adjusted cap for a particular provider = national cap $\times$ wage index ratio for the provider. The cap calculation would otherwise work the same as it does today. If the provider's payments in the cap year exceeded the wage-adjusted cap multiplied by the number of beneficiaries served, the provider would repay the excess to the government.

28 Average length of stay is calculated for all patients who received hospice in 2020 and reflects lifetime length of stay as of the end of 2020 (or as of the date of death if it occurred in 2020). Across all hospices, this average was 155 days in 2020. In contrast, we estimate that average length of stay was 244 days among those providers that our simulation model estimates would switch from being below the cap to above the cap under a policy to wage adjust and reduce the cap by 20 percent.

29 This hypothetical example involves a hospice that provided only RHC to its patients. The aggregate cap equates to a smaller number of days for the other, more intense, higherpaid levels of care. However, the three other levels of care are typically furnished for only a short period, so the general principle that providers have room within the cap to furnish very long stays to some patients without exceeding the cap applies to providers that furnish the three higher-intensity levels of care as well. In addition, this example involves beneficiaries who receive hospice care entirely within a cap year. When beneficiaries receive hospice care across multiple cap years, methodologies exist to apportion the hospice cap amount for the beneficiary across cap years. In that situation, the average length of stay that results in a hospice exceeding the cap varies and depends on several factors, such as how many beneficiaries receive care entirely within the cap year versus multiple cap years and what share of a beneficiary's hospice days occur in only the cap year versus within other cap years. The example also assumes that beneficiaries
receive all their hospice care from a single hospice provider. When a beneficiary switches hospice providers and receives care from multiple different hospice providers, that beneficiary is represented in the beneficiary count for each hospice that furnished services to the beneficiary in a prorated manner (based on the share of total days of care provided by each hospice).

30 Rural providers are less likely to be in the top two length-of-stay quintiles than urban providers. About 44 percent of urban providers and 22 percent of rural providers were in the top two length-of-stay quintiles. In terms of revenues, a similar share of Medicare payments ( 33 percent of urban and 31 percent of rural) were made to providers in the top two length-of-stay quintiles.

## References

Amedisys. 2022. Amedisys third quarter 2022 earnings call.
Abt Associates, Department of Health and Human Services. 2022. 2021 Technical Expert Panel meetings: Hospice quality reporting program summary report. Report by Abt Associates for the Centers for Medicare \& Medicaid Services. Rockville, MD: Centers for Medicare and Medicaid Services. https://www.cms. gov/files/document/2021-hqrp-tep-summary-reportfinal.pdf.

Barnato, A. E., D. L. Anthony, J. Skinner, et al. 2009. Racial and ethnic differences in preferences for end-of-life treatment. Journal of General Internal Medicine 24, no. 6 (June): 695-701.

California Legislature. 2021. AB-1280: California Hospice Licensure Act of 1990. https://leginfo.legislature.ca.gov/faces/ billTextClient.xhtml?bill_id=202120220AB1280.

Centers for Disease Control and Prevention. 2022a. COVID-19 mortality overview. January 10. https://www.cdc.gov/nchs/ covid19/mortality-overview.htm.

Centers for Disease Control and Prevention. 2022b. COVID-19 provisional counts: Weekly updates. https://www.cdc.gov/nchs/ nvss/vsrr/covid_weekly/index.htm\#PlaceDeath.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022a. Medicare Advantage value-based insurance design model calendar year 2022 model participation. Fact sheet. https://www.cms.gov/newsroom/fact-sheets/ medicare-advantage-value-based-insurance-design-model-calendar-year-2023-model-participation.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022b. Medicare program; FY 2023 hospice wage index and payment rate update and hospice quality reporting requirements. Final rule. Federal Register 87, no. 145 (July 29): 45669-45702.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022c. Technical Expert Panel (TEP) charter. https://www.cms.gov/files/document/hqrp-hh-qrp-health-equity-tep-charter08july2022final.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2021. Nursing home visitation: COVID-19 (revised). https://www.cms.gov/files/document/qso-20-39-nhrevised.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2020a. Guidance for infection control and prevention of COVID-19 in nursing homes (revised). https:// www.cms.gov/files/document/qso-20-14-nh-revised.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2020b. Medicare Advantage value-based insurance design model calendar year 2021 model participation. Fact sheet. https://www.cms.gov/newsroom/fact-sheets/ medicare-advantage-value-based-insurance-design-model-calendar-year-2021-model-participation.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2020c. Nursing home visitation-COVID-19. https://www.cms.gov/files/document/qso-20-39-nh.pdf.

Chemed. 2022. Chemed Corporation third quarter 2022 earnings call.

Cohen, L. L. 2008. Racial/ethnic disparities in hospice care: A systematic review. Journal of Palliative Medicine 11, no. 5 (June): 763-768.

Crawley, L., R. Payne, J. Bolden, et al. 2000. Palliative and end-of-life care in the African American community. Journal of the American Medical Association 284, no. 19 (November 15): 25182521.

Direct Research. 2015. Spending in the last year of life and the impact of hospice on Medicare outlays (updated August 2015). Report prepared by Direct Research for the Medicare Payment Advisory Commission. Washington, DC: Medicare Payment Advisory Commission.

Enhabit. 2022. Enhabit third quarter 2022 earnings call and supplemental information.

Gilstrap, L. G., H. A. Huskamp, D. G. Stevenson, et al. 2018. Changes in end-of-life care in the Medicare Shared Savings Program. Health Affairs 37, no. 10 (October): 1693-1700.

Government Accountability Office. 2004. Medicare hospice care: Modifications to payment methodology may be warranted. GAO-05-42. Washington, DC: GAO.

Hoyer, T. 2007. The future of hospice. Caring, November 6-8.

Khodyakov, D., C. Eibner, E. A. Taylor, et al. 2022. Evaluation of phase II of the Medicare Advantage value-based insurance design model test: First two years of implementation (2020-2021). Report prepared for the Center for Medicare and Medicaid Innovation, Centers for Medicare \& Medicaid Services. Santa Monica, CA: RAND Health Care. https://innovation.cms.gov/data-and-reports/2022/vbid-1st-report-2022.

Kranker, K., M. Niedzwiecki, R. V. Pohl, et al. 2022. Evaluation of the Medicare Care Choices Model: Fourth annual report. Washington, DC: Center for Medicare \& Medicaid Innovation. April. https://innovation.cms.gov/data-and-reports/2022/ mcem-fourth-annrpt.

LoPresti, M. A., F. Dement, and H. T. Gold. 2016. End-of-life care for people with cancer from ethnic minority groups: A systematic review. American Journal of Hospice and Palliative Care 33, no. 3 (April): 291-305.

Martin, M. Y., M. Pisu, R. A. Oster, et al. 2011. Racial variation in willingness to trade financial resources for life-prolonging cancer treatment. Cancer 117, no. 15 (August 1): 3476-3484.

Medicare Payment Advisory Commission. 2022. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2014. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2012. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2010. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2009. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2008. Report to the Congress: Reforming the delivery system. Washington, DC: MedPAC.

Parker, J. 2022. Hospice M\&A going strong, but non-medical home care a rising star. Hospice News, September 19. https:// hospicenews.com/2022/09/19/hospice-ma-going-strong-but-non-medical-home-care-a-rising-star/.

Plotzke, M., T. J. Christian, E. Axelrod, et al. 2015. Medicare hospice payment reform: Analysis of how the Medicare hospice benefit is used. Report prepared for the Centers for Medicare \& Medicaid Services. Cambridge, MA: Abt Associates.

Tilden, M. 2022. California hospice licensure and oversight: The state's weak oversight of hospice agencies has created opportunities for large-scale fraud and abuse. Sacramento, CA: Auditor of the State of California. https://www.bsa.ca.gov/pdfs/ reports/2021-123.pdf.

Vossel, H. 2022a. Hospice M\&A may cool down in 2022, private equity influence to expand. Hospice News, January 28. https:// hospicenews.com/2022/01/28/hospice-ma-may-slow-in-2022-private-equity-influence-to-expand/\#:~:text=Hospice\  M\%26A\%20May\%20Cool\%20Down\%20in\%202022\%2C\%20 Private,valuations\%20reaching\%20another\%20year\%20of\%20 record-highs\%20in\%202021.

Vossel, H. 2022b. Hospice M\&A outpacing other sectors despite Q1 slump. Hospice News, July 5. https://hospicenews. com/2022/07/05/hospice-ma-outpacing-other-sectors-despite-q1-slump/.


## The Medicare Advantage program: Status report

## CHAPTER

## 11

## The Medicare Advantage program: Status report

## Chapter summary

Each year, the Commission provides a status report on the Medicare Advantage (MA) program. In 2022, the MA program included 5,261 plan options offered by 182 organizations, enrolled about 29 million beneficiaries ( 49 percent of Medicare beneficiaries with both Part A and Part B coverage), and paid MA plans \$403 billion (not including Part D drug plan payments). To monitor program performance, we examine MA enrollment trends, plan availability for the coming year, and payments for MA plan enrollees relative to spending for beneficiaries enrolled in traditional fee-for-service (FFS) Medicare. We also provide updates on risk adjustment, risk coding practices, and the current state of quality reporting in MA.

The MA program gives Medicare beneficiaries the option of receiving benefits from private plans rather than from the FFS Medicare program. The Commission strongly supports the inclusion of private plans in the Medicare program. Beneficiaries should be able to choose among Medicare coverage options since some may prefer to avoid the constraints of provider networks and utilization management by enrolling in the traditional FFS Medicare program, while others may prefer to seek the additional benefits and alternative delivery systems that private plans provide. Because Medicare pays private plans a predetermined rate-risk

## In this chapter

- Increasingly robust MA enrollment, plan availability, and rebates
- Mandated report: Historical comparison shows MA payments consistently above FFS spending
- Coding differences increased payments to MA plans by $\$ 17$ billion in 2021 and generated rebate inequity across plans
- Quality in MA is difficult to evaluate
adjusted per enrollee-rather than a per service rate, plans should have greater incentives than FFS providers to deliver more efficient care.

The MA program is quite robust, with growth in enrollment, increased plan offerings, and, for the seventh straight year, a historically high level of extra benefits financed by payments to plans through rebates. From 2018 to 2022, the share of eligible Medicare beneficiaries enrolled in MA rose by 3 percentage points per year, from 37 percent to 49 percent. All indications suggest that a majority of eligible Medicare beneficiaries will be enrolled in MA in 2023. In 2023, the average Medicare beneficiary has a choice of 41 plans (offered by an average of 8 organizations), and the average MA plan enrollee has access to over $\$ 2,350$ in extra benefits annually that FFS enrollees cannot access without purchasing additional health insurance coverage or paying for the services on an out-of-pocket basis. Medicare payments for MA extra benefits have more than doubled since 2018. In this way, payments to MA plans have increasingly been used to provide an indirect subsidy to offer expanded benefits for MA enrollees. Medicare spending for these extra benefits (plus plan administrative fees and profit) accounts for 17 percent of payments to MA plans, yet we do not have reliable information about the extent to which beneficiaries use or value these benefits nor information about their value to beneficiaries.

The bids that MA plans submit to CMS suggest that plans continue to capitalize on their administrative flexibility and reduce their relative growth in health care costs year over year. Nearly all plan bids are below the projected cost of FFS Medicare. The average 2023 plan bid to provide Part A and Part B benefits was 17 percent less than FFS Medicare would be projected to spend for those enrollees under current payment policies.

The Commission remains concerned that the benefits from MA's lower cost relative to FFS spending are shared exclusively by the companies sponsoring MA plans (in the form of increased enrollment and revenues) and MA enrollees (in extra benefits). The taxpayers and FFS Medicare beneficiaries who help fund the MA program through Part B premiums do not realize any savings from MA plan efficiencies. Instead, Part B premiums are higher for all beneficiaries than they otherwise would be. Further, Medicare spends 6 percent more for MA enrollees than it would spend if those beneficiaries were enrolled in FFS Medicare, a difference that translates into a projected \$27 billion in 2023. This amount would be even larger if the favorable selection of beneficiaries in MA plans were taken into account because beneficiaries who
choose to enroll in an MA plan tend to be more profitable than beneficiaries who remain in FFS Medicare.

When risk-based payment for private plans was first added to Medicare in 1985, payments to private plans were set at 95 percent of FFS payments because it was expected that plans would share savings from their efficiencies relative to FFS with taxpayers. But private plans in the aggregate have never been paid less than FFS Medicare, due to policies that have explicitly elevated payments to MA above the FFS equivalent. As examples, MA benchmarks are set above FFS in many markets in part to encourage more uniform plan participation across the country, and quality payments (which the Commission has found do not meaningfully reflect plan quality, from the perspective of enrollees or the Medicare program) further inflate MA payments above FFS. Moreover, MA plans' diagnostic coding practices inflate payments and undermine the goal of plans competing to improve quality and reduce health care costs. All of these factors lead to government subsidization of increasingly higher levels of extra benefits for MA enrollees. In addition, the Commission finds that the plansubmitted data about beneficiaries' health care encounters are incomplete-or, in the case of many extra benefits, nonexistent-which prevents policymakers from understanding enrollees' use of services and plan efficiencies, limiting policymakers' ability to carry out program oversight. These policy flaws diminish the integrity of the program and generate waste from beneficiary premiums and taxpayer funds.

Although the additional benefits (including reductions in cost sharing and premiums for the basic Medicare benefit and for Part D coverage) are appealing to Medicare beneficiaries (as evidenced by the rapid enrollment growth), a major overhaul of MA policies is urgently needed to reduce the gap between MA and FFS payment for several reasons. First, the use and value of many supplemental benefits currently offered is unclear. Current supplemental benefits are well above historical levels, and the Commission has maintained that payments to plans could be reduced without substantial cuts to extra benefits that are highly valued by beneficiaries, such as lower premiums and cost sharing (indeed, these benefits likely would remain more generous than in the recent past). Second, the disparity between MA and FFS payment disadvantages beneficiaries who-due to medical reasons or personal preferences-do not want to enroll in MA plans that use tools like narrow networks or utilization management policies. Third, the paymentinduced growth in MA will increasingly create challenges for benchmark
setting because beneficiaries remaining in FFS may be higher risk (and thus have higher spending) in ways that risk adjustment cannot adequately capture. Finally, because of Medicare's fiscal situation, any expansions of benefits, if desired by policymakers, should be done deliberately, with attention to their value and in the most fiscally efficient manner. In the Commission's view, current policy does not meet that standard. Therefore, over the past few years, the Commission has made several recommendations to improve the program. These recommendations call for the Congress and CMS to address coding intensity, replace the quality bonus program, establish more equitable benchmarks, and improve the completeness of encounter data.

Plan payments-As noted above, total Medicare payments to MA plans in 2023 (including rebates that finance extra benefits) are projected to be $\$ 27$ billion higher than if MA enrollees were enrolled in FFS Medicare. Payments to MA plans-including the impact of coding intensity but ignoring any favorable selection-average an estimated 106 percent of projected FFS spending. In addition, MA benchmarks-the maximum amount Medicare will pay an MA plan to provide Part A and Part B benefits-continue to be well above projected FFS spending levels. In 2023, MA benchmarks averaged an estimated 109 percent of projected FFS spending (including quality bonuses but not accounting for MA coding), 1 percentage point above the level in 2022. Bids fell to 83 percent of projected FFS spending, a record low.

Risk adjustment and coding intensity-Medicare payments to MA plans are specific to each enrollee, based on a plan's payment rate and an enrollee's risk score. Risk scores account for differences in expected medical expenditures and are based in part on diagnoses that providers code. In FFS Medicare, most claims are paid using procedure codes, which offer little incentive for providers to record more diagnosis codes than necessary to justify providing a service. In contrast, MA plans have a financial incentive to ensure that their providers record all possible diagnoses because those diagnoses raise an enrollee's risk score and result in higher payments to the plan.

Our analysis of 2021 data shows that higher diagnosis coding intensity resulted in MA risk scores that were about 10.8 percent higher than scores for similar FFS beneficiaries. By law, CMS reduces MA risk scores across the board to make them more consistent with FFS coding; CMS has the authority to impose a larger reduction than the minimum required by law but has never done so. In 2021, the adjustment reduced MA risk scores by 5.9 percent, resulting in MA risk scores that were still about 4.9 percent higher than they would have
been if MA enrollees had been treated in FFS Medicare. In 2021, those higher scores resulted in $\$ 17$ billion in excess payments to MA plans, and we project that the amount will reach $\$ 23$ billion in 2023 (if MA coding remained the same as in 2021). We continue to find that coding intensity varies significantly across MA plans and that increasing diagnostic coding allows some plans to offer more extra benefits, thereby attracting more enrollees and undermining plan incentives to improve quality and reduce costs.

The Commission previously recommended changes to MA risk adjustment that would exclude diagnoses collected from health risk assessments (which rely on unverified enrollee-reported data), use two years of diagnostic data, and apply an adjustment to eliminate any residual impact of coding intensity. We find that nearly two-thirds of MA coding intensity could be due to use of diagnoses from chart reviews and health risk assessments, and that these two mechanisms are a primary factor driving coding differences among MA plans.

Quality in MA-The current state of quality reporting in MA is such that the Commission can no longer provide an accurate description of MA quality of care. Beneficiaries lack good information on the quality of care provided by MA plans in their local market, limiting their ability to make informed choices among plans. Further, the 49 percent of eligible Medicare beneficiaries enrolled in MA do not know how their plan's quality compares with quality in FFS Medicare. MA and FFS quality comparisons are also necessary for policymakers to evaluate the quality of care that beneficiaries receive in all sectors. In its June 2020 report, the Commission recommended replacing the current quality bonus program, which is not achieving its intended purposes and is costly to Medicare, with a new value incentive program for MA.

The academic community has devoted growing attention to assessing MA quality and making comparisons with FFS. Notwithstanding the methodological and data issues that are present in many studies, that literature suggests that MA plans likely improve performance on some process measures. Findings are sufficiently mixed on patient experience and outcomes that the Commission cannot conclude that MA plans systematically provide better quality over FFS.

## Mandated report: Historical comparison shows MA payments were consistently above FFS spending

The Consolidated Appropriations Act, 2023, mandated that the Commission submit a report by March 15, 2023, that compares MA and FFS per enrollee spending for at least the last five years for which data are available. The Act requests that the Commission's analysis use the FFS spending method
used to calculate MA benchmarks and to compare MA payments with beneficiaries enrolled in both Part A and Part B. We use our long-standing prospective method of comparing MA payments with FFS spending from 2004 through 2023 and supplement this analysis with a retrospective method using the available data on actual MA payments and FFS spending (both claims and nonclaims payments) from 2016 through 2019. Our prospective and retrospective methods yielded very similar results: Both found that MA payments were higher than FFS spending from 2016 through 2019. We note, however, that the retrospective and prospective methods likely would not yield similar results when estimating MA payments and FFS spending for 2020 because CMS's projection of FFS spending and MA bid and risk score projections were overestimated during the first year of the coronavirus pandemic. We will continue to update our retrospective comparison of MA payments relative to FFS spending as more recent data become available.

## Background

The Medicare Advantage (MA) program allows Medicare beneficiaries enrolled in both Part A and Part $B$ to receive benefits from private plans rather than from the traditional fee-for-service (FFS) program. The Commission strongly supports including private plans in the Medicare program because they allow beneficiaries to choose between FFS Medicare and the alternative delivery systems that private plans can provide. Unlike traditional FFS Medicare, MA plans typically have flexibility in payment methods, including the ability to negotiate with individual providers, use care-management techniques that fill potential gaps in care delivery, and provide incentives for beneficiaries to seek care from more efficient providers. By contrast, traditional FFS Medicare has lower administrative costs, but it often lacks incentives to coordinate care and is limited in its ability to make care delivery more efficient. ${ }^{1}$

For beneficiaries, the primary trade-off in choosing between MA and FFS is access to the additional benefits that plans provide versus an almost unlimited choice of providers available under FFS. By statute, MA plans are required to offer an out-of-pocket spending limit that is not available in FFS Medicare. MA plans can offer integrated Part D benefits, provide supplemental benefits not covered by Medicare, and reduce costsharing liability. However, MA plan enrollees can be restricted to using providers in a plan's network or can face higher cost sharing to access providers out of a plan's network. Because private plans and traditional FFS Medicare have structural aspects that appeal to different segments of the Medicare population, we favor providing a choice between private MA plans and FFS Medicare that does not unduly favor one program component over the other.

Each year, the Commission provides a status report on the MA program. To monitor program performance, we examine MA enrollment trends, plan availability for the coming year, and payments for MA plan enrollees relative to spending for FFS Medicare beneficiaries. We also provide updates on risk adjustment, risk coding practices, and the current state of quality in MA.

## Types of MA plans

Our analysis of the MA program uses the most recent data available, and we report our results by plan type.

The analysis does not include non-MA private plan options such as cost plans that may be available to some beneficiaries. The MA plan types are:

- Health maintenance organizations (HMOs) and local preferred provider organizations (PPOs)These plans have provider networks and, if they choose, can use tools such as selective contracting and utilization management to coordinate and manage care and control service use. They can choose individual counties to serve and can vary their premiums and benefits across counties. These two plan types are classified as coordinated care plans (CCPs).
- Regional PPOs-These plans are required to offer a uniform benefit package and premium across CMSdesignated regions made up of one or more states. Regional PPOs have more flexible provider network requirements than local PPOs. Regional PPOs are also classified as CCPs.
- Private FFS (PFFS) plans-These plans may or may not use provider networks, depending on where they operate, and generally do not manage care as efficiently as their HMO and PPO competitors. The Medicare Improvements for Patients and Providers Act of 2008 mandated that, in areas with two or more network MA plans, PFFS plans must have provider networks. As a result, PFFS plans are offered in only a small fraction of counties; by the end of 2022 , only about 43,000 beneficiaries were enrolled in PFFS plans.
- Medicare Savings Account (MSA) plans-MSA plans are a combination of a high-deductible plan and a medical savings account. The plan is paid the full MA benchmark and makes a deposit into the member's account that the member can use to help meet the plan deductible on Medicare services. In 2022, MSAs were available in 31 states with a total enrollment of about 11,000 beneficiaries. We do not include MSA plans in our analyses because their enrollment has been limited, beneficiaries dually eligible for Medicare and Medicaid are not eligible to enroll in MSA plans, and these plans do not bid on their enrollees' expected costs.

Two additional plan classifications cut across plan types: special needs plans (SNPs) and employer group plans. SNPs offer benefit packages tailored to specific
populations (beneficiaries who are dually eligible for Medicare and Medicaid, are institutionalized, or have certain chronic conditions). Each SNP must be an HMO or PPO plan. Employer group plans are available only to Medicare beneficiaries who are members of employer or union groups that contract with those plans. SNPs are included in our plan data, with the exception of plan availability figures because these plans are not available to all beneficiaries. Employer plans do not submit bids, so they are not included in our access analyses. In contrast to prior years, we estimate payments for employer group plans and include them in our overall comparison of MA payments relative to FFS spending. (See the Commission's March 2015 report to the Congress for more detailed information on employer plans.)

## How Medicare pays MA plans

In contrast to FFS Medicare's fixed rates per service paid to providers, Medicare pays MA plans a fixed rate for each enrolled beneficiary, which is the product of a base rate and a risk score. Risk scores adjust a plan's base rate to account for differences in expected beneficiary medical costs by increasing a plan's payment rate for beneficiaries who are likely to have higher medical expenses and vice versa. (See "How Medicare calculates risk scores," p. 329.)

A plan's base rate is determined by the MA plan's bid and the benchmark for the county in which the beneficiary resides. The bid is intended to represent the dollar amount that the plan estimates will cover the Part A and Part B benefit package for a beneficiary of average health. The benchmark is the maximum amount of Medicare payment set by law for an MA plan to provide Part A and Part B benefits. ${ }^{2}$ (Medicare also pays plans for providing the Part D drug benefit, but those payments are determined through the Part D bidding process, and not all MA plans include the Part D benefit.) Plans with higher quality ratings are rewarded with a higher benchmark. If a plan's normalized bid is above the normalized benchmark (after both have been adjusted to reflect a person of average risk), the plan's MA base payment rate is set at the benchmark and enrollees have to pay a premium (in addition to the usual Part B premium) equal to the difference. For 2023, almost 100 percent of plans bid below their benchmarks. If a plan's bid is below the benchmark, its payment rate is its bid
plus a share of the difference between the plan's bid and the benchmark (as low as 50 percent but typically either 65 percent or 70 percent, depending on a plan's quality ratings). For this computation, the comparison is between an individual plan's actual bid for its expected enrolled population and a planspecific risk-adjusted average benchmark, weighted by the plan's projected enrollment from counties in its service area. The beneficiary pays no additional premium to the plan for Part A and Part B benefits (but continues to be responsible for paying the Medicare Part B premium and may pay premiums to the plan for additional benefits). The added payment based on the difference between the bid and the benchmark is referred to as the rebate. Plans must use the rebate to provide additional benefits to enrollees in the form of lower cost sharing, lower premiums, or supplemental benefits. Plans also devote some of the rebate to their administrative costs and profit. Plans can also choose to include additional supplemental benefits that are not financed by the rebate in their benefit packages and charge premiums to cover those additional benefits. ${ }^{3}$ (A more detailed description of the MA program payment system can be found in our Payment Basics series at https://www.medpac.gov/document-type/paymentbasic/.)

## How Medicare calculates MA benchmarks

Under the Affordable Care Act of 2010 (ACA), each county's benchmark, excluding quality bonuses, equals a certain share (ranging from 95 percent to 115 percent, subject to caps) of the projected average per capita FFS Medicare spending for the county's beneficiaries. ${ }^{4}$ Each county's benchmark is determined by organizing the counties into quartiles based on their FFS spending. Low-FFS-spending counties have benchmarks higher than their county's FFS spending level to help attract plans, and high-FFS-spending counties have benchmarks lower than FFS to generate Medicare savings, given the history of very low bids in such counties that reflect high FFS service use. Counties are assigned to quartiles based on average FFS spending; the highest-spending quartile of counties has benchmarks set at 95 percent of local FFS spending. The next-highest spending quartile of counties has benchmarks set at 100 percent of FFS spending, followed by the third-highest quartile set at 107.5 percent of FFS spending. The lowest-spending quartile has benchmarks set at 115 percent of local

FFS spending. U.S. territories are treated like counties in this lowest-spending quartile. Counties that move among quartiles from year to year receive a blended quartile factor. For example, a county that moved from the 100 percent quartile in 2022 to the 107.5 percent quartile in 2022 would have had a blended rate of 103.75 percent in 2023.

By statute, plans awarded quality bonuses have benchmarks that are 5 percent higher than the standard county benchmarks (subject to benchmark growth caps); in certain counties, plans can receive a double bonus, and the benchmarks for plans awarded quality bonuses are 10 percent higher than the standard benchmarks. ${ }^{5}$ Unlike nearly all of Medicare's FFS quality incentive programs, these quality bonuses are not budget neutral but are instead financed by added program dollars. The Commission's original conception of a quality incentive program for MA plans was a system that would be budget neutral and financed with a small share of plan payments (Medicare Payment Advisory Commission 2012b, Medicare Payment Advisory Commission 2004). A budgetneutral system is consistent with the Commission's principle of providing a level playing field between private MA plans and FFS Medicare and reflects the Commission's recommendation to the Congress in June 2020 (Medicare Payment Advisory Commission 2020, Medicare Payment Advisory Commission 2019a).

## How Medicare calculates risk scores

Risk scores are beneficiary-level index values that indicate the expected Medicare costs for an enrollee relative to the national average FFS beneficiary. How well Medicare's payments to MA plans match their enrollees' costliness depends in large part on how well the risk scores predict the expected costs for the plans' enrollees.

CMS calculates risk scores with the CMS hierarchical condition category (CMS-HCC) risk-adjustment model, which uses demographic information (e.g., age, sex, Medicaid enrollment, and disability status) and certain diagnoses grouped into HCCs to calculate a risk score for each enrollee. HCCs are medical conditions or groups of related conditions with similar treatment costs. Some conditions have more than one HCC, which differ by severity of the condition and are arrayed in a hierarchy. For example, the CMS-

HCC model has three HCCs for diabetes: without complications, with chronic complications, and with acute complications. The "hierarchical" aspect of HCCs means that if a beneficiary's diagnoses map to more than one HCC in a condition hierarchy, CMS applies only the HCC that has the largest effect on the beneficiary's risk score-the highest-severity HCC.

CMS tracks beneficiary demographic information, but MA plans submit diagnostic information to CMS through encounter records, which contain basic information about each Medicare-covered encounter an enrollee has with a health care provider and each Medicare-covered item provided to the enrollee. ${ }^{6}$ Diagnostic data collected from encounters in one calendar year are used to predict Medicare costs for the following calendar year.

CMS designed this risk-adjustment model to maximize its ability to predict annual medical expenditures for Medicare beneficiaries while also ensuring that the model's diagnostic categories were clinically meaningful and specific enough to minimize opportunities for gaming or discretionary coding (Pope et al. 2004). CMS has two requirements to ensure the validity and reliability of the diagnostic data used in an enrollee's risk score: Diagnoses must (1) appear on a claim from a hospital inpatient stay, a hospital outpatient visit, or a face-to-face visit with a physician or other health care professional; and (2) be supported by evidence in the patient's medical record. ${ }^{7}$ Diagnoses resulting from telehealth services meet the face-toface requirement when the services are provided using interactive audio and video telecommunication that enables real-time communication with the beneficiary. To ensure that diagnoses are supported by evidence in the patient's medical record, CMS conducts riskadjustment data validation (RADV) audits. RADV audits have been limited so far, but the available results show significant issues with medical record support for riskadjustment diagnoses (see section on "Risk-adjustment data validation" later in this chapter).

## Commission recommendations that have not been implemented would fix many flaws in MA payment policies

When risk-based payments for private plans were first incorporated into the Medicare program, policymakers expected that they would help to reduce Medicare

# Commission recommendations for changes to MA payment policy that have not been implemented 

## Recommendation

## Fully account for MA coding intensity-March 2016

The Congress should direct the Secretary to develop a risk-adjustment model that uses two years of FFS and MA diagnostic data and does not include diagnoses from health risk assessments from either FFS or MA, and then apply a coding adjustment that fully accounts for the remaining differences in coding between FFS Medicare and MA plans.

Improve encounter data accuracy and completeness-June 2019
The Congress should direct the Secretary to establish thresholds for the completeness and accuracy of MA encounter data and rigorously evaluate MA organizations' submitted data and provide robust feedback; concurrently apply a payment withhold and provide refunds to MA organizations that meet thresholds; and institute a mechanism for direct submission of provider claims to Medicare administrative contractors as a voluntary option for all MA organizations that prefer this method starting in 2024, for MA organizations that fail to meet thresholds, or for all MA organizations if program-wide thresholds are not achieved.

## Replace the quality bonus program-June $2020^{a}$

The Congress should replace the current MA quality bonus program with a new MA value incentive program that scores a small set of population-based measures, evaluates quality at the local market level, uses a peer-grouping mechanism to account for differences in enrollees' social risk factors, establishes a system for distributing rewards with no "cliff" effects, and distributes plan-financed rewards and penalties at a local market level.

## Establish more equitable benchmarks-June $2027^{\text {b }}$

The Congress should replace the current MA benchmark policy with a new MA benchmark policy that applies a relatively equal blend of per capita local area FFS spending with price-standardized per capita national FFS spending; a rebate of at least 75 percent; a discount rate of at least 2 percent; and the Commission's prior MA benchmark recommendationsusing geographic markets as payment areas, using the FFS population with both Part A and Part B in benchmarks, and eliminating the current pre-Affordable Care Act cap on benchmarks.

[^23]spending. Indeed, under the original incorporation of private plans in Medicare in 1985, payments to private plans were set at 95 percent of FFS payments. ${ }^{8}$ Without accounting for MA diagnostic coding intensity or favorable selection, MA plans continue to capitalize on their administrative flexibility and reduce their growth in spending relative to the projected FFS spending. For

2023, we estimate that the average plan will provide the Medicare Part A and Part B benefits for 17 percent less than FFS Medicare would spend for those enrollees, and nearly all plans will provide basic Medicare benefits for less than the cost of FFS Medicare (before accounting for MA coding intensity and favorable selection).

However, the benefits from these cost reductions are shared exclusively by the companies sponsoring MA plans and by MA enrollees, in the form of extra benefits. In a time of increasing financial stress for Medicare and its beneficiaries, the taxpayers and beneficiaries who fund the MA program (including those in FFS Medicare, who help finance MA through their Part B premiums) do not realize any savings from MA plan efficiencies. Instead, Medicare pays MA plans 6 percent more than it would spend if enrollees were covered under FFS Medicare, a program that already has inflated spending levels due to the volume-inducing incentives of FFS reimbursement, the widespread use of supplemental insurance that insulates beneficiaries from the financial impact of their service utilization, and inappropriate spending owing to fraud and waste. In fact, due to policies the Commission believes to be deeply flawed, private plans have never been paid less than FFS Medicare in aggregate.

In particular, the Commission has found that CMS's coding intensity adjustment is inadequate to address inflated payments to MA plans. At the same time, the quality bonus program boosts plan payments for nearly all enrollees but does not provide beneficiaries with the necessary information to evaluate local quality. Further, plan benchmarks are set so high that the Medicare program (rather than plans) subsidizes extra benefits for MA enrollees. Arguably, the extra benefits funded by payments in excess of what Medicare would have spent under FFS fill gaps in the Medicare benefit by adding coverage for services that are not included in traditional Medicare. ${ }^{9}$ The generosity of the additional benefits is appealing to beneficiaries, particularly for beneficiaries who are unable to afford a Medigap policy that would reduce cost sharing in FFS. But these policies undermine the goal of plans competing to improve quality and reduce health care costs, and the policies potentially generate waste from beneficiary premiums and taxpayer funds. Moreover, the Commission has found that plan-submitted data about beneficiaries' health care encounters are incomplete. If these data were complete and accurate, they could be used to identify MA plan efficiencies, improve quality measurement, and provide more robust oversight of the MA program.

The Commission remains committed to including private plans in the Medicare program and allowing
beneficiaries to choose among Medicare coverage options, including the alternative delivery systems that private plans can provide. But the rapid growth of MA enrollment and spending elevates the urgency and need for a major overhaul of MA policies. Medicare should not continue to overpay MA plans; in fact, as MA enrollment continues to grow, higher payments to plans will further worsen Medicare's fiscal sustainability. Overpaying MA plans also creates inequities among beneficiaries since beneficiaries in FFS Medicare help finance the overpayment that plans use to provide extra benefits for their enrollees (extra benefits that FFS beneficiaries do not enjoy). In addition, overpaying MA plans undermines incentives for efficiency in the delivery of care. To encourage efficiency, MA plans need to face appropriate financial pressure similar to what the Commission generally recommends for providers in the FFS program. Reducing payments to plans is therefore imperative. Past experience with reductions in MA payments under the ACA has demonstrated that such cuts can be enacted with little impact on plan participation and beneficiary enrollment.

Over the past few years, the Commission has developed four recommendations (some that incorporate and update prior recommendations) that would eliminate or lessen the effects of the most significant flaws in the MA program and reduce payments to MA plans. Table 11-1 summarizes the Commission's standing recommendations to (1) account for continued coding differences between MA and FFS and address those differences in a complete and equitable way (Medicare Payment Advisory Commission 2016); (2) ensure the completeness and accuracy of encounter data to improve the MA payment system, serve as a source of quality data, and facilitate comparisons with FFS Medicare (Medicare Payment Advisory Commission 2019a); (3) replace the quality bonus program with a market area-based, plan-financed reward program (Medicare Payment Advisory Commission 2020); and (4) establish more equitable MA benchmarks for the Medicare program (Medicare Payment Advisory Commission 2021b). Through reforms to the MA payment system, the Commission aims to improve the program for the beneficiaries it serves and to harness plan efficiency to strengthen Medicare's long-term financial sustainability.


Note: MA (Medicare Advantage), PFFS (private fee-for-service), PPO (preferred provider organization), HMO (health maintenance organization). Beneficiaries must have both Part A and Part B coverage to enroll in a Medicare Advantage plan; therefore, beneficiaries who have Part A only or Part B only are not included in the denominator of eligible Medicare beneficiaries.

Source: MedPAC analysis of CMS enrollment files, July 2010-2022.

## Increasingly robust MA enrollment, plan availability, and rebates

Substantial growth in MA plan enrollment, availability, and rebates indicates an increasingly robust MA program. As of 2022, almost half of eligible Medicare beneficiaries are now in MA plans. For 2023, the average beneficiary has access to 41 plans sponsored by 8 organizations, and rebates that finance extra benefits are the highest in the program's history.

## In 2022, MA plan enrollment grew by 8 percent; 49 percent of eligible Medicare beneficiaries are enrolled in MA plans

Between July 2021 and July 2022, enrollment in MA plans grew by 8 percent-or 2.3 million enrollees-to 29.1 million enrollees, while the total MA-eligible population (beneficiaries with both Part A and Part B coverage) grew only 2 percent and FFS enrollment
declined about 4 percent. The growth in 2022 follows three consecutive years of 10 percent growth in MA enrollment. Between 2022 and 2023, MA enrollment rose from 46 percent to 49 percent of eligible Medicare beneficiaries (Figure 11-1). ${ }^{10}$ Enrollment in MA has more than doubled since 2013. MA has increasingly become attractive to beneficiaries because plans provide cost-sharing reductions and a cap on out-of-pocket expenses at little or no premium. Many beneficiaries with care needs that are met within plan networks will likely have lower financial liability (premiums and cost sharing) compared with beneficiaries who stay in FFS and purchase the most comprehensive supplemental coverage. ${ }^{11}$ In addition, while some MA enrollees with high care needs experience greater cost liabilities compared with beneficiaries in FFS (e.g., greater cost sharing for in-network and out-of-network services compared with the premiums for Medigap supplemental coverage), most of these MA enrollees

|  | Enrollment (in millions) |  | Percent change in enrollment (2021-2022) |
| :---: | :---: | :---: | :---: |
|  | July 2021 | July 2022 |  |
| Total MA-eligible beneficiaries | 58.1 | 59.2 | 2\% |
| Total MA | 26.9 | 29.1 | 8 |
| Plan type |  |  |  |
| HMO | 16.2 | 17.1 | 6 |
| Local PPO | 9.7 | 17.2 | 16 |
| Regional PPO | 0.9 | 0.7 | -23 |
| PFFS | 0.1 | <0.05 | -23 |
| Restricted availability plans included in totals above |  |  |  |
| SNPs* | 4.1 | 4.9 | 20 |
| Employer group* | 5.0 | 5.2 | 4 |

Note: MA (Medicare Advantage), HMO (health maintenance organization), PPO (preferred provider organization), PFFS (private fee-for-service), SNP (special needs plan). "Total MA-eligible beneficiaries" excludes the 8 percent of Medicare beneficiaries who are not eligible to enroll in an MA plan because they do not have both Part A and Part B coverage. The sum of column components may not equal the stated total due to rounding.
*SNPs and employer group plans have restricted availability. Their enrollment is included in the statistics by plan type and location. We present them separately to provide a more complete picture of the MA program.

Source: MedPAC analysis of CMS enrollment files.
would likely have difficulty switching to FFS coverage because they could be denied a Medigap policy due to a preexisting condition. ${ }^{12}$

Among plan types, recent growth in MA enrollment has been disproportionately higher among local PPOs. Although HMOs continued to enroll the most beneficiaries ( 17 million) in 2022, enrollment in local PPOs grew faster ( 16 percent) than in HMOs ( 6 percent) (Table 11-2). In addition, between 2021 and 2022, enrollment in local PPOs grew by 1.5 million, accounting for two-thirds of the overall increase in MA enrollment. As MA rebates have risen, the resulting increase in extra benefits provided by local PPOs combined with less restrictive networks-relative to HMOs-has likely contributed to the recent enrollment increase among local PPOs. ${ }^{13}$ Much of the increase in HMO enrollment resulted from enrollment in SNPs. In 2022, SNP enrollment grew by 20 percent. HMOs
accounted for nearly two-thirds of the SNP enrollment growth (data not shown). While enrollment in nonSNP HMOs grew by 3 percent, enrollment in SNP HMOs grew by 18 percent (data not shown). Thus, in 2022, Medicare beneficiaries with special needs (e.g., dual-eligible for Medicaid) are increasingly enrolled in HMOs, and those without qualifying special needs are increasingly enrolled in PPOs (data not shown).

Enrollment patterns differ in urban and rural areas. The majority ( 51 percent) of eligible urban beneficiaries are enrolled in MA compared with 40 percent of eligible beneficiaries residing in rural counties. ${ }^{14}$ However, the growth of MA plans in rural areas has been much faster in recent years. In 2022, MA enrollment in rural areas grew by 13 percent (compared with 7 percent growth in urban areas). The predominant plan type often differs between urban and rural areas. In 2022, 40 percent of rural MA enrollees were in HMO plans compared with

| $\begin{gathered} \text { TABLE } \\ 11-3 \end{gathered}$ | MA enrollment share by top 3 parent organizations did not change nationally but declined at the county level, July 2018-2022 |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | Share of enrollment |  |  | Change in share |  |
| Top 3 parent organizations, by type of MA plan | 2018 | 2021 | 2022 | 2018-2022 | 2021-2022 |
| All MA plans: Top 3 (national) | 51\% | 56\% | 56\% | +5\% | 0\% |
| UnitedHealth Group Inc. | 26 | 27 | 28 | +2 | +1 |
| Humana Inc. | 17 | 18 | 18 | +1 | -1 |
| CVS Health Corporation | 8 | 11 | 11 | +3 | 0 |
| Top open enrollment plans |  |  |  |  |  |
| Top 3 nationwide | 51 | 55 | 54 | +3 | -1 |
| UnitedHealth Group Inc. | 23 | 24 | 24 | +1 | 0 |
| Humana Inc. | 21 | 21 | 20 | -1 | -1 |
| CVS Health Corporation | 8 | 9 | 10 | +2 | 0 |
| County level (weighted average)* |  |  |  |  |  |
| Top organization | 48 | 44 | 43 | -5 | -1 |
| Top 2 organizations | 72 | 68 | 67 | -5 | -1 |
| Top 3 organizations | 85 | 82 | 81 | -4 | -1 |

Note: MA (Medicare Advantage). Includes only Medicare Advantage plans (coordinated care, private fee-for-service, and medical savings account plans). Excluded are cost-reimbursed plans and Medicare-Medicaid demonstration plans. Open enrollment plans exclude special needs plans and employer group plans, which have restricted availability. We present market shares of the top 3 open enrollment plans nationwide to help demonstrate the extent of market concentration. Market shares of the top 3 open enrollment plans at the county level demonstrate the extent of market concentration locally. The top 3 organizations in each county typically differ from the top 3 organizations nationally. Totals, differences, and market shares may not sum due to rounding.
*County-level shares of MA enrollment reflect the beneficiary-weighted average of the top organizations in each county.
Source: MedPAC analysis of CMS July 2018-2022 enrollment data.
about 62 percent of urban enrollees. By contrast, 54 percent of rural enrollees were in local PPOs compared with 36 percent of urban enrollees.

In many areas of the country, a majority of eligible Medicare beneficiaries are now enrolled in MA. In 26 states (including California, Florida, Michigan, New York, Pennsylvania, and Texas) and Puerto Rico, more than half of the eligible population was enrolled in an MA plan in 2022. In some metropolitan areas (e.g., Grand Rapids, MI; Greensboro, NC; El Paso, TX; Miami, FL; Pittsburgh, PA; Rochester, NY), more than 70 percent of eligible Medicare beneficiaries are enrolled in MA plans. MA benchmarks are computed at the
county level, and in an increasing number of counties, most Medicare beneficiaries are enrolled in MA plans. In all counties in Puerto Rico and an additional 863 counties across 38 states, more than half of eligible Medicare beneficiaries were enrolled in MA plans in 2022. The increasing share of MA enrollees in some geographic areas raises questions about whether the local FFS population should continue to be the basis for MA payment benchmarks. Benchmarks can become biased if the FFS population is not representative of Medicare beneficiaries overall. When this disparity arises, the risk-adjustment model is less likely to capture differences between the local FFS and MA populations. For example, in some counties, a
disproportionate number of FFS beneficiaries have comprehensive supplemental coverage, which is generally unavailable in MA and induces higher demand for health care services.

## The MA market is heavily concentrated, but slightly less so in 2022

Between 2021 and 2022, the national MA market continued to be concentrated, but-contrary to prior years-the largest organizations did not increase their combined market share. The top three organizations in 2022 had 56 percent of total MA enrollment, 5 percentage points higher relative to 2018 but unchanged from 2021 (Table 11-3). ${ }^{15}$ Among open enrollment plans (plans available to all Medicare beneficiaries, thus excluding SNPs and employer plans), the top three organizations nationwide had 54 percent of enrollment in 2022, a decrease from 55 percent in 2021. In contrast, the national market for dual-eligible SNPs (D-SNPs) has been getting more concentrated; the largest three organizations nationally had 54 percent of total enrollment in DSNPs, an increase from 51 percent in 2021 (data not shown). ${ }^{16}$

Another way of looking at the MA program's market structure is to examine competition at the county level (Table 11-3). Excluding employer plans and SNPs, in 2022, enrollment in the largest organization in each county accounted for 43 percent, on average, of all MA enrollment in the county (down from 44 percent in 2021). Enrollment in the top three organizations in each county accounted for 81 percent, on average, of all MA enrollment, which was down from 82 percent in 2021 and 85 percent in 2018. Similarly, under the Herfindahl-Hirschman Index (a common measure of market concentration), the share of MA enrollees living in counties with highly concentrated markets between 2021 and 2022 declined from 66 percent to 61 percent. ${ }^{17}$ Thus, although local MA markets tend to be highly concentrated, the level of concentration has modestly trended downward in recent years. This trend suggests that insurers have entered new markets and are steadily gaining market share in areas that have historically been very concentrated. In addition, as illustrated in the next section, estimates in 2023 indicate that the average beneficiary will have access to many MA plans offered by a substantial number of organizations.

## Access to MA plans remains high in 2023

Every year, we assess plan availability and projected enrollment for the coming year based on the bid data that plans submit to CMS. We find that access to MA plans remains high in 2023, with most Medicare beneficiaries having access to many plans. Some measures of availability have improved for 2023. While almost all beneficiaries have had access to some type of MA plan since 2006, local CCPs have become more widely available in recent years (Table 11-4, p. 336). In 2023, 99 percent of Medicare beneficiaries have an HMO or local PPO plan (both are considered local CCPs) operating in their county of residence, nearly the same as in $2022 .{ }^{18}$ Regional PPOs are available to 74 percent of eligible beneficiaries, similar to 2022. PFFS plans are available to 29 percent of beneficiaries, down from 35 percent in 2022.

The availability of SNPs continues to be high across the types of special needs populations served (Table 11-4, p. 336). In 2023, 94 percent of beneficiaries reside in areas where SNPs serve beneficiaries who are dually eligible for Medicare and Medicaid (nearly the same as in 2022), 66 percent live where SNPs serve beneficiaries with chronic conditions (up from 59 percent in 2022), and 77 percent live where SNPs serve institutionalized beneficiaries (up from 74 percent in 2022). Overall, 99 percent of beneficiaries reside in counties served by at least one type of SNP (data not shown).

In 2023, 99 percent of eligible Medicare beneficiaries (compared with 98 percent in 2022) have access to at least one open enrollment MA plan (i.e., excluding SNPs and employer group plans) that includes Part D drug coverage and charges no Part C or Part D premium (enrollees still pay the Medicare Part B premium) (Table $11-4$, p. 336). ${ }^{19}$ About 74 percent of MA enrollment is projected to be in these zero-premium plans (data not shown). Also in 2023, 99 percent of beneficiaries (compared with 97 percent in 2022) have access to plans that offer some reduction in the Part B premium, but only 9 percent of 2023 enrollment was projected to be in these premium-reduction plans (data not shown).$^{20}$ Given the increasing number of plan choices, beneficiaries may find it difficult to discern differences in plan benefit packages in order to make an optimal choice.

In most counties, beneficiaries have access to a large number of MA plans. In 2023, the average number of

| $\begin{gathered} \text { TABLE } \\ 11-4 \end{gathered}$ | Access to Medicare Advantage plans remains high |  |  |  |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
| Type of plan | 2019 | 2020 | 2021 | 2022 | 2023 |
| Share of beneficiaries with access to at least one plan |  |  |  |  |  |
| Any MA plan | 99\% | 99\% | 99\% | 99\% | >99.5\% |
| Local CCP | 97 | 98 | 98 | 99 | 99 |
| Regional PPO | 74 | 73 | 72 | 74 | 74 |
| PFFS | 38 | 36 | 34 | 35 | 29 |
| Special needs plans |  |  |  |  |  |
| Dual eligible | 89 | 90 | 92 | 94 | 94 |
| Chronic condition | 47 | 52 | 57 | 59 | 66 |
| Institutional | 63 | 67 | 72 | 74 | 77 |
| Zero-premium plan with drug coverage | 90 | 93 | 96 | 98 | 99 |
| Average number of choices |  |  |  |  |  |
| County weighted | 13 | 15 | 18 | 22 | 26 |
| Beneficiary weighted | 23 | 27 | 32 | 36 | 41 |

Note: MA (Medicare Advantage), CCP (coordinated care plan), PPO (preferred provider organization), PFFS (private fee-for-service), SNP (special needs plan). "Local CCPs" includes HMO and local PPO plans. These figures exclude employer-only plans. Special needs plans are included in the three special needs plan rows but excluded from all other rows. For 2018 through 2021, "share of Medicare beneficiaries" includes beneficiaries who do not have both Part A and Part B coverage (i.e., includes all Medicare beneficiaries). For 2022, the share of Medicare beneficiaries only includes beneficiaries with both Part A and Part B coverage (i.e., includes MA-eligible beneficiaries). A "zero-premium plan with drug coverage" includes Part D coverage and has no premium beyond the Part B premium (including no Part D premium). "County weighted" means that each county is weighted the same and the measure is the average number of choices per county. "Beneficiary weighted" means that each county is weighted by the number of beneficiaries in the county.

Source: MedPAC analysis of CMS bid and enrollment data
plans available in a county increased to 26 plans (from 22 plans in 2022) (Table 11-4). Plan availability can also be evaluated by number of plan choices available to the average beneficiary. Under that calculation, the average beneficiary in 2023 has 41 available plans, an increase from 36 plans in 2022, and can choose from plans sponsored by 8 organizations (organization data not shown); 98 percent of beneficiaries have access to MA plans sponsored by at least 3 different organizations, and 95 percent of beneficiaries can choose from plans sponsored by at least 4 different organizations. ${ }^{21}$ Beneficiaries in 176 counties can choose from at least 20 plans offered by at least 10 distinct organizations. These counties include the major markets of Atlanta,

Chicago, Cincinnati, Cleveland, Dallas, Houston, Los Angeles, Miami, New York City, and Phoenix. At the other end of the spectrum, 84 counties, representing less than half of 1 percent of beneficiaries, have no MA plans available (Medicare MSA plans and SNPs are not included in general availability measures). ${ }^{22}$

## MA rebates in 2023 are a record high \$196 per enrollee per month

As discussed above, a plan's base payment rate is determined by comparing the plan's bid (the dollar amount the plan estimates it needs in order to provide the Part A and Part B benefit package to a beneficiary of average health status) and the benchmark (the


Note: MA (Medicare Advantage). Employer group plans, special needs plans, and plans that do not offer Part D coverage are not included. The plan rebate is the per beneficiary per month amount that the plan offers as premium-free extra benefits. Rebate dollar amounts are based on the national average and reflect plan risk scores in plan bids but do not reflect payment adjustments for sequestration.

Source: MedPAC analysis of data from CMS on plan bids.
applicable maximum amount set by Medicare for the county). If a plan's bid is below the benchmark, its payment rate is its bid plus a share of the difference between the plan's bid and the benchmark. This share (typically 65 percent) is somewhat dependent on a plan's quality rating and is referred to as the "rebate." Thus, rebates can increase through relative benchmark increases, relative bid decreases, and changes in a plan's quality rating. ${ }^{23}$ Plans must use the rebate to provide extra benefits-such as lower cost sharing, lower premiums, or supplemental benefits not covered by Part A or Part B (such as vision, hearing, dental, and fitness benefits). Plans also use some of the rebate to cover their administrative costs and as profit. Although plans are required to submit encounter data for supplemental benefits, CMS does not have reliable information about enrollees' actual use of these benefits. ${ }^{24}$

For 2023, rebates for MA plans (excluding employer plans and SNPs) average \$196 per enrollee per month (more than $\$ 2,350$ annually per enrollee) and-for the seventh consecutive year-are the highest in the program's history (Figure 11-2). ${ }^{25}$ These rebates account for 17 percent of plan payments, an increase from 15 percent in 2022. The average total rebate for 2023 is 19 percent higher than in 2022 ( $\$ 32$ higher per enrollee per month). The average MA rebate has more than doubled in the past five years, since 2018.

We assess plan rebates based on projected rebate allocations included in plans' bids, but we have no data about enrollees' actual use of extra benefits. In 2023, the share of plan rebates allocated toward cost-sharing reductions is projected to fall (Table 11-5, p. 338). Plans project that $\$ 76$ per enrollee per month in rebates (39 percent of rebate dollars) will go toward reductions in cost sharing for Medicare services, 8 percent higher

# MA plans project that over a quarter of rebates will be allocated to non-Medicare supplemental benefits in 2023 

|  | Rebate (per member per month) |  | 2023 percent change | Share of total rebate |  |
| :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2022 | 2023 |  | 2022 | 2023 |
| Total | \$164 | \$196 | 19\% | 100\% | 100\% |
| Extra benefit type |  |  |  |  |  |
| Cost sharing | 70 | 76 | 8 | 43 | 39 |
| Non-Medicare supplemental | 36 | 50 | 39 | 22 | 26 |
| Part D supplemental | 30 | 38 | 27 | 18 | 19 |
| Part D premium | 25 | 27 | 7 | 15 | 14 |
| Part B premium | 4 | 5 | 49 | 2 | 3 |

Note: MA (Medicare Advantage). Employer group plans, special needs plans, and plans that do not offer Part D coverage are not included. Amounts for cost sharing and non-Medicare supplemental benefits include plan costs for administration and profit. Cost sharing amounts include plan projections of their liability for the beneficiary out-of-pocket expenses cap. Rebate dollar amounts are based on the national average and reflect plan risk scores in plan bids but do not reflect payment adjustments for sequestration. Totals, differences, and rebate shares may not sum due to rounding.

Source: MedPAC analysis of data from CMS on plan bids
relative to 2022 but a drop in the share of rebate dollars ( 43 percent in 2022). ${ }^{26,27}$ The rate of growth in the amount of rebates allocated to cost-sharing reductions is modestly higher than CMS's projected rate of growth for all Part A and Part B expenditures (6 percent; data not shown), suggesting that many MA plans have opted not to devote additional rebate dollars beyond medical inflation to this benefit. One reason is that doing so could induce greater service use among enrollees, as occurs among FFS beneficiaries with firstdollar Medigap coverage (Medicare Payment Advisory Commission 2012a). ${ }^{28}$ Instead, plans report allocating an increasing share of plan rebates to non-Medicarecovered supplemental benefits.

In 2023, plans project that 26 percent of rebates (averaging \$50 per enrollee per month) will be used for non-Medicare-covered supplemental benefits. ${ }^{29}$ The Commission previously reported that while these benefits often include coverage for vision, hearing, or dental services, the non-Medicare supplemental benefits that plans most commonly offer appear to be tailored toward relatively healthy
beneficiaries rather than populations that have the greatest social or medical needs (Medicare Payment Advisory Commission 2021b). ${ }^{30}$ The lack of information about enrollees' use of supplemental benefits makes it difficult to determine whether the benefits improve beneficiaries' health. To the extent that plans' supplemental benefits are intended to address social determinants of health, it is not clear whether delivering those benefits through MA plans is more effective than direct financial assistance to beneficiaries would be.

Other uses of rebate dollars are for Part D supplemental benefits ( 19 percent of projected rebates), reductions in Part D premiums ( 14 percent of projected rebates), and reductions in Part B premiums (3 percent of projected rebates). MA plans cannot allocate administrative expenses or margin to Part B premium reductions. ${ }^{31}$

## MA margins

The continued growth in MA enrollment, the substantial number of plans offered by several
organizations, and plans' ability to provide generous extra benefits point to continued strong financial health in the MA sector. We also analyze the margins that MA plans report in their bids as a potential indicator of plans' financial health. While these margins offer some insight, the data are limited in several ways. For example, the data do not include plans' expected costs and revenues for providing Part D (which nearly all MA plans offer) and do not include employer plans ( 18 percent of MA enrollment in 2021). ${ }^{32}$ In addition, the increasing ownership of plans and providers under the same organization may overestimate plan medical expenses and underestimate plan margins. The degree to which provider revenues are shared with plans under these arrangements is unclear, but financial data suggest a substantial shifting of revenues and expenses for at least one large health plan (Frank and Milhaupt 2022). Moreover, the parent organizations of many MA plans have multiple lines of business, and understanding how MA revenues factor into their financial health is difficult. For example, MA gross profits tend to be higher than other lines of health insurance businesses (McDermott et al. 2020). Even if a parent organization has the same profit margin across its various insurance lines of business, the higher gross profits in MA may provide a financial advantage if the organization's fixed costs (e.g., rent, utilities, information technology infrastructure, and base salaries and benefits) are similar across the entire organization. Thus, MA margins may not be comparable with the margins of other health insurance lines of business within the same organization.

While analyses of MA margins are not indicative of the financial health of the MA sector, they can still be used as a partial indicator. Annual changes in plan-reported MA margins have been larger during the coronavirus public health emergency (PHE). From 2019 to 2020, plan-reported margins increased from 4.5 percent to 6.5 percent. Using the most recent data available, in 2021, MA plans reported margins that averaged 2.2 percent. ${ }^{33,34}$ The increase in reported MA margins in 2020 was likely due to CMS overprojecting FFS spending in that year (due to the PHE), thus inflating MA benchmarks and plan revenues while plans incurred lower-than-expected medical expenses. The decrease in reported MA margins in 2021 likely coincides with lower-than-expected MA revenues from MA risk scores, which were based on beneficiary
diagnoses in 2020. For 2023, plan bids indicate that plans' projected margins will be much closer to prepandemic levels (4.6 percent).

Margins vary by a plan's tax status and whether a plan is a SNP. In the 2021 data, nonprofit plans reported a margin of -0.9 percent; for-profit entities reported a pretax margin of 2.8 percent, both decreases relative to 2020. ${ }^{35}$ In 2021, all categories of SNPs had overall positive margins. D-SNPs, for beneficiaries dually eligible for Medicare and Medicaid benefits, had margins of 6.4 percent. SNPs for enrollees with certain chronic conditions (C-SNPs) had margins of 4.6 percent. Institutional SNPs had margins of 4.0 percent. The 2021 profit margin among nonprofit D-SNPs was 1.2 percent.

## Plans bid at record low levels in 2023, but payments remain above FFS spending

The growth and availability of MA plans has occurred without overall savings to the Medicare program. In 2023, MA plan payments (including rebates that finance extra benefits) remained above what Medicare would have paid for similar beneficiaries in FFS, continuing the trend of higher levels of payment throughout the history of Medicare managed care (see the mandated report section on Medicare payments to MA plans, pp. 342-351). Payments to MA plans are determined using a plan's bid-which is intended to represent the dollar amount that the plan estimates it will need to cover the Medicare benefit package for a beneficiaryand the benchmark for the county in which the beneficiary resides. The benchmark is based on CMS's projection of local FFS spending and is the maximum Medicare payment amount set by law for an MA plan to provide Part A and Part B benefits for beneficiaries in that county.

Before accounting for differences in diagnostic coding practices between MA and FFS, MA benchmarks (including quality bonuses) in 2023 are estimated to average 109 percent of projected FFS spending (Table 11-6, p. 340), up 1 percentage point from $2022 .{ }^{36}$ In 2023, overall plan bids average an estimated 83 percent of FFS spending, a record low, down from 85 percent in 2022 (2022 data not shown). ${ }^{37}$ When a plan bids below the benchmark, its payment rate is its bid plus a share of the difference between its bid and the benchmark. Overall, we estimate that-without any adjustments for

## Overall plan bids at record low levels in 2023, but plan payments remain above FFS spending due to coding

| Plan type | Share of FFS spending in 2023 |  |  |
| :---: | :---: | :---: | :---: |
|  | Benchmarks | Bids | Payments |
| All MA plans (after coding estimate) | 114\% | 87\% | 106\%* |
| All MA plans (before coding estimate) | 109 | 83 | 101* |
| HMO | 109 | 82 | 100 |
| Local PPO | 110 | 85 | 102 |
| Regional PPO | 95 | 82 | 91 |
| PFFS | 110 | 99 | 106 |
| SNPs (included in totals above) | 108 | 86 | 101 |

Note: FFS (fee-for-service), MA (Medicare Advantage), HMO (health maintenance organization), PPO (preferred provider organization), PFFS (private fee-for-service), SNP (special needs plan). Benchmarks are the maximum Medicare program payments for MA plans and incorporate plan quality bonuses. We estimate FFS spending by county using the 2023 MA rate book. We removed spending related to the remaining double payment for indirect medical education payments made to teaching hospitals. To account for our most recent coding estimate of 4.9 percent, we estimated overall benchmarks, bids, and payments if coding differences between MA and FFS were fully reflected (i.e., if the risk-adjusted differences between MA and FFS did not include coding differences). We assume, conservatively, that the coding differences for 2023 are the same as for 2021 (the most recent year of data available). We did not estimate coding differences between MA and FFS by plan type. Although MA enrollees must be enrolled in both Part A and Part B, the FFS spending denominator used in the table includes all Part A and Part B spending. MA benchmarks, bids, and payments assume this level of FFS spending. Using data from 2017 to 2019 and adjusting spending for risk scores and beneficiaries with Medicare as a secondary payer, the Commission estimated that FFS spending for enrollees with both Part A and Part B was about 1 percent higher than spending for all FFS enrollees. All numbers in this table have been risk adjusted and reflect quality bonuses, but they have not been adjusted for favorable selection of beneficiaries in MA plans, and only aggregate numbers for all plans have been adjusted for coding intensity differences between MA and FFS.
*Payment values for "all MA plans" include employer plans. Payment values broken out by plan type do not include employer plans.
Source: MedPAC analysis of data from CMS on plan bids, enrollment, benchmarks, and FFS expenditures
coding intensity or favorable selection (beneficiaries who choose to enroll in an MA plan tend to be more profitable for the plan than beneficiaries who remain in FFS Medicare)-Medicare payments to MA plans in 2023 would average 101 percent of projected FFS spending; however, uncorrected coding intensity (MA coding intensity in excess of the adjustment) increases payments to 106 percent of projected FFS spending. That difference translates into a projected $\$ 27$ billion in 2023. The 2023 estimate does not adjust for the favorable selection of beneficiaries in MA plans but does incorporate our most recent estimate of MA coding intensity. ${ }^{38}$ Before including quality bonuses, MA payments averaged 102 percent of FFS spending in 2023.

Because CMS does not pay employer plans based on their bids, employer plans are included only in our overall estimate of MA payments relative to FFS spending. In 2017 and 2018, CMS began paying employer plans based on a blend of the 2016 bidding behavior of employer plans and the other MA plans. Starting in 2019, CMS began paying employer plans based on the prior year's bidding behavior of nonemployer plans by plan type and payment quartile. Because employer plans are mostly PPOs, their payment in 2023 largely reflects the average bidding behavior of nonemployer PPOs in 2022. Using 2023 employer plan payment rates and recent employer plan enrollment and risk score trends, we estimate that MA payments to employer plans will average 102 percent of projected FFS spending in $2023 .{ }^{39}$

Prior to each payment year, CMS publishes plan benchmarks in April, and plans submit their bids in June. Benchmarks reflect projected FFS spending estimates using data available at the time the benchmarks were published (e.g., projected 2023 FFS spending estimates use data available just prior to the release of benchmarks in April 2022). ${ }^{40}$ We use plans' projected enrollment, spending, and risk scores from their bids to estimate projected MA payments and compare that with CMS's projected FFS spending for a like set of FFS beneficiaries (by applying the MA enrollment and risk profile to CMS's projected spending of beneficiaries in FFS for each county). CMS's FFS spending estimates are the basis for MA benchmarks and therefore directly inform plan bids and payments.

Our method of using plan bids and CMS projections of FFS spending to compare MA and FFS spending does not fully account for the effects of favorable selection, which happens when MA plan payments (even after risk adjustment) are higher than actual costs. Because benchmarks are based on risk-standardized FFS spending, the underlying MA payment rates assume that standardized spending is equal between MA and FFS enrollees (prior to any coding differences between MA and FFS). However, bid data mask the favorable risk-adjusted spending that plans experience from beneficiaries who choose to enter MA and remain in MA. While the implementation of the CMS-HCC risk-adjustment model and policies that limited beneficiary plan switching during a year have reduced favorable selection for MA plans, research suggests that some favorable selection persists (Jacobson et al. 2019, McWilliams et al. 2012, Medicare Payment Advisory Commission 2012a, Newhouse et al. 2012). In preliminary work assessing favorable selection into MA, we have observed that the average riskstandardized FFS spending for beneficiaries who enrolled in MA in the next year was consistently lower than for beneficiaries who remained in FFS, suggesting that, on average, risk scores overpredict spending for beneficiaries who switch from FFS to MA. We also have found that this favorable selection persisted for years before those beneficiaries enrolled in MA, which suggests that the subsequent payments to MA plans for those enrollees, even after risk adjustment, were too high. Further, we have observed that MA enrollees with higher risk-standardized spending (which represents unfavorable selection for plans) are less likely to remain
in MA and are more likely to either die or rejoin FFS. We will continue to evaluate favorable selection of MA enrollees and consider this analysis for inclusion in future comparisons of MA payments to FFS spending.

## Variation in $\mathbf{2 0 2 3}$ MA bids and payments

Without adjusting for coding intensity or favorable selection, the ratio of MA plan payments to projected FFS spending for 2023 varies by plan type (Table 11-6). For example, HMOs as a group bid an average of 82 percent of projected FFS spending, yet payments for HMO enrollees are estimated to average 100 percent of FFS spending because of benchmarks averaging 109 percent of FFS spending. Local PPOs' bids average 85 percent of projected FFS spending, yet payments for local PPO enrollees are estimated to be 102 percent of FFS spending. Payments for beneficiaries enrolled in regional PPOs average 91 percent of FFS because of the regional PPOs' relatively low benchmarks (which are blended with regional plans' bids). In addition, SNPsHMOs and local PPOs available only to subpopulations of Medicare beneficiaries-bid an average of 86 percent of projected FFS spending, while payments are estimated to be 101 percent of projected FFS spending.

In 2023, 95 percent of MA plans (excluding SNPs) bid to provide Part A and Part B benefits for less than what the FFS Medicare program would spend (prior to adjusting for coding intensity or favorable selection) to provide these benefits (Table 11-7, p. 342), an increase from 92 percent in 2022. Plans (including SNPs) that bid below FFS spending are projected to enroll about 97 percent of MA enrollees, excluding those in employer plans. About 6 percent of MA enrollees are projected to enroll in plans that bid lower than 70 percent of FFS spending (similar to 2022); less than 1 percent are projected to enroll in plans that bid more than 110 percent of FFS spending.

Although plan bids average less than projected FFS spending, payments for these plans' enrollees can exceed FFS spending because the benchmarks (including the quality bonuses) can be high relative to their area's FFS spending. Figure 11-3 (p. 343) shows how plans bid relative to FFS for service areas with different ranges of projected FFS spending. ${ }^{41}$ As expected, plans bid higher (relative to FFS) in areas with relatively low FFS spending and bid lower (relative to FFS) where FFS spending is relatively high.

| $\begin{gathered} \text { TABLE } \\ 11-7 \end{gathered}$ | Distribution of 2022 MA bids relative to FFS |  |
| :---: | :---: | :---: |
| Bids as a percent of FFS spending | Share of bids | Share of projected MA enrollment |
| Less than 70\% | 7\% | 6\% |
| At least 70\%, less than 80\% | 25 | 30 |
| At least 80\%, less than 90\% | 43 | 47 |
| At least 90\%, less than 100\% | 20 | 14 |
| At least 100\%, less than 110\% | 5 | 2 |
| 110\% or more | 1 | <0.5 |

Note: MA (Medicare Advantage), FFS (fee-for-service). Employer group plans and special needs plans are not included. Results were similar when including special needs plans. Percentages do not account for unaddressed coding intensity differences or the favorable selection of beneficiaries who choose to enter and remain in MA. Totals may not sum to 100 percent due to rounding.

Source: MedPAC analysis of data from CMS on plan bids, enrollment, benchmarks, and FFS expenditures

However, even in service areas in the lowest quartile of FFS spending, less than $\$ 977.24$ per month on average, most plans bid less than the projected FFS spending level for 2023 (Figure 11-3). This finding suggests that, geographically, plan costs do not vary as much as FFS spending. After the ACA began lowering benchmarks in 2012, plans serving areas with benchmarks set at 115 percent of FFS spending (the lowest-spending quartile, corresponding to areas with benchmarks below $\$ 977.24$ per month in 2023) began bidding below FFS far more frequently. The median bid for areas in this quartile declined between 2013 and 2023 from 111 percent to 89 percent of FFS. However, the increasing efficiency demonstrated by plan bids in these areas, which were presumed to be the most challenging for MA plans to compete in, have not translated into Medicare savings. For 2023, Medicare still pays an average of 110 percent of FFS spending in these areas, due to benchmarks that average 119 percent of FFS once quality bonuses are included.

## Mandated report: Historical comparison shows MA payments consistently above FFS spending

The Consolidated Appropriations Act, 2023, mandated that the Commission submit to the Congress by March

15, 2023, a comparison of MA and FFS per enrollee spending for at least the last five years for which data are available (see text box for the legislative language of the mandate, p. 345). The Act requires that the Commission analyze FFS spending calculated for MA benchmarks as well as spending for FFS beneficiaries enrolled in both Part A and Part B. In this section, we fulfill this mandate by describing our methods and results for two different analytic approaches to comparing MA and FFS spending:

- Our long-standing prospective method compares MA payments with FFS spending from 2004 through 2023 primarily using plan bid data and CMS's projections of FFS spending. This method analyzes both FFS spending as used to calculate MA benchmarks and FFS spending for beneficiaries enrolled in Part A and Part B.
- A new retrospective method compares actual MA payments and FFS spending from 2016 through 2019 primarily using actual plan payments reported by CMS, risk scores, and data on FFS claims and nonclaims payments. This method analyzes FFS spending for beneficiaries enrolled in both Part A and Part B.

Both our prospective and retrospective methods yield similar results and find that MA payments have been consistently higher than FFS spending. This finding


Average monthly FFS spending per beneficiary in a given service area (in dollars)

Note: FFS (fee-for-service), MA (Medicare Advantage). This figure is based on 4,308 plan bids and excludes employer group plans, special needs plans, and plans in the territories. Results were similar when including special needs plans. Percentages do not account for unaddressed coding intensity differences or the favorable selection of beneficiaries who choose to enter and remain in MA. The FFS spending denominator used in the figure includes all Part A and Part B spending. MA enrollees must be enrolled in both Part A and Part B.

Source: MedPAC analysis of data from CMS on plan bids and FFS expenditures.
is consistent with previous Commission analyses that have found that private plans have never yielded aggregate savings for the Medicare program (Medicare Payment Advisory Commission 2022). ${ }^{42}$

## Prospective method finds that aggregate Medicare payments to MA plans have never been lower than FFS Medicare spending

Since the introduction of bids and benchmarks in MA payment policy, the Commission has used the same general prospective method to compare plan benchmarks, plan bids, and the resulting payments to MA plans relative to projected FFS spending. The results for 2023 are shown in Table 11-6 (p. 340).
Figure 11-4 (p. 344) shows that since 2004, estimated
payments to MA plans continue to be above estimated FFS Medicare payments for similar beneficiaries. Our general approach compares the baseline spending of MA enrollees with a like set of FFS enrollees and then makes an adjustment for differences in diagnostic coding.

## Prospective method step 1: Estimate base spending ratio

We compare how much Medicare spends on MA enrollees relative to how much Medicare would have spent on the same beneficiaries in the FFS program using a multi-part calculation. First, to estimate Medicare spending on the MA program, the Commission uses bid and benchmark data for all MA

## Medicare spending on MA plans has been greater than FFS spending would have been for the same enrollees, 2004-2023



Note: MA (Medicare Advantage), FFS (fee-for-service). The estimates in the figure reflect the Commission's estimates of the impact of coding intensity, beginning in 2007; benchmark increases under the quality bonus demonstration from 2012 through 2014 and under the quality bonus program starting in 2015; and adjustments for MA enrollees with Medicare as a secondary payer starting in 2016. Estimates have not been adjusted for favorable selection of beneficiaries who choose to enroll in MA plans. We assume, conservatively, that the coding intensity impact for 2022 and 2023 is the same as for 2021 (the most recent year of data available). The Commission uses the figures for FFS per beneficiary spending that CMS's Office of the Actuary generates to determine the MA benchmarks that plans use when submitting bids. Those FFS spending figures are calculated by summing (1) risk-standardized Part A FFS monthly spending for all Part A enrollees and (2) riskstandardized Part B FFS monthly spending for all Part B enrollees. This method for calculating FFS spending includes all FFS beneficiaries, including those who are enrolled in only Part A or only Part B, and thus it is not perfectly comparable with the MA population. Although MA enrollees must be enrolled in both Part A and Part B, the FFS spending denominator used in this figure includes all Part A and Part B spending. MA benchmarks, bids, and payments assume this level of FFS spending. We estimated that calculating FFS spending only for enrollees with both Part A and Part B would yield a result that is about 1 percentage point higher than the estimate of spending for all FFS enrollees.

Source: MedPAC reports to the Congress, 2006 through 2022, and MedPAC analysis of 2023 data from CMS on plan bids and FFS expenditures.
plans. ${ }^{43}$ We calculate a payment rate for each plan that includes payments for Medicare-covered Part A and Part B services, plan rebates that fund extra benefits, and payments resulting from the quality bonus program. These MA payment rates reflect the projected MA enrollee risk scores in plan bid data. We then calculate total spending by multiplying each plan's estimated payment rate by the projected enrollment that plans also include in their bids.

Second, we estimate what Medicare would have spent had the same beneficiaries enrolled in the FFS program by using the county-level estimates of per beneficiary

FFS spending that CMS produces to calculate the MA benchmarks (and publishes in the MA rate book). CMS generates these estimates by separately calculating per beneficiary FFS spending for Part A benefits (across all beneficiaries with Part A, including those who are not enrolled in Part B) and for Part B benefits (across all beneficiaries with Part B, including those who are not enrolled in Part A). CMS then risk standardizes the Part A and Part B estimates to reflect spending for an average beneficiary (with a 1.0 risk score) and sums the two amounts. CMS excludes spending for services that FFS provides but MA plans do not: hospice services, kidney acquisition costs, and graduate

## Legislative language for the mandated report on spending

The applicable provision of the Consolidated Appropriations Act, 2023, is found under S8874 of the Senate congressional record and reads (in part):

## DIVISION H—DEPARTMENTS OF LABOR, HEALTH AND HUMAN SERVICES, AND EDUCATION, AND RELATED AGENCIES APPROPRIATIONS ACT,

 2023 The explanatory statement accompanying this division is approved and indicates Congressional intent. Unless otherwise noted, the language set forth in House Report 117-403 carries the same weight as language included in this explanatory statement and should be complied with unless specifically addressed to the contrary in this explanatory statement. While some language is repeated for emphasis, it is not intended to negate the language referred to above unless expressly provided herein. In providing the operating plan required by section 516 of this Act, the departments and agencies funded in this Act are directed to include all programs, projects, and activities, including those in House Report 117-403 and this explanatory statement accompanying this Act. All such programs, projects, and activities are subject to the provisions of this Act. In cases where House Report 117-403 or this explanatory statement directs the submission of a report, that report is to be submitted to the Committees on Appropriations of the House of Representatives and the Senate.
## House Report 117-403:

Report on Spending.-The Committee requests a report no later than the March 15th following the enactment of this Act comparing per enrollee spending on behalf of Medicare beneficiaries enrolled in the Medicare Advantage (MA) program and beneficiaries enrolled in traditional fee-forservice (FFS) Medicare. In conducting such analysis, MedPAC shall evaluate at least the previous five plan years for which data is available. The analysis shall rely on data, as determined necessary, from the Centers for Medicare and Medicaid Services (CMS) Office of the Actuary, MA bids, the Medicare Trustees, and any other sources to assess spending on the MA and FFS Medicare programs. MedPAC shall conduct this analysis using the method used by CMS in calculating spending on FFS for use in the calculation of MA benchmarks, as well as spending on FFS beneficiaries only enrolled in both Part A and Part B. MedPAC shall also provide a detailed description of their methodology for any spending comparison between FFS and MA, including, but not be limited to, a description of data sources used, inclusions or exclusions of populations or services, and any adjustments made to prices, utilization, or payments.
medical education (both direct and indirect). ${ }^{44}$ We then calculate total spending by multiplying the countylevel estimates of per beneficiary FFS spending by the projected MA enrollment in each county and the MA risk scores that plans include in their bids.

Third, we divide total MA spending by total FFS spending. For 2023, the base MA-to-FFS spending ratio is 1.007 , which would indicate that-on a risk-adjusted basis-Medicare spends about 1 percent more on MA enrollees than it would spend to cover them in FFS, or

MA payments (before coding estimates) are 101 percent of FFS spending (Table 11-6, p. 340). However, this base spending comparison does not account for the impact of diagnostic coding practices that inflate MA risk scores relative to FFS Medicare.

## Prospective method step 2: Account for diagnostic coding differences

MA plans have a financial incentive to report all possible diagnoses for their enrollees, but providers in FFS generally do not. ${ }^{45}$ The tendency of MA plans to
submit more diagnosis codes for their enrollees causes the risk scores for MA enrollees to be higher than the risk scores for FFS enrollees of similar health status. Higher MA risk scores for enrollees of equivalent health status has been well established by the Commission and by other researchers (Congressional Budget Office 2017, Geruso and Layton 2015, Government Accountability Office 2012, Government Accountability Office 2013, Hayford and Burns 2018, Jacobs and Kronick 2018, Kronick and Chua 2021, Kronick and Welch 2014). In calculating the base MA and FFS spending estimates above, both estimates reflect MA risk score profiles; however, because of differences in diagnosis reporting, a 1.0 risk score in MA is not equivalent to a 1.0 risk score in FFS. Therefore, we adjust the MA-to-FFS Medicare base spending ratio to account for diagnostic coding differences.

The Commission has estimated the impact of differences in diagnostic coding on MA risk scores since 2007 (when the risk-adjustment model was implemented) and has found that MA risk scores generally have increased faster than FFS risk scores by about 1 percentage point per year. ${ }^{46}$ MA risk scores in 2021 were about 10.8 percent higher than FFS risk scores due to coding differences. When determining plan payment rates, CMS historically has applied an adjustment that accounts for only a portion of this difference (e.g., 5.9 percentage points in 2021). The Commission and other researchers cited above all find that coding differences are larger than CMS's adjustment. The Commission's comparison of MA and FFS spending takes into account the remainder of the diagnostic coding difference (4.9 percent in 2021) by multiplying the MA-to-FFS base spending ratio by the ratio of MA-to-FFS coding differences (1.049). For example, in 2023, we multiply 1.007 by 1.049 to get an overall spending comparison showing that Medicare spending on MA is about 1.06, or 106 percent, of Medicare spending on FFS Medicare. Due to lags in data availability, our estimate of the impact of MA coding on MA payments is based on data that are two years old, and we conservatively assume that the impact of coding intensity did not change during that period (e.g., we used our estimate of coding intensity in 2021 in our analysis comparing MA payments with FFS spending in 2023).

The Commission's prospective comparison of MA to FFS spending accounts for differences in health status
captured by risk scores (both spending estimates reflect the risk score profile in MA), geographic enrollment (both spending estimates reflect the geographic distribution of MA enrollment), covered services (both spending estimates exclude Medicare spending for hospice services, kidney acquisition costs, and direct and indirect graduate medical education), and diagnostic coding. As described in step 1, our comparison uses FFS spending as calculated by CMS for MA benchmarks, but the Commission also conducts a sensitivity analysis to estimate the effect of restricting CMS's FFS spending estimates to enrollees with both Part A and Part B.

## Prospective method: Assess the impact of restricting FFS spending to enrollees with both Part A and Part B

We use CMS's county-level per beneficiary FFS spending amounts in our comparison because they are the basis for MA benchmarks and plans use benchmarks as the reference point for their bids. Hence, CMS's FFS estimates are the foundation of the MA plan payment rate calculation. Using a different method of calculating FFS spending would change benchmarks, and-in all likelihood-plans would alter their bids in response, leading to both different payment rates and a different estimate of MA aggregate spending. Thus, the Commission has used CMS's FFS spending estimates as calculated for benchmarks as the primary basis for comparing MA with FFS spending since the introduction of the current bidding system in 2004.

The method that CMS uses to produce its FFS estimates has been criticized because it includes beneficiaries who have Part A but not Part B, while MA enrollees are required to have both Part A and Part B. Part A-only beneficiaries have lower FFS spending than beneficiaries who have both Part A and Part B, so including them in the calculation results in lower FFS estimates. (The impact of Part B-only beneficiaries on the FFS spending estimate has been negligible.) The Commission has recognized this shortcoming in the CMS methodology and, in June 2017, recommended that CMS calculate MA benchmarks using FFS spending data only for beneficiaries with both Part A and Part B (Medicare Payment Advisory Commission 2017).

For 2017 through 2019, we used FFS claims data to estimate that risk-standardized, per beneficiary

FFS spending for beneficiaries with both Part A and Part B was roughly 1 percentage point higher than CMS's projection of FFS spending (as calculated for benchmarks). However, we do not apply this higher FFS spending estimate to our MA-to-FFS base spending ratio because we cannot accurately estimate how CMS's projections would have changed and what the resulting impact on MA spending would be. Specifically, higher FFS spending would increase MA benchmarks, and we cannot observe how plans would alter their bids in response to higher benchmarks. Instead, we present the impact of restricting FFS spending to beneficiaries with both Part A and Part B as a sensitivity analysis. Although the share of FFS beneficiaries who have Part A only has increased in recent years, Part A spending as a share of total FFS spending has declined more rapidly. As a result, the difference between FFS spending for beneficiaries with Part A and Part B and CMS's projected FFS spending for benchmarks has decreased slightly in recent years.

For our sensitivity analysis, we use historical claims data to (1) calculate the average risk-standardized Part A and Part B spending separately for beneficiaries with Part A and Part B coverage, Part A-only coverage, and Part B-only coverage by county, and to (2) make adjustments for beneficiaries with Medicare as a secondary payer. MA risk adjustment comprises a "full-risk" model that includes demographic characteristics and diagnoses and a "new-enrollee" model that includes demographic characteristics only. Beneficiaries with a full year of Part B coverage in the prior calendar year are assigned to the full-risk model, and all other beneficiaries are assigned to the newenrollee model. CMS specifically designates Part Aonly enrollees as new enrollees, and therefore Part Aonly enrollees in FFS Medicare are used to calibrate the new-enrollee risk score model (Centers for Medicare \& Medicaid Services 2021c, Pope et al. 2011). Thus, we risk standardize spending using the appropriate risk scorethe full-risk score for beneficiaries with Part B in the prior year, and the new-enrollee score for Part A-only beneficiaries (reflecting that their average spending would be lower than the average beneficiary with both Part A and Part B coverage).

Beneficiaries with Medicare as a secondary payer (MSP) have lower Medicare spending because other health insurance generally pays for most of their health care services. CMS makes adjustments to plan bids and
payments to plans with the intention of completely removing the effect of these beneficiaries having MSP. For FFS spending, we estimate the effect of MSP using two methods, and both methods produced nearly identical overall results. One method excludes beneficiaries with MSP, and the second method applies a weight factor to beneficiaries with MSP equal to the ratio of average spending for beneficiaries with MSP to average spending for beneficiaries with Medicare as primary payer. We estimate the effect of MSP separately for beneficiaries with Part A and Part B coverage, Part A-only coverage, and Part B-only coverage.

After risk standardizing and accounting for MSP, we calculate the percentage difference between the populations with Part A or Part B and the population with Part A and Part B, by county. We apply this factor to CMS's county-level projections of FFS spending. Because we do not know with certainty how CMS's projection of FFS spending (and consequently MA payments) would change if benchmarks were calculated using FFS spending for beneficiaries with both Part A and Part B, the degree to which MA payments exceed FFS spending for the MA-eligible population would be best understood through a retrospective analysis examining actual MA and FFS spending over multiple years.

## Retrospective comparisons of actual MA and FFS spending are consistent with the Commission's prior prospective estimates

Our long-standing method of comparing MA payments with FFS spending has some limitations because it relies on projected estimates of MA and FFS spending, includes beneficiaries who are not eligible for MA enrollment, and uses an MA coding intensity estimate from two years prior. This year, we therefore conducted a retrospective analysis that compares actual MA plan payments from 2016 through 2019 with actual FFS spending for MA-eligible beneficiaries. ${ }^{47}$ Our retrospective comparison of MA payments with FFS spending produced results that are consistent with our originally published prospective comparison of MA with FFS spending for those years.

In conducting our retrospective analysis of actual MA payments and FFS spending for 2016 through 2019, we restricted our analysis to beneficiaries who had both Part A and Part B coverage, had Medicare

# Retrospective comparisons of MA payments relative to FFS spending are consistent with the Commission's originally published estimates 

## MA payments as percent of FFS spending

|  | 2016 | 2017 | 2018 | 2019 |
| :---: | :---: | :---: | :---: | :---: |
| Before accounting for coding differences |  |  |  |  |
| Prospective (as originally published) | $102 \%{ }^{\text {a }}$ | 100\% ${ }^{\text {b }}$ | 101\% ${ }^{\text {c }}$ | 100\% ${ }^{\text {d }}$ |
| Retrospective (MA-eligible beneficiaries) | 103 | 101 | 100 | 101 |
| After accounting for coding differences |  |  |  |  |
| Prospective (as originally published with two-year lag) | * | $104{ }^{\text {b }}$ | $103{ }^{\text {c }}$ | $102^{\text {d }}$ |
| Retrospective (MA-eligible beneficiaries) | 106 | 103 | 102 | 104 |

[^24]Source: MedPAC analysis of data from CMS on risk scores, plan bids, plan payments, and FFS expenditures from 2016 through 2019
as their primary payer, did not have end-stage renal disease, and resided in the 50 states and the District of Columbia. ${ }^{48}$ After applying these restrictions, our analysis included 89 percent of MA-eligible enrollees each year during the study period. ${ }^{49}$

For each MA plan, CMS publishes risk-standardized base payment rates (reconciled for actual county-level plan enrollment) and rebate amounts. To calculate total MA spending, we multiplied risk-standardized base payment rates by each beneficiary's final risk score and actual number of months of MA enrollment, then added rebate amounts multiplied by actual MA enrollment months. The sum of all base payments and rebates was reduced by 2 percent to reflect sequestration adjustments that occurred in all four years of the analysis. Finally, we added Medicare's supplemental
payments to federally qualified health centers (FQHCs) for MA enrollees. ${ }^{50}$

To calculate actual FFS spending, we summed beneficiary spending from adjudicated claims for Part A and Part B services (removing hospice and medical education payments), provider settlement amounts (e.g., reconciled payments after cost reports are submitted), provider incentive payments (e.g., shared savings), and CMS's most recent estimate of FFS administrative claims costs. ${ }^{51}$ We then risk standardized the average FFS spending within each county using final beneficiary risk scores. ${ }^{52}$ Similar to our prospective method, we multiplied the riskstandardized county-level per beneficiary FFS spending by the actual MA enrollment and final MA risk scores in each county.

Finally, we estimated MA payments relative to FFS spending by dividing the sum of MA spending by the sum of FFS spending and then multiplied this ratio by our estimate of MA coding intensity for the respective year. Our retrospective method accounts for both geographic enrollment and risk score differences between MA and FFS.

## Comparing prospective and retrospective method results

Our original prospective MA-to-FFS spending comparison results for 2017 through 2021 did not include employer plans because, as of 2017, these plans no longer submit bids, and the results prior to 2021 did not include an adjustment for plans' enrollees with MSP. Starting with our March 2022 report, we revised our prospective comparison method for 2022 to incorporate employer plans and to make an adjustment for MA enrollees with Medicare as a secondary payer. ${ }^{53}$ At that time, we also revised estimates for 2016 to 2021 to account for Medicare as a secondary payer and revised estimates for 2017 to 2021 to incorporate employer plans. ${ }^{54}$ For transparency, first we present a comparison of the results from our prospective method-as originally published-and the results from our retrospective method, and then we present a comparison of our revised prospective method and retrospective method. To align more closely with the two prospective methods, the retrospective analysis excluded employer plans when comparing with the original prospective method but included them when comparing with the revised prospective method. All results show that MA payments were higher than FFS spending from 2016 through 2019.

## Comparing prospective (as originally published) and

 retrospective results Consistent with our originally published prospective analyses, a retrospective comparison shows that MA payments were higher than FFS spending from 2016 through 2019 (Table 11-8). These estimates confirm that our prospective estimates were reasonably accurate during the period. In fact, our retrospective estimates were nearly the same as the prospective estimates we originally published (Medicare Payment Advisory Commission 2019b, Medicare Payment Advisory Commission 2018c, Medicare Payment Advisory Commission 2017, Medicare Payment Advisory Commission 2016). We note that when originally published, our MA-to-FFScomparison did not include employer plans (2017 through 2019), and our FFS spending estimate did not make an adjustment for the risk scores of MA enrollees with Medicare as a secondary payer (2016 through 2019). Therefore, the retrospective results shown in Table 11-8 exclude employer plans to match our original method more closely. (It was not possible to account for Medicare as a secondary payer in the retrospective analysis in a way that is consistent with the original prospective method.) In addition, our original prospective estimates assumed that the level of coding intensity in MA plans would be the same as it had been two years before the payment year (due to data availability constraints). The retrospective analysis incorporates the actual impact of coding differences in the payment year.

## Comparing revised prospective and retrospective

results A more precise comparison of MA and FFS spending from 2016 through 2019 includes employer plans and incorporates an adjustment for Medicare as a secondary payer, which we have implemented in both our revised prospective analysis and retrospective analysis shown in Figure 11-5 (p. 350). Using this method, MA payments were higher than FFS spending for all years from 2016 through 2019 (Figure 11-5). ${ }^{55}$ Under the revised prospective method, MA payments relative to FFS spending increased by about 1 percentage point in each year compared with the original prospective method. For example, actual 2018 MA payments relative to actual FFS spending were 102 percent (including coding intensity) using our original method, and they were 103 percent after including employer plans. In general, the revised prospective method matches the retrospective method more closely than the original method. Without taking into account the favorable risk-adjusted mix of beneficiaries in MA plans, the estimates in Figure 11-5 represent our best estimate of MA payments relative to FFS spending during the period.

While our retrospective and prospective estimates were very similar during this period, this pattern would likely not hold for the years during the coronavirus PHE. CMS's projection of FFS spending and MA bid and risk score projections were likely overestimated during the PHE. We will continue to update our retrospective comparison of MA payments relative to FFS spending as more recent data become available.


Note: MA (Medicare Advantage), FFS (fee-for-service). Estimates have not been adjusted for favorable selection of beneficiaries who choose to enroll in MA plans (i.e., underlying differences in risk-standardized spending between the MA and FFS populations that are not captured by risk scores, which would increase MA payments relative to FFS spending). The figure reflects the Commission's estimates of the impact of coding intensity in each year. Retrospective estimates include both claims and nonclaims FFS spending. Retrospective estimates are restricted to beneficiaries who had both Part A and Part B coverage, had Medicare as their primary payer, did not have end-stage renal disease, and resided in the 50 states and the District of Columbia. In contrast with Table 17-8, retrospective estimates include payments to employer plans. In addition, prospective estimates are revised to reflect payments to employer plans and adjustments for MA enrollees with Medicare as a secondary payer. Prospective estimates use the figures for FFS per beneficiary spending that CMS's Office of the Actuary generates to determine the MA benchmarks that plans use when submitting bids. Those FFS spending figures are calculated by summing (1) risk-standardized Part A FFS monthly spending for all Part A enrollees and (2) risk-standardized Part B FFS monthly spending for all Part B enrollees.

Source: MedPAC analysis of data from CMS on risk scores, plan bids, plan payments, and FFS expenditures from 2016 through 2019.

## Additional considerations for comparing MA and FFS spending

## Administrative expenses

We do not make a separate adjustment for administrative expenses when comparing MA and FFS spending in the prospective method. In MA, plans incorporate administrative expenses in their bid, including claims costs and other costs necessary for plan operations and plan profits. In FFS, the costs of processing and adjudicating FFS claims (including operations by the Medicare administrative contractors) are already included in the FFS spending estimate. The retrospective method matches this approach by adding CMS's estimate of administrative claims processing costs to the FFS spending estimate.

Our FFS spending estimate does not include Medicare's nonclaims administrative costs because doing so would erroneously add administrative expenses to the FFS Medicare spending estimate that are unrelated to FFS Medicare spending (such as costs for maintaining the MA program; costs to cover the Part B premium for eligible Medicaid enrollees; costs for fraud and abuse oversight by the Department of Health and Human Services, Office of Inspector General (OIG), the Department of Justice (DOJ), and the Federal Bureau of Investigation across the entire Medicare program; and funding for a host of other projects and agencies that are not related to spending within the FFS program). ${ }^{56}$ The Commission's estimates include only the costs necessary to directly pay for services in each program.

## Favorable risk selection

The risk scores of MA and FFS enrollees are not completely comparable in part because beneficiaries who choose to enroll in an MA plan tend to be more profitable for the plan than beneficiaries who remain in FFS Medicare (due to costs that are much lower than predicted by their risk scores). Favorable risk selection bias has been found in studies showing that FFS beneficiaries who chose to switch to MA had lower-than-average risk-adjusted FFS spending before entering MA (Jacobson et al. 2019, Medicare Payment Advisory Commission 2012a). The favorable selection that MA plans experience is separate from effects of higher MA coding intensity, and the effects of the two phenomena are additive. In our analysis, we account for overall diagnostic coding differences between MA and FFS but not favorable selection in MA. Thus, riskadjusted MA baseline spending is likely higher than we estimated and the difference between MA and FFS spending is likely greater. As we have recently observed that beneficiaries who enroll in an MA plan had lower-than-average risk-adjusted FFS spending in all years prior to joining the plan, we hope to estimate the magnitude of the favorable mix of beneficiaries who enter and remain in MA plans in a future analysis.

## Coding differences increased payments to MA plans by $\mathbf{\$ 1 7}$ billion in 2021 and generated rebate inequity across plans

Payments to MA plans are risk adjusted to account for differences in health status. Higher risk scores increase payments to plans for enrollees with higher expected Medicare spending. Risk scores are based on demographic information and diagnoses that plans submit to CMS. Documenting additional diagnosis codes raises plan enrollees' risk scores, generating two distinct benefits for MA plans: (1) increasing plans' monthly payments and (2) increasing the rebates plans use to provide extra benefits to enrollees. Plans that document relatively more diagnosis codes have a competitive advantage over other plans.

## Documenting more diagnosis codes increases payments to plans

Among the 20 most common HCCs in MA-which have reimbursement amounts ranging from roughly
\$1,000 to \$5,500-the average additional payment per HCC is about $\$ 3,400$ per year. Documenting each additional HCC for an enrollee can thus significantly increase Medicare payment to a plan. We can illustrate how coding additional HCCs increases payment to a plan using average FFS Medicare spending. ${ }^{57}$ For example, in 2022, the annual Medicare payment to an MA organization for a non-Medicaid-eligible 80-yearold male (where the demographic component of the risk score is valued at $\$ 6,726$ ) with diabetes without complication (HCC 19, valued at $\$ 1,284$ ) would have been $\$ 8,010$. If the same 80 -year-old male with diabetes were also found to have vascular disease (HCC 108 , valued at $\$ 3,620$ ), the Medicare annual payment to the MA organization would increase to $\$ 11,630$.

Because the CMS-HCC model uses FFS Medicare claims data to estimate the size of the model coefficients, the model calculates an expected spending amount based on FFS Medicare costs and diagnostic coding patterns. Most diagnoses are reported on physician and outpatient claims, which in FFS Medicare tend to be paid based on procedure codes, thus providing little financial incentive to document diagnoses for FFS beneficiaries. If certain diagnoses are not reported on FFS claims, the cost of treating those conditions is attributed to other components in the model, causing the coefficients overall to be inflated above the value they would have been if the diagnoses had been reported. For MA payments to be accurate, diagnoses must be coded with the same intensity in FFS Medicare and MA. When MA plans submit more diagnoses for a beneficiary than would have been documented in FFS Medicare, the program spends more for that beneficiary in MA than it would have if the beneficiary were in FFS. Because of the increased financial incentives for MA plans to code as many diagnoses as possible and the additional tools that MA plans use to capture diagnoses-which are not features of FFS Medicare-coding intensity is higher in MA than in FFS and payments to MA plans are higher than intended. Although Medicare's accountable care organization (ACO) programs and some other alternative payment models (APMs) offer incentives to increase diagnostic coding intensity in FFS Medicare, we have yet to see a measurable impact on the difference between MA and FFS coding intensity overall. The tools that ACOs and APMs have available are far less effective than those in MA; notably,

In the first year of MA enrollment, beneficiaries' average risk scores relative to those in FFS increased sharply, and they continued to rise in subsequent years


Note: MA (Medicare Advantage), FFS (fee-for-service). Analysis of 2007 through 2013 includes six MA and FFS cohort pairs starting in 2007 through 2012 and ending in 2013. Analysis of 2015 through 2021 includes six MA and FFS cohort pairs starting in 2015 through 2020 and ending in 2021.

Source: MedPAC analysis of CMS enrollment and risk score files
chart reviews, in-home health risk assessments, and subcapitation to medical groups are used only in MA. Thus we expect that FFS coding will continue to identify fewer diagnosis codes than MA coding.

We analyzed enrollment cohorts from 2007 through 2013 to test whether beneficiary risk scores grew faster in MA than in FFS. Among a cohort of beneficiaries who enrolled in FFS Medicare and whose first full year of Medicare enrollment was 2007, we compared beneficiaries who remained in FFS through 2013 with those who switched to MA in their second year and remained in MA through 2013. ${ }^{58}$ In the first year after switching to MA (year 1 to year 2), average MA risk scores increased by about 6 percent more than FFS scores across all cohorts (Figure 11-6). For each subsequent year in MA, average MA risk scores continued to increase more than FFS scores by about 1.5 percent across all cohorts.

We repeated this analysis for enrollment cohorts from 2015 through 2021, defining FFS and MA cohort pairs the same way as in the 2007 through 2013 analysis. The results of our second analysis show that differences in MA and FFS coding practices across all cohorts have continued to diverge, with MA risk scores increasing about 9 percent more than FFS scores in the first year and increasing by about 2.3 percent more than FFS scores in each subsequent year.

MA plans are reacting to financial incentives to document all of an enrollee's diagnoses that are accurate and properly supported by medical evidence. MA plans that report inaccurate diagnoses for the purpose of receiving unwarranted payments risk financial penalty if inaccurate diagnoses are discovered during risk-adjustment data validation audits (see "Risk-adjustment data validation," p. 362).


MA coding intensity increased MA risk scores by 1 percentage point annually but was offset by new risk-adjustment model versions in 2014, 2016, and 2017 (gray arrows) and by increased FFS coding in 2016 and 2017 (black arrows).

Note: MA (Medicare Advantage), FFS (fee-for-service). All estimates account for any differences in age and sex between MA and FFS populations. Annual adjustment for MA coding began in 2010.

Source: MedPAC analysis of CMS enrollment and risk score files.

## In 2021, coding differences increased payments to MA plans by $\mathbf{\$ 1 7}$ billion

Inflated MA payments due to coding differences have been under scrutiny for more than a decade. Starting in 2010, a series of congressional mandates required CMS to reduce MA risk scores to address the impact of MA and FFS coding differences on payments to MA plans. Because of these mandates, CMS reduced MA risk scores by 3.41 percent in each year from 2010 through 2013. Starting in 2014, legislation specified a minimum reduction of about 4.9 percent, which rose gradually to about 5.9 percent in 2018, where it will remain until the Secretary of Health and Human Services implements risk adjustment using MA diagnostic, cost, and use data. Although larger reductions are allowed under the
legislation, CMS reduced MA risk scores by only the minimum amount required by law for 2014 through 2023. ${ }^{59}$ In 2023, CMS will reduce MA risk scores by 5.9 percent.

Figure 11-7 shows, for 2007 through 2021, the impact of differences in coding intensity on MA risk scores relative to FFS and the size of the coding intensity adjustment (the amount by which CMS reduced MA risk scores to account for coding intensity). ${ }^{60}$ During that period, coding intensity consistently increased MA risk scores by about 1 percentage point or more annually; however, the underlying trend was offset in 2014, 2016, and 2017 by the introduction of new versions of the risk-adjustment model and by more intensive FFS coding. The coding intensity adjustment has never fully


Note: MA (Medicare Advantage). Estimates for 2007 through 2021 are based on the Commission's estimate of uncorrected coding intensity and Medicare spending for MA plans from the Medicare Trustees' reports.
*The 2022 and 2023 estimates incorporate the conservative assumption that uncorrected coding intensity will be the same as in 2021 ( 4.9 percent, although all evidence suggests that it will be larger) and are based on projected Medicare spending for MA plans from the 2022 Medicare Trustees' report.

Source: MedPAC analysis of CMS enrollment and risk score files, and Medicare Trustees' reports, 2017 and 2022.
accounted for the impact of coding intensity on MA risk scores, resulting in continued excess payments to MA plans relative to FFS spending for similar enrollees.

For 2021, MA risk scores were 10.8 percent above FFS risk scores, and this difference was only partially offset by the coding intensity adjustment that reduced MA risk scores by 5.9 percent. The net effect was a 4.9 percent increase in MA risk scores, leading to $\$ 17$ billion in excess payments to MA plans. The magnitude of these findings is consistent with most other research showing that the impact of coding differences on MA risk scores is larger than CMS's adjustment for coding (Congressional Budget Office 2017, Geruso and Layton 2015, Government Accountability Office 2013, Hayford and Burns 2018, Kronick and Welch 2014). One analysis
using a unique method found that coding intensity resulted in MA risk scores that were 20 percent above FFS risk scores in 2019 (Kronick and Chua 2021).

Expressed as a trend, MA coding intensity increases MA risk scores by 1 percentage point per year more than the FFS risk score trend (the trend was about 1.25 percentage points per year higher from 2007 through 2013 and about 1 percentage point per year higher from 2017 through 2021). However, Figure 11-7 (p. 353) shows deviations from this trend in 2014, 2016, and 2017, which we attribute to two factors: (1) new versions of the riskadjustment model that were less susceptible to MA and FFS diagnostic coding differences were introduced in 2014, 2016, and 2017; and (2) FFS risk scores grew faster in 2016 and 2017 than in prior and subsequent years
(matching or nearly matching MA risk score growth rates), likely due to Medicare's transition from using International Classification of Diseases (ICD)-9 to ICD-10 diagnosis codes in October 2015. See our March 2021 MA chapter for a more detailed explanation of these factors (Medicare Payment Advisory Commission 2021c).

Between 2007 and 2023, we estimate that MA coding intensity will have caused nearly \$124 billion in aggregate excess payments to MA plans (Figure 11-8). Between 2007 and 2021, MA coding intensity resulted in $\$ 80$ billion in excess payments to MA plans. Conservatively assuming that uncorrected coding intensity (coding intensity in excess of the adjustment) will remain the same in 2022 and 2023 as in 2021 (4.9 percent, although all evidence suggests that it will be larger), uncorrected coding intensity in 2022 and 2023 will add another $\$ 20$ billion and $\$ 23$ billion, respectively. (We noted earlier that, in 2023, Medicare will pay MA plans a total of $\$ 27$ billion more than it would spend if those beneficiaries were enrolled in FFS Medicare; \$23 billion of that total is due to MA coding intensity.)

## Documenting additional diagnosis codes increases plan rebates and can undermine competition among plans

Documenting additional diagnostic codes increases the size of MA plans' rebates, which in turn allows plans to offer their enrollees more extra benefits than if fewer diagnostic codes had been documented for the same set of enrollees. For a plan submitting a bid below its benchmark (nearly all plans in 2022), the plan's rebate is based on the difference between the plan's bid for its expected enrollee population and the plan's riskadjusted benchmark, which is the standard benchmark (for a beneficiary of average risk, with a 1.0 risk score) multiplied by the plan's expected average risk score. Raising a plan's average risk score raises the plan's risk-adjusted benchmark and widens the difference between the plan's bid and risk-adjusted benchmark, thereby increasing the plan's rebate amount and ability to offer more extra benefits. In sum, plans can translate greater coding effort into the ability to offer more extra benefits than their competitors and can gain a competitive advantage in attracting enrollees.

MA payment policies use the ability to offer more extra benefits as an incentive for plans to lower spending and improve quality. By reducing health care costs, plans
can reduce their bids, increasing their rebate and extra benefit value. By improving quality scores, plans can be rewarded with a 5 percent or 10 percent increase in their benchmark or with an increase in the rebate percentage (the percentage of the bid and benchmark difference that determines the rebate amount). These policies are supposed to benefit beneficiaries through improved quality, more extra benefits, and reduced premiums, and the policies are intended to lower taxpayer funding for the Medicare program. Greater MA coding intensity, however, undermines these incentives by allowing plans to offer more extra benefits without reducing health care costs or improving quality.

Table 11-9 (p. 356) illustrates the relationship between coding intensity and rebate amounts using a hypothetical example of three plans covering the same set of enrollees for whom the expected cost of care is the same, at $\$ 900$ per member per month. Plans A and $Z$ have an expected risk score of 0.97 , and Plan B has an expected risk score of 1.03 due to more aggressive diagnostic coding. All three plans have bids below the risk-adjusted benchmark and must provide extra benefits funded by rebates. However, because Plan B has a higher risk score, its rebate is larger than Plan A's rebate ( $\$ 52$ per month vs. $\$ 15$ per month), so it can offer enrollees more extra benefits. Plan B's aggressive diagnostic coding effort has therefore given it an unfair competitive advantage over Plan A.

In addition, aggressive coding can result in greater extra benefits than the effect of MA quality bonuses. The higher risk score of Plan B, which has only 3.5 stars, gives it an advantage over bonus-level Plan Z, which has 5 stars: Plan B's rebate amount is higher than Plan Z's (\$52 per month vs. $\$ 49$ per month). Thus, by inflating its risk score from 0.97 to 1.03 , Plan B can offer more extra benefits than that provided through quality bonuses.

The plans illustrated in Table 11-9 (p. 356) have a risk score difference of 6 percentage points, reflecting different coding practices. We analyzed MA contracts (MA organizations can offer one or more plans under each contract with Medicare) and found much greater variation in coding for $2021 .{ }^{61}$ Figure 11-9 (p. 357) shows contract-level coding intensity relative to FFS coding in the same counties served by the contract, excluding contracts in the Program of All-Inclusive Care for the

| Plan | Bid: Monthly cost of care for expected population | Risk score of expected population | Monthly MA benchmark for the county for an average-risk population (+5\% for bonus plan) | Risk-adjusted monthly benchmark (benchmark multiplied by risk score) | Difference in risk-adjusted benchmark and plan bid | Monthly value of extra benefits (rebate amount)* |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Nonbonus plans |  |  |  |  |  |  |
| Plan A (3.5 stars) | \$900 | 0.97 | \$952 | \$923 | \$23 | \$15 |
| Plan B (3.5 stars) | 900 | 1.03 | 952 | 981 | 81 | 52 |
| Bonus plan |  |  |  |  |  |  |
| Plan Z (5 stars) | 900 | 0.97 | 1,000 | 970 | 70 | 49 |

Note: MA (Medicare Advantage). Under the MA quality bonus program, plans with a star rating of 4 or more stars, "bonus plans," receive a bonus increase to their benchmark. Plans with fewer than 4 stars are referred to as "nonbonus plans." An average-risk population has a risk score of 1.0 . This example assumes that the actual cost of care for the expected population is $\$ 900$ monthly for each of the three plans and that the plans serve the same beneficiaries. Plan B's risk score of 1.03 is inflated due to greater diagnostic coding effort. *Plans $A$ and $B$ at 3.5 stars have a rebate percentage of 65 percent. Plan $Z$ at 5 stars has a rebate percentage of 70 percent.

Elderly, special needs plans, and contracts with fewer than 2,500 enrollees.

Consistent with prior years, nearly all MA contracts had coding intensity greater than FFS, and the share of MA contracts that are overpaid after accounting for the coding adjustment continues to increase. To illustrate the relative advantage for higher-coding plans, we note that the difference between the MA contracts at the 25 th and 75 th percentile is more than 7 percentage points, and the difference between contracts in the 10th and 90th percentile is more than 19 percentage points. Our finding that coding intensity varies across MA contracts is consistent with other research and is consistent with the Office of Inspector General's (OIG's) findings that use of chart reviews and health risk assessments-accounting for nearly two-thirds of MA coding intensity, by our estimate-varies widely across MA organizations (Geruso and Layton 2015, Kronick and Welch 2014, Office of Inspector General 2021). These differences are large enough to give contracts with higher coding intensity a significant competitive advantage by inflating the size of plan rebates and helping them to attract more enrollees. In addition, different coding intensity levels demonstrate
that CMS's across-the-board adjustment for coding intensity, which reduces all MA risk scores by the same amount, generates inequity across contracts by reducing net revenue (coding intensity-based payments minus CMS's coding intensity adjustment) for plans with lower coding intensity and allowing other plans to retain a significant amount of revenue from higher coding intensity.

We also analyzed whether such coding differences exist across MA organizations (which can have multiple contracts with Medicare) and found that some companies offering MA plans have a significant competitive advantage over others. Figure 11-10 (p. 358) shows that among the eight largest MA organizations (covering 77 percent of MA enrollees), there is a more than 9 percentage point difference in average coding intensity, with average coding intensity of about 15 percent above FFS levels for three of the organizations, and average coding intensity between 6 percent and 10 percent above FFS for the other five large organizations. All eight of these organizations had greater coding intensity than the 5.9 percent coding adjustment and therefore received excess payment due to aggressive coding practices.


MA contracts with more than 2,500 enrollees (ranked by risk score growth)

Note: MA (Medicare Advantage), FFS (fee-for-service). Excludes special needs plans, contracts for the Program of All-Inclusive Care for the Elderly, and contracts with enrollment of less than 2,500. Analysis is based on retrospective cohorts of 2021 enrollees, tracked backward for as long as they were continuously enrolled in the same program (FFS or MA) or as far back as 2007.

Source: MedPAC analysis of CMS enrollment and risk score files.

## MA plans have several ways to code more diagnoses than their FFS counterparts

MA plans use several mechanisms that do not exist in FFS Medicare to document diagnoses for their enrollees. They can identify enrollees likely to have an HCC that has not yet been documented using data the plan already has: an enrollee's historical claims, risk score data, and prescription drug data (e.g., a prescription for insulin likely indicates a diabetes diagnosis). Of all the mechanisms to document more diagnosis codes, evidence continues to highlight MA plans' use of health risk assessments and chart reviews as major sources of plan revenue from coding intensity.

## Pay-for-coding programs and patient assessment forms

Some plans try to ensure that providers submit all possible diagnoses for their enrollees through pay-
for-coding programs in which plans send physicians a patient assessment form that includes diagnosis codes that the plan has identified for a beneficiary. Plans ask physicians to confirm the existence of planidentified diagnoses on the form and document those diagnoses on subsequent claims. Plans pay physicians based on completing the form or as a dollar amount per diagnosis code submitted, and some plans include a bonus payment for submitting every code that the plan identifies for a beneficiary.

## Capitated arrangements in California and Florida tend to exacerbate coding intensity

In the course of reviewing our coding intensity estimates by MA organization, we found that several organizations with the highest diagnostic coding relative to FFS are located in California and Florida. Hence, we identified 23 MA organizations offering plans


Note: MA (Medicare Advantage), FFS (fee-for-service). Excludes special needs plans, contracts for the Program of All-Inclusive Care for the Elderly, and parent organizations with enrollment below 2,500. Analysis is based on retrospective cohorts of 2021 enrollees, tracked backward for as long as they were continuously enrolled in the same program (FFS or MA) or as far back as 2007.

Source: MedPAC analysis of CMS enrollment and risk score files.
primarily in California and Florida (i.e., organizations with a majority of their enrollment in California or Florida, excluding the eight largest MA organizations) and found that many have among the highest levels of coding intensity of all MA organizations. Twelve of the 14 organizations with the highest coding intensity offer plans primarily in California and Florida (Figure 11-11).

To address why these California- and Florida-focused organizations account for so many of the highestcoding organizations, we considered that health plans in California and (to a somewhat lesser extent) Florida have long participated in a form of capitated payment for providers known as the "delegated model." Under the delegated model, the responsibility for health care delivery and associated financial
risk are delegated by the plan to a medical group or independent physician association. Typically, a plan pays a medical group a risk-adjusted sum per enrollee, which is often calculated as a share of a plan's total Medicare revenue. Because a plan's revenue increases when more diagnoses are documented, the capitated payments to providers (determined as a percentage of the plan's revenue) increase proportionately. In these arrangements, the financial incentive to document more diagnoses is passed on to the medical group, which has direct access to an enrollee's medical records and diagnostic information.

Although we could not confirm that the plans offered by the 12 highest-coding California and Florida organizations use the delegated model, we found that for the 5 organizations with the highest


MA parent organizations (ranked by risk score growth)

Note: MA (Medicare Advantage), FFS (fee-for-service). Excludes special needs plans, contracts for the Program of All-Inclusive Care for the Elderly, and parent organizations with enrollment below 2,500. Analysis is based on retrospective cohorts of 2021 enrollees, tracked backward for as long as they were continuously enrolled in the same program (FFS or MA) or as far back as 2007. The eight largest MA organizations identified in Figure 17-10 were excluded from the organizations identified as having enrollment mostly in CA or FL.

Source: MedPAC analysis of CMS enrollment and risk score files
coding intensity, provider payments are almost entirely capitated. For the next four highest-coding organizations, between 50 percent and 75 percent of provider payments are capitated, and for the remaining three organizations, between 20 percent and 35 percent of provider payments are capitated. For context, across all MA plans, about two-thirds of contracts use some capitation, and the average share of capitated payments among those contracts is about 40 percent. Based on our results, it appears that some capitated providers in California and Florida have responded to financial incentives and dramatically increased risk scores for MA plan enrollees. Finally, we note that the alignment of clinical and financial accountability under the delegated model theoretically
provides a number of beneficial incentives to constrain costs, avoid low-value care, and coordinate care. However, these potential benefits do not justify excess payments due to coding intensity, and such payments are not necessary to sustain the model's incentives.

## MA plans' use of health risk assessments to increase diagnosis coding

In a recent study, OIG found that in 2017, health risk assessments and chart reviews accounted for $\$ 9.6$ billion in payments to MA plans (Office of Inspector General 2021). Based on their findings, we estimate that health risk assessments and chart reviews generated 4.6 percent of total payments to plans and were responsible for 64 percent of MA coding
intensity in 2017. Our prior work closely examined MA plans' use of health risk assessments to document additional diagnosis codes (Medicare Payment Advisory Commission 2016). Some MA plans spend significant resources calling enrollees, offering incentives to have them participate in health risk assessments, and sending nurses to enrollees' homes to ask directly about their health. We estimate that diagnoses supported only by a health risk assessment-where no treatment was provided during the year-accounted for about 1 percentage point to 2 percentage points of overall MA coding intensity impact. OIG found that in 2017, diagnoses supported only by a health risk assessment-80 percent of which were the result of in-home health risk assessments-accounted for payments to MA plans of $\$ 2.6$ billion (Office of Inspector General 2020). In 2017, this amount is about 1.2 percent of payments to MA plans.

The DOJ recently joined a whistleblower lawsuit against Cigna for submitting false and invalid diagnosis codes that were collected through its " 360 Comprehensive Assessment" program for in-home health risk assessments. Cigna's internal documentation stated that vendor-company nurses conducting the assessments were prohibited from providing actual patient treatment or care and that " $[t]$ he primary goal of a 360 visit is administrative code capture and not chronic care or acute care management" (Department of Justice 2022). According to the DOJ, Cigna targeted plan members who were likely to yield the greatest risk score increase; many diagnoses documented during a 360 visit were not documented during any other health care visit in the year; nurses did not perform specific testing or imaging that is required to reliably diagnose conditions documented during the visit; and many diagnoses did not conform to the ICD Office Guidelines for Coding and Reporting as required by federal regulations (plans submit diagnoses to CMS using ICD-10 codes) (Department of Justice 2022). The DOJ alleges that, over nine months in 2014, Cigna spent $\$ 2.13$ million on in-home visits that generated an additional $\$ 14$ million in Medicare payments, for a return on investment (ROI) of nearly seven to one. The allegations in this case demonstrate how health risk assessments can be used to increase MA risk scores and highlight the risks some plans take to submit more diagnosis codes by submitting false or invalid codes or otherwise violating federal regulations.

## MA plans' use of chart reviews to increase diagnosis coding

Some MA plans devote significant effort to conducting chart reviews to increase MA payments. ${ }^{62}$ Because chart reviews are not used in FFS Medicare, all diagnoses newly documented through chart reviews contribute to differences in FFS and MA diagnostic coding and contribute to excess payments to MA plans. Chart reviews document the diagnoses made during hospital and physician encounters in which medical services were provided. MA plans use chart reviews to identify diagnoses not captured through the usual means of reporting diagnoses (e.g., claims data and encounter data): Sometimes the diagnoses are not reported on the provider's claim that is sent to the MA plan, and sometimes the MA plan does not submit a record of the encounter to CMS. Because Medicare requires each HCC to be supported by diagnostic evidence in a patient's medical record, medical record reviews are a logical way for plans to identify diagnoses not captured through provider claims or on plan encounter data. However, chart review programs are used exclusively in MA (there is no incentive to undertake chart reviews in FFS Medicare) and thereby exacerbate Medicare's failure to sufficiently account for differences in MA and FFS diagnostic coding.

Like health risk assessments, some MA plans treat chart review programs as an independent revenue stream that yields a positive ROI because the additional Medicare payments from newly documented diagnoses far exceed the costs of paying nurses and medical assistants to review medical charts. ${ }^{63}$ Ongoing lawsuits allege that MA plans use chart reviews to identify new diagnosis codes but not to verify the accuracy of already submitted codes, even when the MA organization is aware that some diagnoses that have been submitted are not supported by the medical chart (violating Medicare's rules governing the reporting of diagnoses). Documentation from these whistleblower lawsuits sheds light on the profitability of chart reviews. In 2005 and 2006, just one year after the CMS-HCC model began to be phased in, one plan sponsor contracted with a chart review vendor to conduct three batches of chart reviews, yielding ROIs ranging from 22:1 to 30:1 (United States of America ex rel. James M. Swoben v. Secure Horizons 2017). Between 2010 and 2015, a large insurer obtained over $\$ 3$ billion in additional MA payments from its
chart review program (United States of America ex rel. Benjamin Poehling v. UnitedHealth Group 2016). In 2015, a different MA plan sponsor spent about \$19 million conducting over 500,000 chart reviews and was able to net over $\$ 94$ million in profits, yielding an ROI of 6:1 (United States of America v. Anthem 2020). Some plans and vendors appear to selectively review charts with a higher likelihood of increasing revenue and use artificial intelligence to more accurately identify likely revenue-producing charts (Optum 2020). One vendor claims that its clients have received ROIs between 6:1 and $12: 1$ (Blue Health Intelligence 2020). While the financial return is clearly worth plan sponsors' effort and financial investment, chart review programs offer questionable benefits for plan enrollees and are detrimental for the taxpayers and beneficiaries funding the Medicare program.

Medicare accepts chart reviews as evidence of a diagnosis for risk adjustment. Plans submit encounter records of chart reviews along with records of encounters with health care providers. Some chart review records are linked to a specific provider encounter, but CMS also allows plans to submit "unlinked chart review records," in which the provider encounter that is the subject of the chart review is not specified. Some chart review records provide evidence of provider encounters for which the plan has not submitted an encounter record. For use in risk adjustment, CMS uses both encounter records and chart review records from hospital and physician visits as the source of diagnostic data.

OIG analyzed 2016 encounter data and found that 80 percent of MA contracts submitted at least one chart review and that plans submitted a total of 52.6 million chart reviews during the year (Office of Inspector General 2019). Of those chart reviews, 17 million contained diagnoses that were not documented on any health care encounter record. Although plans can use chart reviews to add or delete diagnoses from encounters, OIG found that less than 1 percent of chart reviews were used to delete diagnoses, lowering payments by $\$ 196.5$ million. Chart reviews adding diagnoses raised payments to MA plans by $\$ 6.9$ billion (resulting in a net payment increase of $\$ 6.7$ billion). In 2017, this amount was about 3.2 percent of payments to MA plans. Chart reviews that were not linked to a specific provider encounter accounted for $\$ 2.7$ billion of the increased payments. Although chart reviews
are common in MA, the use of chart reviews varied across contracts or plan sponsors. OIG found that 10 MA contracts accounted for one-third of the additional payments, and that 10 of 137 parent organizations accounted for 79 percent of the increased payments to MA plans.

## The Commission's prior recommendation on coding intensity

In our March 2016 report to the Congress, the Commission recommended a multipronged approach that would fully account for the impact of coding differences, improve the equity of the adjustment across MA contracts, and increase incentives to reduce costs and improve quality. The Commission's approach to addressing MA coding intensity has been to address the underlying causes first (e.g., remove health risk assessments and reduce year-to-year coding variations) and then address remaining differences with either an across-the-board or tiered adjustment. The Commission's 2016 recommendation did not address the use of chart reviews because data were not available at that time, but eliminating chart reviews as a source of diagnoses for risk adjustment is consistent with the Commission's approach.

The recommendation, which would replace the existing mandatory minimum coding intensity adjustment (which was 5.9 percent beginning in 2018), has three parts:

- develop a risk-adjustment model that uses two years of FFS and MA diagnostic data,
- exclude diagnoses that are documented only on health risk assessments from either FFS or MA, and then
- apply a coding adjustment that fully accounts for the remaining differences in coding between FFS Medicare and MA plans.

Using two years of diagnostic data would improve the accuracy of both FFS and MA diagnostic information and would reduce year-to-year variation in documentation. However, CMS did not take this step, even though the agency was given the authority to do so in the 21st Century Cures Act. Removing diagnoses documented only through health risk assessments would mean that a diagnosis, to be counted in risk-
adjustment calculations, would have to have been the subject of a medical encounter. Diagnoses that were both documented on an assessment and associated with a medical encounter would continue to count toward risk adjustment. However, about 30 percent of the HCCs documented through health risk assessments for MA enrollees were not treated during the year, compared with about 6 percent of diagnoses that were documented through these assessments for FFS enrollees.

Implementing the first two policies-using two years of diagnostic data and excluding diagnoses documented through health risk assessments alone-and excluding chart review data from risk adjustment (consistent with the Commission's approach) would result in a more equitable, targeted adjustment to MA contracts than the current across-the-board adjustment. As noted earlier, health risk assessments and chart reviews alone account for almost two-thirds of MA coding intensity.

Adjusting for any remaining coding intensity differences could also improve equity across MA contracts. Under one approach, contracts would be grouped into tiers of high, medium, and low coding intensity, and a coding intensity adjustment would be applied based on each tier's average level of coding intensity. CMS has used a similar approach to select MA contracts for risk-adjustment data validation audits. ${ }^{64}$ While this policy would leave some unevenness within each group of contracts, overall inequity would be reduced relative to a single across-the-board adjustment. CMS could consider using a greater number of tiers to further refine the equity of the overall adjustment.

## Risk-adjustment data validation

Medicare payments to MA plans are based, in part, on diagnostic data that plans submit to CMS. Program rules state that, to be used for payment, diagnoses submitted for risk adjustment must result from a hospital inpatient stay, hospital outpatient visit, or face-to-face visit with a physician or other health care professional; diagnoses also must be supported by evidence in the patient's medical record. MA plan leadership signs an attestation stating that riskadjustment criteria have been applied correctly and that the submitted data are accurate. CMS conducts risk-adjustment data validation (RADV)
audits after payments have been made to the plan to check whether plan-submitted diagnoses are supported by the medical record as required by Medicare. If diagnoses do not meet requirements, plans are required to return payments to Medicare. ${ }^{65}$ Overpayments for diagnoses that do not meet program requirements are not the same as overpayments for uncorrected MA coding intensity; however, there is an unknown amount of overlap between the two types of overpayments.

CMS audits roughly 5 percent of MA contracts per year (about 30 contracts in early audit years) and, for each contract, uses a sample of 201 enrollees who are eligible for the audit population because they had at least 1 HCC reported and met certain other criteria. ${ }^{66}$ The sample includes 67 randomly selected enrollees from each of three strata of beneficiaries' risk scores (low, medium, and high). For each beneficiary, the audit calculates a payment error rate, defined as the portion of the beneficiary's HCC-based payment that was not based on valid data. Beneficiary payment error rates can be offset if any additional HCCs are found that were not submitted for payment but were supported by the beneficiary's medical record. ${ }^{67}$ In the initial round of audits of 2007 data, CMS recovered overpayments only for beneficiaries in the sample of 201 enrollees. For subsequent audits, in 2018 CMS proposed (but has not implemented) recovering overpayments for all audit-eligible enrollees in the contract by extrapolating from the lower 99th percent confidence interval around the average payment error rate for the sampled enrollees. ${ }^{68}$ Using the lower 99th percent confidence interval ensures that CMS recovers only overpayment amounts that are identified with a very high degree of confidence.

RADV audits of MA contracts have been limited, and their results are largely unreported. Audits of 2007 risk-adjustment data identified diagnoses that did not meet risk-adjustment criteria and determined that average overpayment rates were well over 10 percent for most contracts under audit (Schulte 2016). CMS recovered $\$ 13.7$ million in overpayments from audits of 37 contracts, based on overpayments for only the 7,437 beneficiaries included in the audit sample (Centers for Medicare \& Medicaid Services 2017). No audits were conducted for payment years 2008, 2009, or 2010. Kaiser Health News obtained through a Freedom of

| TA B L E |
| :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- | :--- |
| 11-10 |

Note: No audits were conducted from 2008 through 2010.
${ }^{\text {a }}$ The RADV audits conducted in 2007 attempted to recoup payments for only the beneficiaries and diagnoses associated with the overpayments identified in the audit data, a small fraction of all plan payment data.
${ }^{\mathrm{b}}$ CMS has completed audits of 2011, 2012, and 2013 data and stated that it expects to recoup $\$ 650$ million in overpayments through an overpayment recovery method that extrapolates sampled audit data to all plan payments, but the agency will not release results of those audits until the extrapolation method is finalized.

Source: Department of Health and Human Services financial annual reports and CMS MA risk-adjustment data validation audits fact sheet, June 1, 2017.

Information Act request summaries of the preliminary results for 90 audits completed during 2011, 2012, and 2013 and found that 71 audits uncovered net overpayments, with 23 audits finding overpayments of $\$ 1,000$ or more per beneficiary (Schulte and Hacker 2022). CMS stated that it expects to recoup about $\$ 650$ million in overpayments using the extrapolation method for audits conducted on data for 2011 through 2013 (Centers for Medicare \& Medicaid Services 2018). However, CMS will not release the results of those audits until its extrapolation method is finalized (Centers for Medicare \& Medicaid Services 2019).

CMS has proposed additional RADV audits focused on certain HCCs rather than on whole contracts; however, CMS has not identified the scope of such audits or stated when they would begin. Audits of 2014 and 2015 data are still in progress in part due to delays related to the coronavirus PHE. Table 11-10 summarizes the history of RADV audits and results.

In reviewing the RADV audit process, the Government Accountability Office (GAO) noted that RADV audits are tasked with recouping billions of dollars in improper payments to MA plans based on risk-adjustment
data. However, GAO found a number of shortcomings with the audits and recommended targeting them at contracts with a higher likelihood of overpayments (Government Accountability Office 2016). Although CMS has released the final results only for the RADV audits of 2007 data, OIG has been conducting compliance audits (independent of CMS's RADV audits) for many MA contracts (see text box on OIG's audits of specific diagnosis codes, p. 364).

## Quality in MA is difficult to evaluate

By statute, since 2012, Medicare uses a quality bonus program (QBP) that rates MA plans based on a 5-star system and provides bonuses to plans rated 4 stars or higher. The 5 -star system, which predates the QBP, is also the basis of information that beneficiaries receive about MA plan quality through the medicare.gov Plan Finder website. Over the years, the Commission has determined that the QBP is flawed and does not provide a reliable basis for evaluating quality across MA plans in meaningful ways; plans have also received unwarranted bonus payments under the QBP system

## Office of Inspector General's compliance audits of specific diagnosis codes

The Department of Health and Human Services Office of Inspector General (OIG) has broad authority to conduct oversight of CMS's operations. During 2021 and 2022, OIG audited the diagnostic data of 20 Medicare Advantage (MA) contracts and made recommendations for overpayment recovery by CMS. ${ }^{69}$ OIG then tracked and reported on CMS's overpayment recoveries in the aggregate. Although we do not know the status of overpayment recovery amounts based on OIG's audits and recommendations, the audit findings show significant discordance between plansubmitted data used for payment and program rules requiring that diagnoses be supported in a patient's medical record.

Three audits focused on all diagnoses submitted by the contract for a single payment year and found overpayment amounts representing between 1 percent and 7 percent of the payments in the audit sample. Although the overpayment rates were relatively low, for two of the audits OIG recommended recovering an overpayment
amount based on payments for the entire contract, resulting in the largest overpayment recovery recommendations of $\$ 198$ million and $\$ 54$ million.

The other 17 audits focused on codes for "highrisk conditions" that were identified as being more likely to be miscoded. These audits generally evaluated two years of diagnostic data. Audits of high-risk conditions found overpayment amounts representing between 54 percent and 78 percent of the payments under audit, except for one audit of high-risk conditions in which OIG found a 5 percent overpayment rate. Overpayment recovery amounts were based on payments for the entire contract, except one audit for which the recommended overpayment recovery amount was based only on overpayments identified in the audit sample. For overpayment recoveries for entire contracts, OIG recommended recovering between $\$ 1.8$ million and $\$ 9.2$ million in overpayments for 14 audits, $\$ 14.5$ million for one audit, and $\$ 34.4$ million for another audit.
(Medicare Payment Advisory Commission 2019a, Medicare Payment Advisory Commission 2018a). The current state of quality reporting is such that the Commission's yearly updates can no longer provide an accurate description of the quality of care across MA plans. Under the coronavirus PHE, CMS relaxed quality reporting rules for 2020, boosting 2022 star ratings for many plans and generating a windfall for some plans. Star ratings subsequently dropped in 2023 when quality reporting returned to pre-PHE rules (see text box on quality bonuses under the coronavirus PHE, p. 365).

Comparative assessments could help in evaluating MA performance and changes in performance over time, in evaluating payment policy in MA, and in determining the adequacy and appropriateness of the standards applied to MA plans (for example, by using quality results as an indirect measure of network adequacy in

MA plans). The ability to compare MA and FFS quality, and to compare quality across MA plans, is important for beneficiaries. Choosing between MA and FFS is a threshold choice that beneficiaries make before getting to the step of deciding among available MA plans (see text box on comparisons of MA and FFS quality and outcomes, pp. 366-368). Unfortunately, star ratings for most plans are based on data from geographically dispersed areas and therefore do not provide meaningful information about the quality of care providers furnish in beneficiaries' local areas.

One recent study assessed plan performance on nine claims-based measures and compared changes for MA plans before and after the introduction of the QBP with changes for commercial plans (plans covering the employer group and other markets that are not eligible to participate in the Medicare QBP). The authors found

## Quality bonuses under the coronavirus public health emergency (PHE)

Despite the substantial flaws in the quality bonus program, the program significantly boosts payments to Medicare Advantage (MA) plans each year. Our prior analyses have shown that these increases in plan revenue did not result in dollar-for-dollar increases in extra benefits. In fact, most of the extra dollars from quality bonus payments were not used to provide extra benefits to MA enrollees (Medicare Payment Advisory Commission 2020). Figure 11-12 shows that the share of MA enrollees in plans receiving a bonus benchmark (by achieving a star rating of 4 stars or higher) has increased since the start of the program in 2015. Although the Congress limited plans' incentive to use contract consolidations to artificially increase star ratings, the Commission has reported that contract consolidations are responsible for many of the star rating increases over the period shown in Figure 11-12 (Medicare Payment Advisory Commission 2020). In the first year of the coronavirus public
health emergency, CMS relaxed quality reporting rules for 2020, allowing plans to apply the higher of 2019 or 2020 quality results for measures making up about 40 percent of 2022 star ratings (Health Management Associates 2021). The 2022 star ratings were used by Medicare beneficiaries to make their coverage decisions for 2022 and have been used in the calculation of 2023 payment rates. The reporting flexibility resulted in an unprecedented 90 percent of MA enrollees being enrolled in an MA plan that received a bonus benchmark increase. Although many of these plans would have received a quality bonus without the reporting flexibility, a number of plans appear to have achieved a quality bonus only because of the relaxed reporting rules, and these plans are receiving a windfall in 2023. The prior rules for quality reporting were reinstated for 2023 star ratings (which will be used for 2024 payments), and the share of MA enrollees in a 4 -star or higher plan fell to 72 percent, lower than in the previous five years.

In 2022, the share of MA enrollees in plans rated 4 stars or higher reached about 90 percent due to reporting flexibility during the PHE


[^25][^26]
## Mixed findings on comparisons of FFS and MA quality and outcomes

Good information on the quality of care that Medicare Advantage (MA) enrollees (49 percent of eligible Medicare beneficiaries) receive and how that quality compares with quality in fee-for-service (FFS) Medicare, including in accountable care organizations, is necessary for beneficiaries and policymakers to properly evaluate the program and plan options. MA plans have a number of management tools that are not available in FFS but permit plans to improve the quality of care for their enrollees-tools such as selective contracting, care management, information systems shared across providers, and utilization management that can prevent overuse of potentially harmful care. These tools give MA the potential to improve quality relative to FFS, but methodological challenges and a lack of sufficient data severely limit any definitive comparisons between MA and FFS Medicare.

There are several challenges that policymakers and researchers face in measuring the quality of care and outcomes of beneficiaries enrolled in either MA or FFS. First, many of the currently available clinical process or intermediate outcome measures (e.g., colorectal cancer screening, controlling high blood pressure) that MA plans report to CMS as a part of the 5-star rating system require plans to use clinical data to calculate results. The Medicare program cannot currently access this level of clinical information from FFS providers, so FFS and MA comparisons are limited.

Second, Medicare can calculate some quality outcome measures (e.g., hospital readmissions, mortality) using FFS administrative claims data; however, plan-submitted data about beneficiaries' health care encounters are incomplete, which results in less reliable MA plan outcome calculations. For example, MA inpatient admissions captured in Medicare Provider Analysis and Review (MedPAR) and encounter data incompletely overlap, so neither data source is complete. Also, most plans' reporting of office visits, emergency department visits, and inpatient admissions in patient-level Health

Effectiveness Data Information Set ${ }^{\circledR}$ (HEDIS ${ }^{\circledR}$ ) data does not match their reporting through encounter records. ${ }^{70}$ In 2015, only 27 percent of MA plans reported a total number of inpatient stays for their enrollees in HEDIS data that was within 10 percent of the number reported in encounter data (Medicare Payment Advisory Commission 2019a).

Third, favorable selection of beneficiaries who choose to either switch from FFS to MA or vice versa may create bias in analysis comparing MA and FFS quality and outcomes. As mentioned earlier in the chapter (p. 351), the Commission will continue to study the effects of selection bias when evaluating MA.

Finally, greater diagnostic coding intensity among MA plans can make MA enrollees appear sicker than they would under FFS Medicare coding practices, thus making MA plans appear unduly better on quality measures that use diagnosis codes to risk adjust outcomes or to identify populations eligible for quality measurement.

Simple comparisons that do not control for unobserved differences between MA and FFS populations will be misleading. Yet, even after controlling for sources of variation such as patient characteristics and health status, unobserved confounding may still be present. More advanced statistical methods could help address some concerns about confounding, but these methods have other limitations. Perhaps more importantly, MA plans may vary in the quality of care they provide, and that quality may change over time. So even if all the statistical (and data) concerns could be addressed, definitive comparisons of the quality of care under MA and FFS may remain elusive.

Notwithstanding the limitations in addressing these challenges, researchers have used a variety of data sources, methods, and measures of quality and outcomes to try to compare MA with FFS. The results are mixed. Three systematic reviews of the literature comparing MA and FFS quality and other

## Mixed findings on comparisons of FFS and MA quality and outcomes (cont.)

areas such as spending and health care disparities were published in recent years (Agarwal et al. 2021, DuGoff et al. 2021, Ochieng and Fuglesten Biniek 2022). Although there are some differences in the methodologies and literature highlighted among the three studies, the high-level findings are generally consistent: The results of MA and FFS quality and outcomes comparisons are heterogeneous. In particular, research comparing hospital readmissions, mortality, and patient experience measures did not show a consistent pattern or trend of better performance in MA plans than traditional (FFS) Medicare. ${ }^{71}$

- Clinical process measures: Two of the literature reviews analyzed studies that compared clinical process quality measures between MA and traditional Medicare. They generally find that MA plans perform better on these measures. Specifically, Agarwal and colleagues identified nine studies that compared MA and FFS performance on clinical process measures focused on preventive care and other screenings (Agarwal et al. 2021). Two-thirds of those studies demonstrated better performance by MA relative to FFS on most of the measures. For example, three studies found that MA performed significantly better than FFS on breast cancer screening (Ayanian et al. 2013a, Ayanian et al. 2013b, Hung et al. 2016). Another study found that MA outperformed FFS on several clinical process measures, including breast cancer screening, diabetic eye examinations, diabetic cholesterol tests, and cholesterol screening for patients with cardiac care (Timbie et al. 2017). Similarly, Ochieng and Fuglesten Biniek identified seven studies comparing receipt of preventive care among beneficiaries in MA and traditional Medicare, and MA enrollees generally reported higher rates of preventive screening services. For example, in three studies, a larger share of MA enrollees than traditional Medicare beneficiaries reported colorectal and breast cancer screenings and blood pressure screening (Johnston et al. 2021, Park et al. 2020, Timbie et al. 2017).
- Hospital readmissions: All three literature reviews analyzed studies that examined rates of hospital readmissions between MA and FFS. The authors came to slightly different conclusions, but a finding across all the reviews is that the literature did not show a consistent pattern or trend of better performance in MA plans than traditional Medicare.

Agarwal and colleagues identified 11 studies that compared readmission rates for MA and traditional Medicare beneficiaries (Agarwal et al. 2021). Five studies showed lower readmission rates for MA compared with FFS, two studies found higher readmission rates for MA, and four of the studies found no differences in readmission rates. Ochieng and Fuglesten Biniek's review included 12 studies that compared hospital readmission rates (Ochieng and Fuglesten Biniek 2022). Seven of these studies generally found lower rates in MA than traditional Medicare. Four studies that were more limited in scope found similar rates of readmission between traditional Medicare and MA. DuGoff and colleagues reviewed 7 studies using 38 analyses to compare readmission rates in MA and traditional Medicare (DuGoff et al. 2021). Twelve of the 38 analyses found a statistically significant relationship in favor of MA; however, 22 analyses did not find any statistically significant difference. All the literature reviews highlighted a study that used administrative data along with HEDIS beneficiary-level data and found that MA beneficiaries had higher risk-adjusted 30-day readmission rates than traditional Medicare beneficiaries for three common medical conditions (Panagiotou et al. 2019).

- Mortality: Two of the literature reviews analyzed and summarized the small number of studies they identified as comparing mortality in MA and traditional Medicare populations (Agarwal et al. 2021, DuGoff et al. 2021). Beveridge and colleagues showed that beneficiaries in MA were less likely to die than would be predicted had those
(continued next page)


## Mixed findings on comparisons of FFS and MA quality and outcomes (cont.)

beneficiaries enrolled in traditional Medicare (Beveridge et al. 2017). An earlier study not included in these literature reviews also found this result (Afendulis et al. 2013). Another study found that the adjusted mortality rate of a cohort newly enrolled in MA was initially well below that of a cohort newly enrolled in traditional Medicare, but the difference had diminished markedly, though not completely, after five years (Newhouse et al. 2019).

Similar to the Newhouse study (Newhouse et al. 2019), a study released after the three literature reviews were published found that enrollment in MA was associated with modestly lower rates of 30-day mortality following acute myocardial infarction in 2009, but the rates converged and were no longer statistically significant by 2018 (Landon et al. 2022). This finding could thus suggest that mortality differences observed by earlier studies may also have diminished over time (at least for this one condition). ${ }^{72}$

- Patient experience: Two of the literature reviews included studies that examined aspects of beneficiaries' experiences with MA and traditional Medicare, including satisfaction with care. Agarwal and colleagues reviewed six studies that compared the experiences of beneficiaries in MA and traditional Medicare and concluded that the evidence on experience of care did not show a trend of better performance for MA plans than traditional Medicare (Agarwal et al. 2021).

Ochieng and Fuglesten Biniek reviewed 16 studies that examined various aspects of beneficiaries' experiences, including satisfaction with care, access to care, and care coordination (Ochieng and Fuglesten Biniek 2022). Overall, MA enrollees and traditional Medicare beneficiaries reported similar levels of satisfaction with care. Ochieng and Fuglesten Biniek also reported inconsistent findings among studies that examined the share of MA enrollees and traditional Medicare beneficiaries who reported difficulty getting needed health care. MA enrollees and traditional Medicare beneficiaries reported similar experiences on measures of care coordination overall.

We have described the literature reviews and the studies they examined as they are reported in the health services research literature. We report their conclusions at face value, whether the findings suggest MA performs better, FFS performs better, or the results are mixed. However, these studies have some of the data and methodological limitations noted earlier, which tend to introduce bias in favor of MA. Therefore, the Commission has taken the position that we cannot yet make rigorous comparisons of quality and outcomes between MA and FFS given these limitations, and we continue to have concerns about the MA quality bonus program that we have discussed at length in prior reports (Medicare Payment Advisory Commission 2020, Medicare Payment Advisory Commission 2019a).
no overall differences in quality between the MA and commercial plans and observed little evidence that the QBP was associated with improvements in quality performance for MA enrollees (Markovitz et al. 2021).

## A new MA value incentive program

In our June 2019 report to the Congress, the Commission discussed ways to apply our quality principles to the MA program through a value incentive
program (Medicare Payment Advisory Commission 2019a). In the June 2020 report to the Congress, the Commission recommended replacing the quality bonus program with a value incentive program that incorporates the following key features:

- Use of a small set of population-based outcome and patient/enrollee experience measures that, where practical, align across all Medicare-accountable entities and providers, including MA plans and

ACOs. To avoid undue burden on providers, measures should be calculated or administered largely by CMS, preferably with data that are already reported, such as claims and encounter data.

- Evaluation of health care quality at the local market level to provide beneficiaries with information about quality in their local area and provide MA plans with incentives to improve quality in every geographic area.
- Quality measurement against a continuous scale of performance that clearly provides the incentive to improve quality at every level.
- Accounting for differences in enrollees' social risk factors by stratifying plan enrollment into groups of beneficiaries with similar social risk profiles so that plans with higher shares of these enrollees are not disadvantaged in their ability to receive qualitybased payments, while actual differences in the quality of care are not masked.
- Application of budget-neutral financing so that the MA quality system is more consistent with Medicare's FFS quality payment programs, which are either budget neutral (financed by reducing payments per unit of service) or produce program savings because they involve penalties (Medicare Payment Advisory Commission 2020).


## Endnotes

1 CMS includes FFS-claim administrative costs in MA benchmarks, which account for about 0.14 percent of FFS spending (Centers for Medicare \& Medicaid Services 2021a). Expenses for FFS-claim administration are included in our comparison of FFS spending with MA payments and differ from the expenses found in Medicare's Trustees' report, which include the administration and oversight of the MA program and the enrollment of all Medicare providers (which is required for contracting with MA plans). The Medicare Trustees reported that administrative expenses (including those for MA enrollees) accounted for 1.04 percent of CMS's total Medicare benefit costs in 2020 (Boards of Trustees 2021).

2 Payments described here do not apply to the relatively small number of enrollees with end-stage renal disease (ESRD). How Medicare pays MA plans for enrollees with ESRD is described in the Commission's March 2021 report under "Medicare payments to MA plans differ for ESRD and nonESRD enrollees" (Medicare Payment Advisory Commission 2021c).

3 Plans' benefits may include a premium for mandatory supplemental benefits that cover all enrollees. Additionally, plans may offer optional supplemental benefits. Plans are not permitted to apply rebate dollars toward optional supplemental benefits. In addition, optional supplemental benefits cannot include reduced cost sharing for Medicare Part A and Part B services.

4 Benchmarks are calculated using FFS spending for all Medicare beneficiaries, including those with both Part A and Part B coverage and those with only Part A or Part B. In our March 2017 report to the Congress, we recommended that CMS change the calculation to include FFS spending for only those beneficiaries with both Part A and Part B coverage (that is, expenditures for only those beneficiaries eligible to enroll in MA plans) (Medicare Payment Advisory Commission 2017). This change would make the assumptions about FFS spending in the calculation of MA benchmarks and payments more reflective of the MA-eligible population.

5 The ACA caps any county's benchmark at the higher of (1) its pre-ACA level, projected into the future with a legislatively modified national growth factor, or (2) 100 percent of its estimated FFS spending in the current year. Our March 2016 report to the Congress provides more detail on doublebonus counties and benchmark growth caps. In that report, we recommended eliminating the double bonuses as well as the benchmark growth caps, which limited the benchmarks in many counties (Medicare Payment Advisory Commission 2016).

6 Before 2022, MA plans also submitted diagnostic information through the Risk Adjustment Processing System (RAPS). The use of RAPS data was phased out from 2016 through 2021, except for contracts in the Program of All-Inclusive Care for the Elderly, which continue to use pooled RAPS and encounter data as the source of diagnostic data for risk scores.

7 Other possible sources of diagnostic information-such as encounters for home health services, skilled nursing, ambulatory surgery, durable medical equipment, lab and imaging tests, and hospice services-are not used to determine payment through the risk-adjustment model for several reasons: (1) adding diagnoses from these sources does not improve the model's ability to predict medical expenditures; (2) concerns exist about the reliability of diagnoses from providers with less clinical training (e.g., home health and durable medical equipment providers); and (3) a high proportion of reported diagnoses from certain settings (e.g., lab and imaging tests) are used to rule out having a diagnosis.

8 Although Medicare has contracted with private plans since 1966, prior to 1985 nearly all contracts used costbased payment rates or used risk-based payment but were administered through a demonstration project. We identify the 1985 enactment of the Tax Equity and Fiscal Responsibility Act of 1982 (TEFRA) as the introduction of private plan contracting in Medicare with payment rates set on a full risk basis (Zarabozo 2000).

9 One study found that additional benefits and limits on out-of-pocket spending were the two leading reasons that MA enrollees chose an MA plan (Leonard et al. 2022).

10 The Commission's previous work suggests that, although some beneficiaries enroll in MA immediately upon becoming eligible, most MA enrollees initially enroll in FFS Medicare and subsequently move to MA. For more on enrollment patterns, see our March 2015 report (Medicare Payment Advisory Commission 2015).

11 In 2018, most beneficiaries who purchased Medigap supplemental insurance chose the most comprehensive supplemental coverage options, which generally have the highest premiums. For more information on Medigap enrollment, see our July 2021 data book (Medicare Payment Advisory Commission 2021a).

12 Beneficiaries are guaranteed access to a Medigap supplemental insurance policy with no underwriting, even if they have a preexisting condition, if they purchase it during
the 6-month Medigap open-enrollment period that begins on the first day a beneficiary is both 65 years old and enrolled in Medicare Part B. Beneficiaries have only one Medigap open enrollment period. Except for in limited circumstances, access to a Medigap policy is not guaranteed in most states after the Medigap open-enrollment period ends. Only four states require guaranteed-issue protections for aged (65 and over) beneficiaries in traditional Medicare, regardless of medical history. Under these protections, insurers cannot deny a Medigap policy to applicants based on preexisting conditions (Boccuti et al. 2018).

13 The availability of zero-premium local PPOs may have contributed to the increase in local PPO enrollment in 2022. For example, 87 percent of Medicare beneficiaries had an available zero-premium local PPO in 2022, up from 82 percent in 2021.

14 In 2022, 14 percent of MA enrollees and 21 percent of FFS enrollees resided in rural areas.

15 The top three organizations nationally also had the highest market share within both urban areas and rural areas in 2022. In urban areas, the top three organizations covered 55 percent of the MA enrollees (unchanged from 2021). In rural areas, the top three organizations accounted for 64 percent of the MA enrollees (unchanged from 2021).

16 In 2022, 15 percent of MA enrollees were eligible for Medicaid and enrolled in dual-eligible SNPs (D-SNPs). While the national D-SNP market is more concentrated than the overall MA market (the three largest D-SNPs had 63 percent of enrollment), only two of the three largest national MA organizations were also among the top three D-SNP organizations.

17 The Herfindahl-Hirschman Index is calculated by squaring the market share of each entity competing in the market and summing the results. The index approaches zero when a market is occupied by a large number of firms of relatively equal size; the index reaches its maximum of 10,000 points when a market is controlled by a single firm. The index rises both as the number of firms in the market drops and as the disparity in size among those firms increases. Under Department of Justice guidelines, markets with an index below 1,500 are considered unconcentrated; those with an index between 1,500 and 2,500 are considered moderately concentrated; and those above 2,500 are considered highly concentrated (Department of Justice and the Federal Trade Commission 2010).

18 Our measurement of beneficiary access to plans uses 2023 plan bids and July 2022 county-level enrollment for the Medicare population with both Part A and Part B coverage.

19 The increasing availability of zero-premium plans in recent years has largely been driven by the availability of zeropremium local PPOs. Between 2019 and 2023, the availability of zero-premium local PPOs increased from 69 percent of Medicare beneficiaries to 96 percent, and the availability of zero-premium HMOs increased from 86 percent to 98 percent.

20 In 2023, MA plans (excluding SNP and employer group plans) project that the average enrollee will have a Part B premium reduction of about $\$ 5$. Among the 9 percent of enrollees projected to be in a plan with any Part B premium reduction, Part B premiums will be reduced by an average of $\$ 75$. About 5 percent of enrollees in these plans will have the entire base amount of their Part B premium covered (the maximum possible Part B premium reduction). Compared with plans that did not offer any Part B premium reduction, per enrollee rebates will be about 25 percent higher in 2023 for plans that offered any Part B premium reductions, and per enrollee non-Medicare supplemental benefits will be about 5 percent higher.

21 Despite the large availability of MA plans, concerns have been raised about whether beneficiaries understand or are aware of their array of choices. One analysis of online plan insurance agents across five markets found that, on average, agents offered less than half of available MA plans to beneficiaries (Ali et al. 2021).

22 Beneficiaries in some parts of the country have access to Section 1876 cost-reimbursed HMOs. Such plans arrange for the full range of Medicare services. They receive reasonable cost reimbursement for Part B physician and supplier services, but the Medicare program pays providers directly for inpatient and outpatient institutional services. Enrollees in cost plans are not locked into the plan and can receive any out-of-network services, which Medicare pays for. By statute, cost plans cannot operate in areas where there are at least two competing MA CCPs that meet a minimum enrollment requirement.

23 A plan's benchmark can change based on factors such as changes in a plan's average quartile adjustment, quality rating, and coding intensity.

24 Federal regulations require MA plans to submit encounter records for all items and services provided to enrollees (42 CFR § 422.310(b)), including items and services provided through supplemental benefits; however, CMS's Encounter Data Submission and Processing guidance limits that requirement to supplemental services for which the plan has sufficient data to populate an encounter record. In addition, CMS systems are able to accept "professional" and "institutional" claim formats, which allow for the collection of some supplemental services, but CMS is not equipped
to accept dental claims. Further, reimbursement for many supplemental benefits does not use any claim format (e.g., fitness, meals, transportation, pest control), meaning there is no standard way for plans to submit information about the use of such benefits.

25 Among all nonemployer plans (including SNPs and plans that do not offer prescription drug coverage), 2023 rebates are projected to average $\$ 206$ per enrollee per month.

26 In 2023, plans project that 13 percent of the rebate dollars used for cost-sharing reductions will be allocated for plan administrative costs and profit. Among dual-eligible SNPs, 17 percent of the plan-projected rebate dollars used for cost-sharing reductions is projected to be allocated for plan administrative costs and profit.

27 CMS generally expects MA plans to use their rebate dollars to cover the beneficiary cap on out-of-pocket expenses. Thus, the plan liability for the out-of-pocket cap would be part of the cost-sharing reductions category. In 2023, plans project that their liability for the out-of-pocket cap will be $\$ 12$ per enrollee per month-equivalent to 6 percent of rebates and 1 percent of projected plan payments. The plan liability for the out-of-pocket cap is generally not comparable with FFS spending because most beneficiaries in FFS have supplemental insurance and are unlikely to have cost-sharing expenses that exceed the out-of-pocket cap for MA enrollees. In addition, MA enrollees are prohibited from purchasing Medigap coverage, and MA plans are expected to provide supplemental benefits in lieu of Medigap coverage.

28 In 2019, 77 percent of Medigap enrollees had either firstdollar coverage or first-dollar coverage after the \$185 Part B deductible.

29 In 2023, open enrollment MA plans (excluding employer plans and SNPs) project that 14 percent of the rebate dollars used for non-Medicare-covered supplemental benefits will be allocated for plan administrative costs and profit. Among all nonemployer plans (including SNPs), 16 percent of the planprojected rebate dollars used for non-Medicare-covered supplemental benefits is projected to be allocated for plan administrative costs and profit. Among dual-eligible SNPs, 17 percent of the plan-projected rebate dollars used for non-Medicare-covered supplemental benefits is projected to be allocated for plan administrative costs and profit.

30 Beginning in 2019, CMS relaxed one of the criteria for eligible supplemental benefits-that the benefit be primarily health related-to include items and services that are used to diagnose, compensate for physical impairments, ameliorate the functional and psychological impact of injuries or health conditions, and reduce avoidable emergency and health care utilization. A supplemental benefit is not primarily health
related if it is an item or service that is solely or primarily used for cosmetic, comfort, or general use purposes or to address social determinants of health. The degree of projected spending for new types of supplemental benefits is not available in plan bid data.

31 When submitting Part C bids, MA plans do not allocate administrative expenses or margins for Part D premium buydowns or Part D supplemental benefits. However, plans may allocate administrative expenses and margin for these benefits when including these rebates as Part D revenues in their Part D bids.

32 In prior years, when employer plan bids were included in the bid data, we found that employer plan margins were higher than the margins of other MA plans (Medicare Payment Advisory Commission 2016).

33 Margins are calculated as the remainder of payments to the plan after accounting for all other costs, including all medical expenses, salaries, bonuses, beneficiary incentive payments, and all administrative costs. As in prior years, we removed contracts that reported medical expenses equal to or greater than their stated plan revenues for that year (i.e., contracts reporting insufficient revenue to cover benefits and any administrative expenses). We identified these outliers at the contract level to account for plans that other MA plans could be subsidizing (i.e., product pairing) within the same service area. CMS requires MA plans with negative margins to submit a business plan to achieve profitability and expects MA plans to meet or exceed the year-by-year margin targets in the business plan.

34 MA plans annually report their medical loss ratios (MLRs) to CMS, which differ from our MLR estimate because plans can include quality improvement and fraud reduction activities as medical expenses when submitting their MLRs. Plans are subject to financial and other penalties for failure to meet the statutory requirement that they have an MLR of at least 85 percent. For contract year 2021, plans submitted MLRs to CMS in December 2022, and CMS will begin subtracting amounts from regular monthly plan payments in July 2023 to recoup any revenue difference between a plan's actual MLR and the 85 percent minimum MLR.

35 As noted in our March 2018 report to the Congress, the large difference in margins between for-profit and nonprofit entities could be because the bid data do not include employer group plans (Medicare Payment Advisory Commission 2018c).

36 The 1 percentage point increase in benchmarks relative to FFS spending from 2022 to 2023 is somewhat attributable to an increase in the share of MA enrollees who are projected
to be in a plan that received a quality bonus increase to their benchmarks. Although the share of enrollees in plans receiving a quality bonus increased by 13 percentage points between 2022 and 2023, the overall impact on benchmarks was small. In 2024, the share of MA enrollees in a quality bonus plan is projected to decrease to levels somewhat below those in 2022.

37 Apart from plan efficiencies relative to expected FFS spending, part of the drop in bids relative to FFS spending reflects MA's higher coding of diagnoses. In addition, as MA plans enroll a greater share of enrollees, these beneficiaries could have lower expected spending relative to their risk score. Furthermore, FFS alternative payment model incentive payments are a very small but increasing part of benchmarks. Although Medicare's financial targets for accountable care organizations do not include shared savings payments, these payments are included in MA benchmarks. The Medicare program effectively pays shared savings to both accountable care organizations and MA plans (through higher benchmarks).

38 To account for coding differences in 2023, we conservatively assume that the impact of coding intensity in 2023 is the same as in 2021. The coding intensity trend from 2017 to 2021 suggests that the impact in 2023 may be higher than in 2021. We will continue to evaluate this trend. Our estimate of MA payments relative to FFS spending does not account for other potential factors that are more difficult to measure with certainty, including how benchmark quartiles and plan bids and payments would have changed if calculating FFS spending using only beneficiaries with both Part A and Part B. In addition, we have observed a potentially large risk-adjusted spending effect from favorable selection of beneficiaries who choose to either switch from FFS to MA or exit MA. We will continue to evaluate this issue and consider it for inclusion in future analyses. Furthermore, our analysis does not include secondary effects with far less certainty, such as the potential spillover of provider behavior that can occur from large increases in MA market share into FFS or potential spillover from FFS alternative payment models into MA, and any effect of MA and FFS improper payments found retrospectively.

39 Consistent with our analysis in 2022, we conservatively assumed employer plan enrollment growth of 3.5 percent from 2022 to 2023, which is lower than the enrollment growth of employer plans in most recent years. In addition, we calculated the overall risk score ratio of employer plans to other MA plans in 2020 (reflecting diagnoses documented in 2019), and we applied this ratio to the average risk score in 2023 MA bids.

40 CMS projects the average risk-standardized spending for all non-ESRD FFS beneficiaries in each county-including beneficiaries who are not eligible to enroll in an MA plan (i.e.,
beneficiaries with only Part A or Part B coverage). Along with claims payments, FFS spending estimates include provider settlements (e.g., cost report settlements) and alternative payment model incentive payments (e.g., shared savings for accountable care organizations).

41 Each of the 4 FFS ranges covers the bids of at least 700 plans that include at least 4.3 million projected enrollees.

42 Our review of private plan payments suggests that over a 38-year history, the many iterations of full-risk contracting with private plans have never yielded aggregate savings for the Medicare program. Throughout the history of Medicare managed care, the program has paid more-sometimes much more-than it would have paid for beneficiaries to have remained in FFS Medicare (Medicare Payment Advisory Commission 2022).

43 MA bid data are generally not available to nongovernment entities, causing other estimates of MA spending to rely on samples of MA data based on availability and convenience.

44 While statute limits the amount of indirect medical education payments that can be removed from MA rates (affecting two counties in 2023), we incorporate CMS's entire estimate of indirect medical education payments in the MA rate book.

45 Inpatient hospital, outpatient hospital, and physician claims are used in risk adjustment. Most diagnoses that are eligible for risk adjustment are documented on physician claims, which in FFS Medicare rely on procedure codes rather than diagnostic codes to determine payment amounts.

46 The Commission's estimate of the impact of coding differences accounts for differences in age, sex, enrollment type, and length of enrollment in both Medicare Part A and Part B.

47 The complete set of data sources necessary for the retrospective analysis is available only for 2016 through 2019. Provider settlement data are not available before 2016, and the most recent MA plan payment data are for 2019.

48 We required the analytic population to meet all criteria for all months in each year. We excluded enrollee months and spending occurring after an MA enrollee elected hospice and had to disenroll from their plan.

49 Measured by the number of months enrolled, our analysis included 88 percent of the MA population and 89 percent of the FFS population.

50 When an MA plan's contracted rate for an FQHC is less than the Medicare prospective payment system rate, Medicare
pays the FQHC the difference, less any cost-sharing amounts owed by the MA enrollee.

51 CMS reports provider settlement amounts on a national basis, and CMS reports provider incentive payments and medical education payments on a county basis. To estimate provider settlements at the county level, we distributed national settlement amounts using the county distribution of Part A and Part B spending for our study population. In addition, we excluded provider settlement amounts and alternative payment model incentive payments that would have been made for beneficiaries with Part A only, Part B only, ESRD, or Medicare as a secondary payer. Also, we removed medical education payments using CMS's county-level medical education payment file and similarly adjusted the amount to remove payments for beneficiaries with Part A only, Part B only, ESRD, or Medicare as a secondary payer. Further, we used CMS's most recent estimate of administrative claims cost, which is 0.14 percent of FFS spending during the year.

52 For counties with fewer than 12,000 FFS months, we applied a credibility adjustment similar to CMS's method when calculating FFS spending for MA benchmarks. For urban counties with fewer than 12,000 FFS months, we blended county spending with the average risk-standardized spending of the county's metropolitan statistical area. For nonurban counties with fewer than 12,000 FFS months, we blended county spending with the average risk-standardized spending of the county's health service area (as defined by the National Center for Health Statistics). This broader market definition is consistent with the Commission's recent MA analyses (Medicare Payment Advisory Commission 2021b, Medicare Payment Advisory Commission 2020).

53 We first reported 2022 results using the updated method in Table 12-6 of MedPAC's March 2022 report. Under the revised prospective method, we include employer plans using actual employer plan payment rates, actual enrollment from the prior year (updated to the payment year by assuming a 3.5 percent growth in enrollment), and we multiply the actual historical risk ratio of employer plans to other MA plans by the average risk score in MA bids. Under the revised method, we incorporate plans' secondary payer adjustment to their risk scores when calculating our FFS spending estimate. In our original published analyses, this adjustment was applied to MA payments but not to risk-standardized FFS spending.

54 The revised estimates increased the MA-to-FFS spending ratio by about 1 percentage point in each year and first appeared in Figure 12-3 of the March 2022 report.

55 One study comparing 2019 MA payments with FFS spending for MA-eligible beneficiaries (those with both Part A and Part B coverage) found that MA payments were approximately 103
percent of spending per person for comparable beneficiaries in FFS (Fuglesten Biniek et al. 2021).

56 For more detail about administrative expenses that are not clearly attributable to FFS Medicare spending, see the line items under "Administrative expenses" in the 2019 Medicare Trustees Report, p. 44 for the Hospital Insurance Trust Fund and p. 76 for the Supplementary Medical Insurance Trust Fund (Boards of Trustees 2019).

57 The actual dollar amount a plan will receive for coding a new HCC depends on several additional factors, including the version of the HCC model applied to a beneficiary and factors that affect a plan's base rate. Dollar-value coefficients are standardized relative to average FFS spending before being applied to each plan's base rate. CMS maintains separate HCC models for enrollees who lack a full calendar year of diagnostic data or have end-stage renal disease. A plan's base rate varies according to the plan's bid and the local area's benchmark.

58 We also examined six similar pairs of cohorts for beneficiaries whose first full years in Medicare were 2007 through 2012. Beneficiaries were assessed starting with their first full year of Medicare enrollment, so that the subsequent differences in the risk score growth between the cohort pairs could be attributed to differences in coding.

59 CMS has made adjustments to the risk-adjustment model to better align FFS and MA risk scores. Between 2014 and 2016, CMS phased in a new risk-adjustment model that reduced MA coding intensity by about 2 percentage points to 2.5 percentage points relative to FFS by removing some diagnoses that were found to be coded more aggressively in MA. In 2017, CMS began accounting for Medicaid benefit eligibility more accurately (full, partial, or no benefits status by month), which reduced MA risk scores by about 1 percentage point, eliminating the amount that MA risk scores were unduly higher than FFS due to differing shares of beneficiaries by Medicaid eligibility status.

60 To assess the overall impact of coding differences on payments to MA plans, we built retrospective cohorts of beneficiaries enrolled in either FFS or MA for all of 2021. We tracked each beneficiary backward for as long as they were continuously enrolled in the same program (FFS or MA) or as far back as 2007, the first year that payment to MA plans was based entirely on CMS-HCC risk scores. Our analysis calculated differences in risk score growth by comparing FFS and MA cohorts with the same years of enrollment (e.g., 2007 through 2021, 2008 through 2021), adjusting for differences in age and sex between each FFS and MA cohort.

61 Similar to our overall estimate of coding differences, this contract-level analysis uses retrospective cohorts of 2021 enrollees, tracked backward for as long as they were continuously enrolled in the same program (FFS or MA) or as far back as 2007. The change in risk score for each MA beneficiary, however, is attributed to the MA contract in which the beneficiary was enrolled in 2021, and the comparison population consists of the FFS beneficiaries who live in the counties served by the MA contract. The analysis captures the impact of coding intensity on each contract's 2021 payments.

62 Plans also use chart reviews to submit additional diagnoses when the number of diagnoses identified during an encounter exceeds the number of diagnosis fields on an encounter record.

63 This statement is supported by the legal complaints cited in this section. One complaint includes exhibits of plan documents that detail the financial performance of the plan's chart review program (United States of America v. Anthem 2020).

64 For risk-adjustment data validation audits in 2011, CMS grouped all contracts into high, medium, and low levels of coding intensity and selected 20 high-level, 5 medium-level, and 5 low-level contracts at random.

65 MA plans are also required to report and return selfidentified overpayments. This requirement was suspended while under legal challenge but is now a program requirement again. The most recent data show that MA plans have remitted a relatively small share of estimated MA overpayments. In 2019, the most recent information available, MA plans self-reported and returned a tiny fraction-0.5 percent (amounting to \$44.6 million)-of CMS's estimated MA overpayments that year (Department of Health and Human Services 2019).

66 Other criteria include Part B enrollment for the full data collection year, continuous enrollment in the contract for the full data collection year and January of the payment year, and no end-stage renal disease or hospice status.

67 HCCs newly discovered during the audit that were not submitted for payment offset beneficiary payment error rates but do not result in additional payments to the MA plan because the data were not submitted for payment during the required time period.

68 CMS proposed this method of determining overpayment recovery amounts in 2018 but had not issued a final rule at the time this report was produced (Centers for Medicare \& Medicaid Services 2022, Centers for Medicare \& Medicaid Services 2021b, Centers for Medicare \& Medicaid Services 2018).

69 See the HHS OIG's Office of Audit Services reports and publications website for the 18 audit reports published during 2021 and 2022 identified as MA compliance audits of diagnosis codes. The audits summarized here are for contracts offered by the following organizations: BlueCross BlueShield of Michigan (H9572), Humana (H1036, R5826), Anthem now Elevance Health (H3655), Coventry Health of Missouri / CVS Health (H2663), UPMC (H3907), HealthFirst (H3359), SCAN (H5425), Tufts Health Plan now Point32Health (H2256), People's Health / UnitedHealth Group (H1961), Cariten / Humana (H4461), Cigna HealthSpring of Florida (H5410), WellCare of Florida / Centene (H1032), Regence BlueCross BlueShield of Oregon (H3817), InterValley Health Plan now defunct (H0545), BlueCross BlueShield of Tennessee (H7917), Highmark (H3916), California Physician's Service (H0504), BlueCross BlueShield of Rhode Island (H4152), and Cigna HealthSpring of Tennessee (H4454).

70 HEDIS $^{\circledR}$ is a registered trademark of the National Committee for Quality Assurance.

71 The Commission's principles for quality measurement encourage the use of outcome measures (e.g., readmissions, mortality) as well as patient experience in Medicare quality programs (Medicare Payment Advisory Commission 2018b).

72 One recent study of cancer patients in California found that, from 2000 to 2020, enrollment in MA was associated with higher rates of 30-day mortality following stomach, pancreas, or liver surgery (Raoof et al. 2022).

## References

Afendulis, C. C., M. Chernew, and D. Kessler, Department of Health and Human Services. 2013. The effect of Medicare Advantage on hospital admissions and mortality. https://papers. ssrn.com/sol3/papers.cfm?abstract_id=2276365.

Agarwal, R., J. Connolly, S. Gupta, et al. 2021. Comparing Medicare Advantage and traditional Medicare: A systematic review. Health Affairs 40, no. 6 (June): 937-944.

Ali, R., A. Cicchiello, M. Hanger, et al. 2021. How agents influence Medicare beneficiaries' plan choices. New York, NY: The Commonwealth Fund.

Ayanian, J. Z., B. E. Landon, A. M. Zaslavsky, et al. 2013a. Racial and ethnic differences in use of mammography between Medicare Advantage and traditional Medicare. Journal of the National Cancer Institute 105, no. 24 (December 18): 1891-1896.

Ayanian, J. Z., B. E. Landon, A. M. Zaslavsky, et al. 2013b. Medicare beneficiaries more likely to receive appropriate ambulatory services in HMOs than in traditional medicare. Health Affairs 32, no. 7 (July): 1228-1235.

Beveridge, R. A., S. M. Mendes, A. Caplan, et al. 2017. Mortality differences between traditional Medicare and Medicare Advantage: A risk-adjusted assessment using claims data. Inquiry 54 (January 1): 46958017709103.

Blue Health Intelligence. 2020. Population Advyzer: Take control of your risk adjustment analytics. Learn how artificial intelligence can increase revenue accuracy by $20+\%$. https://www. bluehealthintelligence.com/risk-adjustment/.

Boards of Trustees, Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. 2021. 2021 annual report of the Boards of Trustees of the Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. Washington, DC: Boards of Trustees.

Boards of Trustees, Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. 2019. 2019 annual report of the Boards of Trustees of the Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. Washington, DC: Boards of Trustees.

Boccuti, C., G. Jacobson, K. Orgera, et al. 2018. Medigap enrollment and consumer protections vary across states. Washington, DC: Kaiser Family Foundation. https://www.kff. org/medicare/issue-brief/medigap-enrollment-and-consumer-protections-vary-across-states/.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022. Medicare and Medicaid programs; policy and technical changes to the Medicare Advantage, Medicare Prescription Drug Benefit, Program of All-Inclusive Care for the Elderly (PACE), Medicaid fee-for-fervice, and Medicaid managed care programs for years 2020 and 2021; Extension of timeline to finalize a rulemaking. Proposed rule. Federal Register 87, no. 210 (November 1): 65723-65724.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2021a. Announcement of calendar year (CY) 2022 Medicare Advantage capitation rates and Medicare Advantage and Part D payment policies. January 15.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2021b. Medicare and Medicaid programs; policy and technical changes to the Medicare Advantage, Medicare prescription drug benefit, Program of All-Inclusive Care for the Elderly (PACE), Medicaid fee-for-service, and Medicaid managed care programs for years 2020 and 2021; extension of timeline to finalize a rulemaking. Proposed rule. Federal Register 86, no. 201 (October 21): 58245-58246.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2021c. Report to Congress: Risk adjustment in Medicare Advantage. Baltimore, MD: CMS.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2019. CPI - RADV CON11/12/13 MAO teleconference frequently asked questions (FAQs), July 11, 2019. https://www.cms.gov/files/document/contract-level-radv-datacy-2011-2012-and-2013-auditsfaqs.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2018. Medicare and Medicaid programs; policy and technical changes to the Medicare Advantage, Medicare prescription drug benefit, Program of All-Inclusive Care for the Elderly (PACE), Medicaid fee-for-service, and Medicaid managed care programs for years 2020 and 2021. Final rule. Federal Register 83, no. 212 (November 1): 54982-55088.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2017. Medicare Advantage risk adjustment data validation audits fact sheet, June 1. https://www.cms.gov/ Research-Statistics-Data-and-Systems/Monitoring-Programs/ Medicare-Risk-Adjustment-Data-Validation-Program/Resources. html.

Congressional Budget Office. 2017. Effects of Medicare Advantage enrollment on beneficiary risk scores. Working paper 2017-08. Washington, DC: CBO.

Department of Health and Human Services. 2019. FY 2019 agency financial report. Washington, DC: HHS.

Department of Justice. 2022. United States files civil fraud lawsuit against Cigna for artificially inflating its Medicare Advantage payments. Washington, DC: DOJ. https://www.justice.gov/usao-sdny/pr/united-states-files-civil-fraud-lawsuit-against-cigna-artificially-inflating-its.

Department of Justice and the Federal Trade Commission. 2010. Horizontal merger guideline. Washington, DC: DOJ/FTC. https://www.justice.gov/atr/horizontal-merger-guidelines08192010\#5c.

DuGoff, E., R. Tabak, T. Diduch, et al. 2021. Quality, health, and spending in Medicare Advantage and traditional Medicare. American Journal of Managed Care 27, no. 9 (September): 395400.

Frank, R. G., and C. Milhaupt. 2022. Profits, medical loss ratios, and the ownership structure of Medicare Advantage plans. Los Angeles, CA: USC Schaeffer/Brookings. July 13. https://www. brookings.edu/blog/usc-brookings-schaeffer-on-health-policy/2022/07/13/profits-medical-loss-ratios-and-the-ownership-structure-of-medicare-advantage-plans/.

Fuglesten Biniek, J., J. Cubanski, and T. Neuman. 2021. Higher and faster growing spending per Medicare Advantage enrollee adds to Medicare's solvency and affordability challenges. Issue brief. Washington, DC: Kaiser Family Foundation.

Geruso, M., and T. Layton. 2015. Upcoding: Evidence from Medicare on squishy risk adjustment. NBER working paper no. 21222. Cambridge, MA: National Bureau of Economic Research.

Government Accountability Office. 2016. Fundamental improvements needed in CMS's effort to recover substantial amounts of improper payments. GAO-16-76. Washington, DC: GAO.

Government Accountability Office. 2013. Medicare Advantage: Substantial excess payments underscore need for CMS to improve accuracy of risk score adjustments. Washington, DC: GAO.

Government Accountability Office. 2012. Medicare Advantage: CMS should improve the accuracy of risk score adjustments for diagnostic coding practices. Government Accountability Office report GAO-12-51. Washington, DC: GAO.

Hayford, T. B., and A. L. Burns. 2018. Medicare Advantage enrollment and beneficiary risk scores: Difference-in-differences analyses show increases for all enrollees on account of marketwide changes. Inquiry 55 (January-December): 46958018788640.

Health Management Associates. 2021. 2022 star ratings, an historical year. Washington, DC: HMA. https://www. healthmanagement.com/blog/2022-star-ratings-an-historicalyear/.

Hung, A., B. Stuart, and I. Harris. 2016. The effect of Medicare Advantage enrollment on mammographic screening. American Journal of Managed Care 22, no. 2 (February 1): e53-59.

Jacobs, P. D., and R. Kronick. 2018. Getting what we pay for: How do risk-based payments to Medicare Advantage plans compare with alternative measures of beneficiary health risk? Health Services Research (May 22).

Jacobson, G., T. Neuman, and A. Damico. 2019. Do people who sign up for Medicare Advantage plans have lower Medicare spending? Washington, DC: Kaiser Family Foundation.

Johnston, K. J., G. Hammond, D. J. Meyers, et al. 2021. Association of race and ethnicity and Medicare program type with ambulatory care access and quality measures. JAMA 326, no. 7 (August 17): 628-636.

Kronick, R., and F. M. Chua, Department of Health and Human Services. 2021. Industry-wide and sponsor-specific estimates of Medicare Advantage coding intensity. https://ssrn.com/ abstract=3959446.

Kronick, R., and W. P. Welch. 2014. Measuring coding intensity in the Medicare Advantage program. Medicare \& Medicaid Research Review 4, no. 2.

Landon, B. E., T. S. Anderson, V. E. Curto, et al. 2022. Association of Medicare Advantage vs traditional Medicare with 30-day mortality among patients with acute myocardial infarction. JAMA 328, no. 21 (December 6): 2126-2135.

Leonard, F., G. Jacobson, L. A. Haynes, et al. 2022. Traditional Medicare or Medicare Advantage: How older Americans choose and why. https://www.commonwealthfund.org/publications/ issue-briefs/2022/oct/traditional-medicare-or-advantage-how-older-americans-choose.

Markovitz, A. A., J. Z. Ayanian, D. Sukul, et al. 2021. The Medicare Advantage quality bonus program has not improved plan quality. Health Affairs 40, no. 12 (December): 1918-1925.

McDermott, D., L. Stolyar, C. Cox, et al. 2020. Health insurer financial performance through September 2020. Washington, DC: Kaiser Family Foundation.

McWilliams, J. M., J. Hsu, and J. P. Newhouse. 2012. New riskadjustment system was associated with reduced favorable selection in Medicare Advantage. Health Affairs 31, no. 12 (December): 2630-2640.

Medicare Payment Advisory Commission. 2022. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021a. A data book: Health care spending and the Medicare program. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021b. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2021c. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2020. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2019a. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2019b. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2018a. Comment letter on CMS's proposed rule on the Medicare Advantage program (Part C) and Prescription Drug Benefit program (Part D), January 3.

Medicare Payment Advisory Commission. 2018b. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2018c. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2017. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2016. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2015. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2012a. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2012b. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2010. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2005. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2004. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Newhouse, J. P., M. Price, J. Huang, et al. 2012. Steps to reduce favorable risk selection in Medicare Advantage largely succeeded, boding well for health insurance exchanges. Health Affairs 31, no. 12 (December): 2618-2628.

Newhouse, J. P., M. Price, J. M. McWilliams, et al. 2019. Adjusted mortality rates are lower for Medicare Advantage than traditional Medicare, but the rates converge over time. Health Affairs 38, no. 4 (April): 554-560.

Ochieng, N., and J. Fuglesten Biniek. 2022. Beneficiary experience, affordability, utilization, and quality in Medicare Advantage and traditional Medicare: A review of the literature. Washington, DC: Kaiser Family Foundation. https://www.kff.org/medicare/ report/beneficiary-experience-affordability-utilization-and-quality-in-medicare-advantage-and-traditional-medicare-a-review-of-the-literature/.

Office of Inspector General, Department of Health and Human Services. 2021. Some Medicare Advantage companies leveraged chart reviews and health risk assessments to disproportionately drive payments. Washington, DC: OIG.

Office of Inspector General, Department of Health and Human Services. 2020. Billions in estimated Medicare Advantage payments from diagnoses reported only on health risk assessments raise concerns. OEI-03-17-00471. Washington, DC: OIG.

Office of Inspector General, Department of Health and Human Services. 2019. Billions in estimated Medicare Advantage payments from chart reviews raise concerns. OEI-03-17-00470. Washington, DC: OIG.

Optum. 2020. A smarter retrospective risk adjustment program. Eden Prairie, MN: Optum.

Panagiotou, O. A., A. Kumar, R. Gutman, et al. 2019. Hospital readmission rates in Medicare Advantage and traditional Medicare: A retrospective population-based analysis. Annals of Internal Medicine 171, no. 2 (July 16): 99-106.

Park, S., J. F. Figueroa, P. Fishman, et al. 2020. Primary care utilization and expenditures in traditional Medicare and Medicare Advantage, 2007-2016. Journal of General Internal Medicine 35, no. 8 (August): 2480-2481.

Pope, G. C., J. Kautter, R. P. Ellis, et al. 2004. Risk adjustment of Medicare capitation payments using the CMS-HCC model. Health Care Financing Review 25, no. 4 (Summer): 119-141.

Pope, G. C., J. Kautter, M. J. Ingber, et al. 2011. Evaluation of the CMS-HCC risk adjustment model. Report prepared by RTI International for the Centers for Medicare \& Medicaid Services. Baltimore, MD: CMS.

Raoof, M., P. H. G. Ituarte, S. Haye, et al. 2022. Medicare Advantage: A disadvantage for complex cancer surgery patients. Journal of Clinical Oncology (November 10): JCO2101359.

Schulte, F. 2016. Medicare Advantage audits reveal pervasive overcharges. https://khn.org/news/article/audits-hidden-until-now-reveal-millions-in-medicare-advantage-overcharges/.

Schulte, F., and H. K. Hacker. 2022. Audits-hidden until nowreveal millions in Medicare Advantage overcharges. Kaiser Health News, November 21. https://khn.org/news/article/audits-hidden-until-now-reveal-millions-in-medicare-advantageovercharges/.

Timbie, J. W., A. Bogart, C. L. Damberg, et al. 2017. Medicare Advantage and fee-for-service performance on clinical quality and patient experience measures: Comparisons from three large states. Health Services Research 52, no. 6 (December): 2038-2060.

United States of America ex rel. Benjamin Poehling v. UnitedHealth Group, I., et al. 2016. U.S. District Court for the Central District of California. No. 11-cv-0258-A. https://www. justice.gov/usao-sdny/press-release/file/1262841/download.

United States of America ex rel. James M. Swoben v. Secure Horizons, et al. 2017. U.S. District Court for the Central District of California. No. CV 09-5013 JFW (JEMx). https://www.justice.gov/ usao-sdny/press-release/file/1262841/download.

United States of America v. Anthem, I. 2020. U.S. District Court for the Southern District of New York. No. 1:20-CV-02593. https://www.justice.gov/usao-sdny/press-release/file/1262841/ download.

Zarabozo, C. 2000. Milestones in Medicare managed care. Health Care Financing Review 22, no. 1 (Fall): 61-67.

C H A P TER


The Medicare prescription drug program (Part D): Status report

## C H A P TER

# The Medicare prescription drug program (Part D): Status report 

## Chapter summary

In 2022, Part D paid for outpatient prescription drug coverage on behalf of nearly 50 million Medicare beneficiaries. For Part D plan enrollees, Medicare subsidizes about three-quarters of the cost of basic benefits. Part D also includes a low-income subsidy (LIS) that provides assistance with premiums and cost sharing for more than 13 million individuals with low income and assets.

In 2021, Part D program expenditures totaled $\$ 110.8$ billion, accounting for about 13 percent of Medicare spending. Of that amount, enrollees paid $\$ 14.9$ billion in premiums for basic benefits. Medicare spending for the LIS totaled $\$ 35.1$ billion: $\$ 31.3$ billion for cost sharing and $\$ 3.8$ billion for premiums. Beyond program spending, Part D plan enrollees paid $\$ 17.9$ billion in cost sharing and $\$ 7.5$ billion in premiums for enhanced benefits.

Since its inception in 2006, Part D has changed in important ways. Part D enrollees have greatly expanded their use of generics, while a relatively small share of prescriptions for high-cost biological products (referred to as biologics hereafter) and specialty medications account for a mounting share of spending. A growing share of Medicare's payments has taken the form of cost-based reimbursements to plans through Medicare's reinsurance. As a result, the financial risk that plans bear, as well as their

## In this chapter

- Enrollment and plan choices have continued to grow
- Part D's market dynamics have evolved
- Although moderated by generic use, brand prices have continued to grow
- Reinsurance has accounted for a growing share of program costs
- While most Part D enrollees were satisfied, room for improvement remains
incentives to control costs, has declined markedly. In 2020, the Commission recommended major changes to the Part D benefit design and Medicare's subsidies in order to restore the role of risk-based, capitated payments that was present at the start of the program. In 2022, the Congress passed the Inflation Reduction Act (IRA), which included numerous policies related to prescription drugs; one such provision is a redesign of the Part D benefit with many similarities to the Commission's recommended changes. The changes adopted in the IRA will be implemented over the next several years and are likely to alter the drug-pricing landscape.

About 300 organizations operate Part D plans, but most beneficiaries are enrolled in plans sponsored by a handful of large health insurers. Most of the largest sponsors have their own pharmacy benefit managers (PBMs) that operate mail-order and specialty pharmacies. Formularies (a plan's list of covered drugs) remain plan sponsors' most important tool for managing drug benefits. In Part D, plans and their PBMs reduce benefit costs with postsale rebates and discounts. Generally, pharmaceutical manufacturers pay larger rebates when a sponsor positions a drug on its formulary in a way that increases the likelihood of winning market share over competing drugs. Plan sponsors also use provisions in network contracts with pharmacies that require postsale recoupments or payments for meeting performance metrics. These rebates and pharmacy fees have grown as a share of Part D spending. Going forward, changes in CMS's program rules and changes resulting from the IRA may affect the magnitude of rebates and pharmacy fees.

Enrollment in 2022 and benefit offerings for 2023-In 2022, 77 percent of Medicare beneficiaries were enrolled in Part D plans. An additional 2 percent obtained drug coverage through employer-sponsored plans that received Medicare's retiree drug subsidy. We estimate that among the remaining beneficiaries, just under 10 percent had comparable drug coverage from other sources and less than 12 percent had no coverage or coverage less generous than Part D.

Enrollment in stand-alone prescription drug plans (PDPs) peaked in 2019 at 25.5 million ( 56 percent of total plan enrollment) but fell to 23.3 million in 2022 (47 percent). Enrollment in Medicare Advantage-Prescription Drug plans (MAPDs) surpassed enrollment in PDPs for the first time in 2021 and reached 26.5 million in 2022. Relative to the start of Part D, the number of enrollees who received the LIS has grown more slowly than the broader Part D population,
but their share has stabilized. In 2022, LIS enrollees made up 27 percent of total enrollment compared with 28 percent in 2018.

For 2023, beneficiaries continue to have a broad choice of plans. Plan sponsors offered 3,539 general MA-PDs and 1,254 MA-PDs tailored to specific populations (special needs plans) -5 percent and 11 percent more, respectively, than in 2022. That rapid growth is consistent with MA's expansion described in Chapter 11. In 2023, plan sponsors are offering 804 PDPs, nearly 5 percent more than the previous year.

For 2023, the base beneficiary premium declined by 2 percent from 2022 to $\$ 32.74$, reflecting a small decrease in the total average estimated cost for basic benefits after taking postsale rebates and discounts into account. However, individual plans' premiums vary substantially, with PDPs typically having higher premiums than MA-PDs. In 2023, 191 PDPs, roughly one-quarter of all PDPs, are available premium free to enrollees who receive the LIS, and all regions have at least three premium-free PDPs for LIS enrollees. Most Part D plans use a five-tier formulary with differential cost sharing between preferred and nonpreferred drugs, as well as a specialty tier for high-cost drugs. For 2023, nearly half of all plans had planned to participate in the Senior Savings Model that covers certain insulins at no more than $\$ 35$ for each prescription of a month's supply. Subsequently, the IRA-passed after plan bids for 2023 had already been submitted-required all Part D plans to provide such a benefit for covered insulin products in 2023.

Part D program costs-In 2021, Medicare program spending on Part D (excluding the $\$ 14.9$ billion in premiums paid by enrollees) totaled $\$ 95.9$ billion, up from $\$ 93.0$ billion in 2020 (an increase of 3 percent). Those enrollees whose spending reaches the benefit's catastrophic phase increasingly drive program spending. Medicare's reinsurance (which covers 80 percent of spending in the catastrophic phase of the benefit after rebates) continued to be the largest and fastest-growing component of program spending, totaling \$52.4 billion, or about 55 percent of the total. The value of the average basic benefit paid to plans through the capitated direct subsidy has plummeted in recent years. In 2023, direct subsidy payments average less than $\$ 2$ per member per month, compared with payments of nearly $\$ 94$ per member per month for reinsurance. In 2021, growth in drug prices accelerated, approaching rates observed before the pandemic. Prices of generic drugs declined, which helped moderate overall price growth. However, generics' share of prescriptions has plateaued at about

90 percent since 2017, and further opportunities for generic substitution may be limited, given the shift in the drug development pipeline toward biologics with longer periods of market exclusivity. Inflation in prices for brand-name drugs and biologics will likely continue to drive spending upward unless the program can achieve meaningful savings from the successful launch and adoption of biosimilars by prescribers and beneficiaries. In 2021, about 464,000 enrollees ( 11 percent of high-cost enrollees) filled a prescription that, by itself, was sufficiently expensive to meet the out-of-pocket threshold, up from just 33,000 enrollees in 2010.

Beneficiary access and quality in Part D-According to the 2020 Medicare Current Beneficiary Survey, which is the latest available, 79 percent of Part D enrollees reported overall satisfaction with the program. While satisfaction was quite high regarding the amount paid for drugs, coverage, and participating pharmacies, beneficiaries were less satisfied with the ability to understand the program and the information they received, and 27 percent were not confident their coverage met their needs. Overall, 25 percent of enrollees reported problems with affordability, including 14 percent who did not take their medicine as prescribed because of cost. Although it has long been believed that premiums are paramount among the factors beneficiaries consider when choosing their plan, in 2020 more beneficiaries ( 30 percent) reported considering their out-of-pocket costs than premiums ( 26 percent).

The quality of prescription drug care requires a balance between beneficiary access and medication management. For many conditions, effective treatment may hinge primarily on access and adherence to prescription drugs. For this reason, Medicare evaluates Part D plan formularies and network pharmacies. However, one concern is that among beneficiaries without the LIS, high cost sharing for expensive therapies can be a barrier to access. At the same time, Medicare beneficiaries take an average of nearly five prescription drugs and are at higher risk for adverse drug events associated with polypharmacy. Thus, it is also critically important that Part D plans help to manage medication therapies.

By law, Part D plans are required to carry out medication therapy management (MTM) programs and programs to manage opioid use. Between 2017 and 2021, CMS tested an Enhanced MTM model to see if new payment incentives and regulatory flexibilities would spur PDPs to improve their MTM interventions and reduce Medicare spending. Although an evaluation of the entire five-year demonstration is not yet complete, over the first four years, CMS found no
significant reductions in Medicare spending for Part A and Part B services, a net increase in Medicare spending after accounting for model payments, and mixed effects on quality measures.

## Background

In 2022, the Part D program paid for outpatient prescription drug coverage on behalf of nearly 50 million Medicare beneficiaries. Private Part D plans are available broadly: Dozens of standalone prescription drug plans (PDPs) and Medicare Advantage-Prescription Drug plans (MA-PDs) are offered in every region of the country.

For Part D plan enrollees, Medicare subsidizes about three-quarters of the cost of basic benefits, defined as Part D's standard benefit or benefits with the same average value. Separately, Part D includes a low-income subsidy (LIS) that pays for much of the cost sharing and premiums on behalf of 13.3 million individuals with low income and assets. In 2021, Part D expenditures totaled $\$ 110.8$ billion on an incurred basis, accounting for about 13 percent of Medicare spending (Boards of Trustees 2022). Of that amount, Part D enrollees paid $\$ 14.9$ billion in premiums for basic benefits. Medicare spending for the LIS totaled $\$ 35.1$ billion: $\$ 31.3$ billion for cost sharing and $\$ 3.8$ billion for premiums. Above and beyond program spending, enrollees paid $\$ 17.9$ billion in cost sharing and $\$ 7.5$ billion in premiums for enhanced benefits.

## Part D's approach

Medicare's payment system for Part D is different from payment systems under Part A and Part B. In Part D, Medicare pays competing private plans to deliver outpatient drug benefits to beneficiaries, whether they enroll in a PDP or MA-PD. Instead of setting prices administratively, Medicare bases payments on bids submitted by plan sponsors. Plan sponsors establish networks of pharmacies and apply formularies-lists of drugs the plan will cover that use differential costsharing tiers-to manage enrollees' use of and spending for prescription drugs. For drug classes that have competing therapies, plan sponsors negotiate with biopharmaceutical manufacturers to place brandname drugs on the plan's formulary, potentially on a preferred (lower) cost-sharing tier, in return for postsale rebates.

## Benefit design

Medicare law defines a standard Part D basic benefit, but in practice, plan sponsors offer alternative benefit
designs with equivalent or more generous coverage. Past changes in law have altered the design of the standard benefit for most Part D enrollees (those without the LIS), but those changes did not apply to those who receive the LIS. As a result, there are currently two distinct standard Part D benefit designs. Recent changes in law will again alter Part D's design (as described in a text box, pp. 392-393).

Part D's defined standard benefit For Part D enrollees without the LIS (73 percent in 2022), Part D's defined standard benefit covers 75 percent of drug spending above a deductible and all but 5 percent coinsurance once an enrollee reaches an out-of-pocket (OOP) threshold (Figure 12-1, p. 390). Each year, the standard benefit's parameters change at the same rate as the annual change in beneficiaries' average drug expenses. For 2023, the deductible in Part D's standard benefit is $\$ 505$, and enrollees pay 25 percent coinsurance until reaching an OOP threshold of $\$ 7,400$ (Centers for Medicare \& Medicaid Services 2022b). That threshold is based on "true OOP" costs. This amount excludes beneficiary cost sharing paid by most sources of supplemental coverage, such as employer-sponsored policies and more generous (enhanced) benefits from the beneficiary's Part D plan, but it includes the discount that manufacturers of brand-name drugs must pay in the phase of the benefit called the coverage gap, described in Figure 12-1.

In the past, enrollees without the LIS whose spending exceeded an initial coverage limit were responsible for paying each subsequent prescription's full price at the pharmacy (i.e., 100 percent cost sharing) until they reached an OOP threshold. This range of spending is known as the coverage gap or donut hole. ${ }^{1}$ Due to subsequent changes in law, enrollees no longer face higher cost sharing in the coverage gap; however, plans continue to identify whether a prescription is filled in that benefit phase because enrollees without the LIS are eligible for a 70 percent discount from manufacturers on brand-name prescriptions in the coverage gap. No discount is applied to prescriptions for generic drugs or for brand-name prescriptions filled by LIS enrollees. In 2023, brand discounts begin when an enrollee without the LIS has reached \$4,660 in cumulative drug spending, and the discounts continue until the individual reaches $\$ 7,400$ in combined OOP spending plus brand discounts. Above this OOP


Note: LIS (low-income subsidy), OOP (out-of-pocket). The coverage gap for enrollees without the LIS is depicted as it would apply to brand-name drugs, which are eligible for a 70 percent manufacturers' discount. There is no discount for generic prescriptions for enrollees without the LIS, and thus cost sharing in the coverage gap is 25 percent and plans are responsible for 75 percent. Because of this difference, total covered drug spending at the OOP threshold depends on the mix of brand and generic prescriptions each individual fills while in the coverage gap. The dollar amount shown $(\$ 17,206)$ was estimated by CMS for an individual with an average mix of drugs who does not receive Part D's LIS and has no other supplemental coverage. The bar depicting LIS enrollees reflects full rather than partial LIS coverage.

Source: MedPAC depiction of Part D benefit structure for 2023.
threshold, enrollees pay the greater of 5 percent coinsurance or $\$ 4.15$ to $\$ 10.35$ per prescription.

Benefit for LIS enrollees For low-income beneficiaries, Medicare's LIS pays for the difference between cost-sharing amounts set by each plan and nominal copayments set by law (Figure 12-1). In 2023, most individuals receiving the full LIS pay between \$0 and
$\$ 4.15$ per prescription for generics and between $\$ 0$ and $\$ 10.35$ per prescription for brand-name drugs. A small share of LIS enrollees (less than 2 percent) with slightly higher levels of income or assets receives a partial subsidy. ${ }^{2}$ If, for example, a plan normally charges a \$40 copayment to fill a brand prescription, a full LIS enrollee would pay up to $\$ 10.35$ and Medicare's LIS would pay $\$ 29.65$; after meeting a $\$ 104$ deductible,
enrollees receiving the partial LIS would pay 15 percent, or $\$ 6$, and Medicare's LIS would pay $\$ 34$. Because 100 percent of the costs in the coverage gap count toward the OOP threshold, LIS beneficiaries reach the catastrophic phase at a lower level of spending than other enrollees do. Above the OOP threshold, full LIS enrollees pay no cost sharing, and partial LIS enrollees pay $\$ 4.15$ for generics and $\$ 10.35$ for brand-name drugs. Medicare's LIS pays 5 percent coinsurance minus the LIS enrollee's copayment (if any).

## Plan sponsors typically use alternative benefit designs

In practice, the defined standard benefit is used primarily to set the average value of basic benefits that plan sponsors must offer under alternative benefit designs. Most sponsors structure basic benefits in ways that differ from the defined standard benefit, such as setting the deductible lower than $\$ 505$ or using tiered copayments rather than coinsurance. Some plans encourage use of lower-cost medicines by not applying a deductible when a prescription is filled with certain preferred generics. However, alternative designs must demonstrate that they have the same average value as the defined standard benefit for an enrollee of average health. CMS also sets maximum cost-sharing amounts for drug tiers to ensure that a sponsor's plan design is not discriminatory (Centers for Medicare \& Medicaid Services 2022d). ${ }^{3}$ Once a sponsor offers a PDP with basic benefits in a region, it can also offer up to two "enhanced" PDPs that combine basic with supplemental coverage.

## Concerns about Part D and recommended changes

Over time, changes to Part D's benefit design combined with trends in prescription drug pricing and spending led to concerns about whether plan sponsors have incentives for cost control that are as strong as they were at the start of the program (Medicare Payment Advisory Commission 2022c).

Policymakers sought to eliminate the coverage-gap phase of Part D's benefit and financed much of that expansion of benefits by requiring manufacturers of brand-name drugs and biologics to discount prices in the coverage gap. Those discounts made brandname drugs appear less expensive relative to generics and encouraged their use. In addition, because the discounts were counted as the enrollee's own OOP
spending, beneficiaries using brand-name drugs reached Part D's catastrophic phase-where Medicare pays most of the costs-more quickly. Those weaker incentives for cost control, as well as the introduction and greater use of higher-priced products, expanded catastrophic spending in Part D and Medicare's spending for cost-based reinsurance subsidies. As a result, between 2007 and 2021, plan sponsors' financial risk for the basic benefit spending of their enrollees has declined markedly, from 75 percent to 34 percent.

Other concerns about Part D relate to enrollee cost sharing. Because beneficiaries pay an unlimited amount of cost sharing in the catastrophic phase, a small but significant share of enrollees have high OOP spending that can pose a financial burden and hinder adherence to treatment. In contrast, limits on cost sharing for LIS enrollees blunt their incentives to use lower-cost drugs and make it more difficult for plan sponsors to manage program spending.

## Changes in law may alter incentives for Part D stakeholders

In 2020, the Commission recommended major changes to the Part D program that would restructure its defined standard benefit and restore stronger incentives (Medicare Payment Advisory Commission 2020a). Last year, the Congress passed the Inflation Reduction Act of 2022 (IRA), which included numerous policies related to prescription drugs; one such provision is a redesign of the Part D benefit that reflects many of the Commission's recommendations (see text box on upcoming changes, pp. 392-393). The IRA also imposes financial penalties on manufacturers of drugs sold to Medicare beneficiaries if the price of their drug rises faster than inflation. Penalties for this inflation rebate provision have been applicable for price increases since October 2022. Part D plans are now required to cover all Part D-covered vaccines that are recommended for adults at no cost and insulin at no more than $\$ 35$ for each prescription of a month's supply. In 2024, eligibility for the LIS will expand such that those with income between 135 percent and 150 percent of the federal poverty level will be eligible for full subsidies rather than a partial subsidy. Finally, the IRA will require the Secretary of Health and Human Services to negotiate prices for a select number of drugs with the highest total Medicare spending each year; the first 10 drugs subject to negotiation in Part D

## Upcoming changes to Part D's benefit design

TThe Inflation Reduction Act of 2022 (IRA) restructured Part D's benefit design in significant ways, some of which are consistent with the Commission's 2020 recommendations for the program (Medicare Payment Advisory Commission 2020a).

Instead of the two benefit designs now in use, beginning in 2025, a single benefit design will
apply to all enrollees, whether or not they receive the low-income subsidy (LIS). ${ }^{4}$ In that year, enrollees will pay a projected deductible of about $\$ 555$ followed by a benefit phase with 25 percent coinsurance until reaching $\$ 2,000$ in out-ofpocket (OOP) spending (Figure 12-2). ${ }^{5}$ Notably, the redesigned benefit caps enrollee OOP spending thereafter, eliminating what is now open-ended cost sharing, and plan sponsors will be required

Redesigned benefit structure for all Part D enrollees, effective in 2025


[^27](continued next page)

## Upcoming changes to Part D's benefit design (cont.)

to offer their enrollees the option to smooth cost-sharing payments over the benefit year. Plan sponsors will continue to be able to offer alternatives to this redesigned standard benefit so long as they demonstrate that the alternative plan has the same average benefit value.

In 2025, the current coverage-gap discount will be eliminated and replaced with a new program under which manufacturers of brand-name drugs and biologics must discount their prices by 10 percent below the OOP cap and by 20 percent above it. ${ }^{6}$

Under the redesigned benefit structure, Medicare's reinsurance will cover 20 percent of prescription spending for brand-name drugs above the OOP cap-a substantial decrease from the current 80 percent. At the same time, Medicare's overall 74.5 percent subsidy of basic benefits will remain unchanged, with much more of it taking the form of capitated rather than cost-based payments. Over time, a larger share of Part D spending has come from drugs on specialty tiers, which typically have very high prices. As a result of Medicare's generous reinsurance subsidies, plan sponsors have been responsible for a declining share of financial risk for their enrollees' prescription spending. The upcoming Part D changes should create incentives for plan sponsors to manage prescription benefits in ways that are more consistent with the incentives that were present at the start of the program. However, many specialtytier drugs are in Part D's protected classes (e.g., antipsychotics and antineoplastics), in which sponsors' inability to exclude products from a plan's formulary keeps them from harnessing competition among alternative therapies to negotiate manufacturer rebates.

The Commission has consistently held that when plan sponsors must bear more insurance risk, they should also be given tools to manage enrollee spending. For example, we recommended that plan sponsors be provided with greater formulary
flexibility for drugs in the protected classes (Medicare Payment Advisory Commission 2020a, Medicare Payment Advisory Commission 2019a, Medicare Payment Advisory Commission 2016). ${ }^{7}$ The Commission recommended that the Congress establish a higher copayment under the LIS for nonpreferred and nonformulary drugs. Current LIS copayments provide much weaker financial incentives to choose lower-cost medications than incentives faced by other enrollees (Medicare Payment Advisory Commission 2020a). Such tools will be even more important given the increase in their liability that will result from the IRA's restructuring of the benefit.

Carrying out Part D's benefit redesign and other changes mandated by the IRA will involve complex decisions that will affect plan formularies, payments, incentives regarding drug development, and beneficiary access and costs. For example, plan sponsors may modify their formularies (within the constraints of CMS's guidance and formulary review) in response to bearing more risk for enrollee drug spending. The reforms to restructure the benefit design will result in higher capitated payments from Medicare to plans, with a larger impact, in dollar terms, for LIS beneficiaries. CMS will need to recalibrate the Part D risk-adjustment model to ensure that, on average, capitation rates are adequate for both LIS enrollees and other Part $D$ beneficiaries. Setting the OOP cap at $\$ 2,000$ will increase the generosity of the Part D benefit and may affect the types of drugs manufacturers choose to develop. Changes to enrollees' access to drugs may differ depending on how CMS carries out the policy of notifying enrollees that they have the option to smooth their cost sharing over the year. The Commission will monitor the many changes to the Part D program that will take place over the next several years, keeping in mind both the need for beneficiary access to drug treatments and for program efficiency.

## The share of beneficiaries with Part D coverage has grown slowly in recent years while enrollment has shifted rapidly to MA-PDs from PDPs

|  | 2018 | 2019 | 2020 | 2021 | 2022 | Average annual growth rate 2018-2022 |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
| Total Medicare enrollment (in millions) | 60.0 | 61.5 | 62.9 | 63.8 | 65.0 | 2\% |
| Total enrollment in Part D plans (in millions) | 43.9 | 45.4 | 47.0 | 48.3 | 49.8 | 3 |
| As a share of total Medicare enrollment | 73\% | 74\% | 75\% | 76\% | 77\% | N/A |
| Part D plan enrollment by plan type (in millions) |  |  |  |  |  |  |
| PDP | 25.4 | 25.5 | 25.1 | 24.0 | 23.3 | -2 |
| MA-PD | 18.5 | 20.0 | 21.9 | 24.3 | 26.5 | 9 |
| Full LIS enrollment (in millions) |  |  |  |  |  |  |
| PDP | 7.6 | 7.3 | 6.7 | 6.0 | 5.5 | -8 |
| MA-PD | 4.9 | 5.4 | 6.1 | 6.8 | 7.7 | 12 |

Note: MA-PD (Medicare Advantage-Prescription Drug [plan]), PDP (prescription drug plan) LIS (low-income subsidy), N/A (not applicable). Part D enrollment figures do not include beneficiaries in employer-sponsored plans that receive the retiree drug subsidy or in employer group waiver plans. In addition to beneficiaries who receive full LIS assistance, a small number receive partial assistance ( 0.3 million in 2022). Totals may not sum due to rounding.

Source: MedPAC analysis based on the 2022 Medicare Trustees' report and CMS Part D enrollment data as of April 1, 2022.
will be selected in 2023, and negotiated prices will be effective in 2026.

The changes adopted in the IRA are likely to alter the drug-pricing landscape. While the reforms to the benefit structure should address many of the concerns highlighted above, it will be difficult to assess those effects separately from those of the IRA's numerous other drug-pricing provisions.

## Enrollment and plan choices have continued to grow

A growing proportion of Medicare beneficiaries have enrolled in MA-PDs while the number and share in stand-alone PDPs has declined. Over the program's first decade, a portion of enrollment shifted from retiree drug plans outside of Medicare to Part D plans set up for employer groups, but growth in those plans has slowed.

## In 2022, over three-quarters of Medicare beneficiaries were in Part D plans or employer plans that received the retiree drug subsidy

In 2022, 49.8 million individuals-about 77 percent of Medicare's total enrollment-were enrolled in Part D plans (Table 12-1). Another 2 percent of beneficiaries obtained drug coverage through non-Medicare employer-sponsored plans that received Medicare's retiree drug subsidy (RDS) for serving as the primary provider (data not shown). (The RDS is paid from the Part D program.) We estimate that among the remaining beneficiaries, just under 10 percent had creditable drug coverage from other sources and under 12 percent had no coverage or coverage less generous than Part D (data not shown).

The distribution of Part D enrollment has moved gradually toward MA-PDs open to all enrollees and MA-PD special needs plans (SNPs), which are limited to enrollees who have a chronic condition, are dually
eligible for Medicare and Medicaid, or are living in an institution. The number of enrollees in PDPs began to decline in 2020, and by 2021, Part D enrollees were split evenly between PDPs and MA-PDs. This move toward MA-PDs is consistent generally with more rapid growth in MA enrollment compared with traditional fee-for-service (FFS) Medicare. Between 2018 and 2022, enrollment in MA-PDs grew an average of 9 percent annually compared with a 2 percent decline in PDPs.

Membership in employer group waiver plans (EGWPs)Part D plans established for Medicare-eligible retirees of certain employers-totaled 7.4 million in 2022. ${ }^{8}$ EGWPs can take the form of PDPs or MA-PDs. Enrollment in EGWPs grew quickly over the Part D program's first decade but slowed subsequently. Similar to overall program trends, enrollment in MA-PD EGWPs has been growing, reaching 3.1 million in 2022, while enrollment in PDP EGWPs has declined modestly over the past two years. Still, at 4.4 million, enrollment in PDP EGWPs was higher than that of MA-PDs in 2022.

In 2022, 13.3 million beneficiaries ( 27 percent of Part D enrollees) received the full LIS. Of these individuals, 8.7 million were eligible for both Medicare and full Medicaid benefits (Boards of Trustees 2022). The remainder qualified either because they received benefits through the Medicare Savings Programs or Supplemental Security Income program or because they were eligible after they applied directly to the Social Security Administration. Compared with other enrollees, LIS enrollees are more likely to be female; more than twice as likely to be African American, Hispanic, or Asian or Pacific Islander; and over seven times more likely to be under age 65 (Medicare Payment Advisory Commission 2022a).

Between 2018 and 2022, LIS enrollment grew at a comparatively slow average of 2 percent per year, and the share of Part D enrollees who received the LIS fell slightly to 27 percent. In 2022, 58 percent of LIS enrollees were in MA-PDs; the rest were in PDPs. In past years, most individuals receiving the LIS were enrolled in traditional FFS Medicare rather than MA. However, LIS enrollment in MA-PDs has grown rapidly-especially LIS enrollment in SNPs-while LIS enrollment in PDPs has declined.

## Beneficiaries' enrollment decisions in 2022

Most enrollees are in plans that are actuarially equivalent to Part D's defined standard benefit or are
enhanced in some way rather than in plans that follow the defined standard benefit.

## MA-PD enrollees were more likely to be in enhanced plans than PDP enrollees in 2022

Enrollees in MA-PDs tend to have more generous benefits than enrollees in PDPs. The key reason is that MA-PD plan sponsors are permitted to use a portion of their MA payments to supplement their Part D benefits (e.g., by lowering deductibles) or to lower Part D premiums. ${ }^{9}$

In 2022, just under half of PDP enrollees had basic coverage, most with tiered copayments, while a slight majority had enhanced coverage (Table 12-2, p. 396). Enrollees in MA-PDs, excluding SNPs, were overwhelmingly in enhanced plans. Typically, enhanced plans reduce or eliminate the deductible used in the defined standard benefit. Among general MA-PDs, 64 percent of enrollees had no deductible in their plan's benefit design. By comparison, only 14 percent of PDP enrollees and 5 percent of SNP enrollees were in plans with no deductible. However, more than half of PDPs do not apply their deductible to some drugs (usually certain generics), and most SNP enrollees are dualeligible beneficiaries who automatically receive the LIS, which covers the deductible.

## Stable average enrollee premiums in 2022

Average premiums for Part D benefits peaked in 2017 at $\$ 32$ per month and declined slightly since then. Many factors explain this trend, including growth in manufacturer rebates and postsale pharmacy fees, a higher coverage-gap discount for brand-name drugs, and the entry into Part D of relatively large cohorts of younger enrollees who typically have lower prescription drug costs. Additionally, growth in enrollment in MA-PDs has contributed to the downward trend in premiums. MA-PD plan sponsors have used larger dollar amounts of Part C payments to offset Part D premiums and supplemental drug benefits that enrollees would otherwise pay themselves through premiums. Finally, in most years, actual reinsurance costs have exceeded the amount plan sponsors estimated in their bids. Because enrollee premiums are based on plans' expected amounts, that discrepancy lowers enrollee premiums. As a result, the growth in Medicare's reinsurance subsidy has also contributed to the slower growth in enrollee premiums.

## Regular MA-PDs were much more likely than PDPs and SNPs to offer enhanced coverage and eliminate or reduce the Part D deductible, 2022

|  | PDP |  | General MA-PD |  | SNP |  |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | Number of enrollees (in millions) | Percent | Number of enrollees (in millions) | Percent | Number of enrollees (in millions) | Percent |
| Total | 19.0 | 100\% | 18.1 | 100\% | 4.3 | 100\% |
| Type of benefit |  |  |  |  |  |  |
| Basic | 8.7 | 46 | 0.2 | 1 | 2.5 | 57 |
| Enhanced | 10.3 | 54 | 17.9 | 99 | 1.8 | 43 |
| Type of deductible |  |  |  |  |  |  |
| Zero | 2.7 | 14 | 11.3 | 64 | 0.2 | 5 |
| Reduced | 1.2 | 6 | 6.2 | 34 | 0.4 | 9 |
| Defined standard (\$480) | 15.1 | 79 | 0.6 | 3 | 3.7 | 86 |

Note: MA-PD (Medicare Advantage-Prescription Drug [plan]), PDP (prescription drug plan), SNP (special needs plan). Regular MA-PD enrollment excludes employer-only plans, plans offered in U.S. territories, 1876 cost plans, demonstrations, and Part B-only plans. Totals may not sum due to rounding.

Source: MedPAC analysis of CMS landscape, plan report, and enrollment data.

In 2022, monthly beneficiary premiums averaged about \$26 across all types of plans (basic and enhanced, stand-alone PDP and MA-PD)-effectively no change from the prior year. However, premiums for individual plans vary widely around that average, from $\$ 0$ for many MA-PDs to $\$ 207$ for the most expensive enhanced PDP. The $\$ 26$ average reflects plan sponsors' extensive use of Part C rebate dollars to offset premium costs that MA-PD enrollees would otherwise pay themselves. In 2022, MA-PD enrollees paid an average of less than $\$ 15$ per month but received over $\$ 47$ of basic and supplemental drug benefits through Part C rebates (Medicare Payment Advisory Commission 2022a). PDP enrollees paid an average of $\$ 40$ per month.

Two other factors, not accounted for in the averages described above, can affect the premium amounts enrollees pay. First, higher-income individuals have a lower federal subsidy of their Part D benefits. ${ }^{10}$ In 2022, about 7 percent of enrollees were subject to the income-related premium, compared with less than 3 percent in 2011 (Liu 2022). Second, individuals enrolling
outside their initial enrollment period must have proof that they had drug coverage as generous as the standard benefit to avoid the late enrollment penalty (LEP) that would be added to their premiums for the duration of their Part D enrollment. ${ }^{11}$ In 2022, about 5 percent paid the LEP, up from about 1 percent in 2007 (Liu 2022).

## Large cost-sharing differences between preferred generics and other drugs

Most Part D enrollees choose plans that have a five-tier structure: two generic tiers ("preferred" and "other" generics), one preferred brand-name tier, and one nonpreferred drug tier (which may include both brandname and generic drugs), plus a specialty tier (Medicare Payment Advisory Commission 2022a). The costsharing amounts for those tiers differ, but generally plans have kept generic copayments comparatively low. Among PDP enrollees, in 2022, median copayments were $\$ 0$ for preferred generics and $\$ 5$ for other generic drugs. Median cost sharing was $\$ 42$ for preferred brand-name drugs and 40 percent coinsurance for nonpreferred drugs. Among MA-PD enrollees, median
copayments for the two generic tiers were $\$ 0$ and $\$ 10$, respectively, $\$ 47$ for preferred brand-name drugs, and $\$ 100$ for nonpreferred drugs. PDPs and MA-PDs typically charged a coinsurance of between 25 percent and 33 percent for specialty-tier drugs.

## Benefit offerings for 2023

For 2023, plan sponsors are offering 3,539 general MAPDs and 1,254 SNPs -5 percent and 11 percent more plans, respectively, than in 2022. That rapid growth reflects plan sponsors' interest in gaining a share of MA's expanding enrollment. In 2023, plan sponsors are offering 804 PDPs, nearly 5 percent more than the previous year.

In each of the nation's 34 PDP regions, beneficiaries continue to have broad choice. The number of PDPs ranges from 19 in New York to 28 in Arizona, along with dozens of MA-PDs in most areas. The number of MA plans available to a beneficiary varies by the county of residence, with an average of 26 plans in each county. Because more beneficiaries live in areas with greater numbers of plans, the average beneficiary has 41 MA plans available. ${ }^{12}$

## Changes in premiums

For 2023, CMS calculated that Part D's base beneficiary premium-enrollees' share of the monthly national average expected cost for basic benefits-is $\$ 32.74$, a 2 percent decrease from 2022 (Centers for Medicare \& Medicaid Services 2022c). However, premiums for individual Part D plans can vary substantially from the base beneficiary premium because they reflect any difference between the sponsor's bid and the national average bid, as well as any enhanced (supplemental) benefits the plan offers. In addition, in 2023, MA-PD sponsors are applying $\$ 54$ per month of Part C rebate dollars on average to lower their Part D premiums compared with over \$47 per month the prior year (a nearly 14 percent increase).

In 2022, over 90 percent of all beneficiaries in PDPs (excluding employer-sponsored plans) were enrolled in plans marketed nationally or near nationally by eight large plan sponsors. If enrollees remained in those plans for 2023, most (but not all) saw an increase in their premiums averaging $\$ 4$ per month, or 10 percent. However, average monthly premiums for some nationally marketed PDPs (such as WellCare Value

Script and SilverScript SmartSaver) fell by a dollar or two, while others (such as Elixir RxPlus, Elixir RxSecure, and AARP MedicareRx Preferred) rose by more than $\$ 10$ (and some by considerably more).

In 2023, the benchmarks that reflect the maximum amount Medicare will pay for monthly premiums on behalf of LIS beneficiaries range from $\$ 25$ in Texas to $\$ 43$ in Wisconsin. Compared with 2022, the number of zero-premium PDPs available to LIS enrollees in 2023 dropped by 4 percent to 191 plans. That total equals about one-quarter of all PDPs. All regions have at least three zero-premium PDPs available, while Arizona has a high of eight such PDPs.

## Market segmentation

In 2023, five large sponsors of nationally marketed PDPs followed an approach of dividing, or segmenting, their enrollees. ${ }^{13}$ To do so, sponsors use one plan geared toward LIS beneficiaries and two plans aimed at other beneficiaries-one for those with low drug costs and one for those with high drug costs. Sponsors differentiate their plans through a mix of program rules and changes in premiums, cost sharing, formularies, and pharmacy networks. In this strategy, the sponsor aims to (1) keep the premium for the plan geared toward LIS beneficiaries just below the LIS benchmark subsidy amount and (2) offer one PDP with enhanced coverage that has a lower premium than plans with basic coverage (Medicare Payment Advisory Commission 2022b).

Segmenting the market may make PDPs more profitable than would be the case if plan sponsors did not do so. Sponsors want to maximize the revenues they receive for each LIS enrollee, which is easier to do when LIS enrollees are segmented into separate plans. For other beneficiaries, sponsors want to capitalize on the fact that beneficiaries are sensitive to premiums when they first select a PDP but rarely switch plans after that. Sponsors' strategy in this case is to pair a newer, low-premium plan that attracts new Part D enrollees with an older, more established plan with premiums they can increase more easily.

For beneficiaries, the implications of a segmented market are mixed. Enrollees who do not receive the LIS may benefit from greater access to low-premium plans. At the same time, segmentation may make it harder for beneficiaries to understand their plan options.

As the common-sense distinction between basic and enhanced plans has been lost, it can be difficult to determine what extra benefits are provided by enhanced PDPs with low premiums, and beneficiaries in enhanced PDPs with high premiums likely pay more for their coverage than they otherwise would. For the Medicare program, segmentation likely increases Part D spending because it allows sponsors to charge higher premiums for plans that serve LIS beneficiaries and for older plans that serve beneficiaries who do not receive the LIS.

## Part D's market dynamics have evolved

About 300 organizations operate Part D plans. In addition to their role as insurers, plan sponsors carry out marketing, enrollment, customer support, claims processing, coverage determinations, and exceptions and appeals processes. Other key functions are performed by plans' pharmacy benefit managers (PBMs).

## The roles of plan sponsors and PBMs

Most plan sponsors offer MA-PDs, but only about 50 operate stand-alone PDPs. ${ }^{14}$ As plan sponsors merged throughout the earlier years of the program, Part D enrollment grew more concentrated (Medicare Payment Advisory Commission 2019c). However, over the past several years, enrollment concentration has stabilized. In 2022, the top five PDP sponsors ranked by enrollment accounted for 88 percent of covered lives, while the top five sponsors of MA-PDs accounted for 68 percent of enrollment.

Drug plan sponsors use PBMs to develop formularies, establish networks of pharmacies, and negotiate with drug manufacturers and pharmacies for postsale rebates and discounts. Many of the largest plan sponsors are vertically integrated with their own PBMs, and they operate mail-order and specialty pharmacies. Other sponsors perform some PBM functions in house but contract with outside PBMs (that may be owned by a competitor) for services such as rebate negotiations. ${ }^{15}$ As a result, PBMs' market concentration is higher than that of plan sponsors. We estimate that in 2021, the top five PBMs (ranked either by Part D-covered lives or number of prescriptions) negotiated rebates on behalf of more than 90 percent of all Part D enrollees and prescriptions.

## Formulary management and manufacturer rebates

Formularies remain plan sponsors' most important tool for managing drug benefits. Sponsors and PBMs decide which drugs to include or exclude, which costsharing tier is appropriate for each drug, and whether a drug will be subject to utilization managementquantity limits, step therapy, and prior authorization. Those decisions require that plan sponsors strike a balance between providing access to medications and encouraging enrollees to use preferred therapies.

CMS reviews each plan's formulary as part of the process of deciding whether to approve a plan sponsor's bid. For most drug classes, plans must cover at least two distinct drugs that are not therapeutically equivalent or bioequivalent, as well as "all or substantially all drugs" in six protected classesanticonvulsants, antidepressants, antipsychotics, immunosuppressants, antiretrovirals, and antineoplastics.

In drug classes that have competing therapies, PBMs negotiate with brand manufacturers for rebates that the manufacturers pay after each prescription has been filled. Generally, manufacturers pay larger rebates when a sponsor positions a drug on its formulary in a way that increases the likelihood of winning market share over competing drugs. In 2020, rebates and discounts in Part D averaged 12 percent for brandname specialty drugs and 47 percent for brand-name nonspecialty drugs, which often have larger numbers of competing therapies (Congressional Budget Office 2021). Between 2010 and 2021, the magnitude of aggregate rebates grew from $\$ 8.6$ billion ( 11 percent of gross Part D spending) to $\$ 49.3$ billion ( 23 percent). ${ }^{16}$

## Pharmacy networks and postsale fees

Under Part D, plan sponsors must permit within their networks any pharmacy that is willing to accept the sponsors' terms and conditions; that is, plan sponsors cannot use exclusive pharmacy contracts. Sponsors must also demonstrate that their network meets pharmacy access standards.

However, sponsors can designate a subset of network pharmacies that offer preferred (lower) cost sharing. For 2023, if enrollees remained in the same plan as in the previous year, 99 percent of PDP enrollees, 41 percent of general MA-PD enrollees, and 11 percent
of SNP enrollees would be in plans that use preferred cost-sharing pharmacies. ${ }^{17}$ The strategy of designating certain pharmacies as preferred has the potential to lower costs for Medicare and enrollees if it encourages enrollees to fill prescriptions at pharmacies that, for example, are more effective at encouraging generic drug use. Researchers found that over the period from 2011 to 2014, Part D enrollees without the LIS were highly sensitive to preferred cost sharing, and the approach reduced overall drug spending by about 2 percent (Starc and Swanson 2021a, Starc and Swanson 2021b). However, tiered pharmacy networks have been controversial because of concerns that some members have less access to preferred pharmacies or that tiering pharmacy networks could lead to higher low-income cost-sharing subsidies.

Over time, some major plan sponsors began requiring pharmacies to make postsale payments depending on their performance. ${ }^{18}$ Because these payments rely on periodic evaluations, they can flow from a plan sponsor and its PBM to a pharmacy or vice versa. On the whole, however, pharmacies have paid increasing amounts to plan sponsors; in 2021, they totaled $\$ 12.6$ billion, or 6 percent of gross Part D spending. ${ }^{19}$

Beginning in 2024, CMS will adopt a new definition of "negotiated price" to include all pharmacy price concessions, including performance-based ones assessed after the point of sale. ${ }^{20}$ Plan sponsors' negotiated price must reflect the lowest possible reimbursement a network pharmacy could receive, and that amount will be the basis for assessing enrollee cost sharing when it takes the form of deductibles or coinsurance.

## Vertical integration and plan profitability

Many large plan sponsors have acquired PBMs along with mail-order, specialty, and sometimes retail pharmacies. This strategy offers the combined companies a number of advantages. When PBMs operate under contract to a health plan (as opposed to being part of a vertically integrated company), they may have an incentive to design formularies that reduce or minimize drug spending, even when prescriptions could prevent or forestall other health care spending. Health plans may find it beneficial to purchase a PBM and internalize trade-offs between drug and medical expenses (Garthwaite 2019). Vertical mergers with

PBMs also give health plans access to large amounts of prescription claims that can be used to monitor patient adherence, predict enrollees' use of services, encourage service use at lower-cost sites of care, and potentially coordinate care among prescribers.

Through vertical mergers, health plans can also gain access to information about net prices for drugsboth for generics (because PBM-owned mail-order pharmacies obtain steep discounts) and brandname drugs (through PBM data about manufacturer rebates). Because of the complexity of drug pricing, the highly proprietary nature of rebates, and imperfect competition among PBMs, information about net prices for drugs has been difficult to obtain through contracts (Lieberman et al. 2017, Scott Morton and Boller 2017). A health plan may overcome the information asymmetry by purchasing the PBM (Garthwaite 2019).

However, a few plan sponsors have stepped back from vertical integration. For example, one large plan sponsor (Centene) has decided to sell off its PBM and specialty pharmacy (Waddill 2022). Other health plans have chosen to use PBM aggregators (also called PBM group purchasing organizations) to negotiate rebates on behalf of their commercial clients (Pifer 2020).

A concern is that vertical integration could be associated with anticompetitive behavior. For example, a health plan that also owns pharmacies and a PBM could attempt to restrict pharmacy network participation or raise the prices of PBM services for competing health plans that contract with them (Greaney 2019). Inflated transfer prices between a PBM and its mail-order and specialty pharmacies could be a mechanism for raising rivals' costs. In addition, when insurers and PBMs are integrated with pharmacies, the use of preferred networks may not necessarily result in lower costs.

The prices established between upstream and downstream entities of vertically integrated organizations are less transparent to CMS and commercial payers. ${ }^{21}$ For example, the Department of Health and Human Services Office of Inspector General (OIG) described one Part D plan sponsor that did not negotiate reimbursement contracts with its wholly owned pharmacies. OIG cautioned that profits included in the sponsor's payments to its pharmacies for ingredient costs accrued to the sponsor but could
not be identified and separated from pharmacy costs. In turn, the lack of clarity prevents CMS from being able to evaluate whether the margins included in the sponsor's Part D bids are reasonable (Office of Inspector General 2021).

For similar reasons, vertical integration among plan sponsors, PBMs, and pharmacies makes it difficult to assess the profitability of Part D plans. Under Part D's risk corridors, Medicare shares in some of the profits and losses of plan sponsors. The Medicare program made aggregate risk-corridor payments to plan sponsors in the years 2019 through 2021 and is projected to do so for 2022 (Boards of Trustees 2022). Aggregate risk-corridor payments from Medicare to plans indicate that, overall, sponsors experienced losses-costs for pharmacy benefits that were higher than their bids. ${ }^{22}$ However, plans include some profit within their administrative costs, which are not reflected in risk-corridor calculations and thus could offset some of the higher-than-expected benefit spending. Moreover, profits accruing to wholly owned downstream entities could more than offset Part D plan sponsors' losses (Herman 2022).

## Although moderated by generic use, brand prices have continued to grow

Growth in prices at the pharmacy counter-referred to here as gross or point-of-sale (POS) prices-has been the focus of much attention. Most Part D enrollees primarily use generic drugs, and many (but not all) generic prices remain low. However, enrollees without the LIS who use brand-name drugs often feel the effects of rising POS prices when they pay a deductible or coinsurance. These effects especially involve the relatively small share of enrollees who use high-priced specialty drugs. At the same time, drug prices net of postsale rebates and discounts affect the premiums paid by all Part D enrollees and subsidized by the Medicare program.

All levels of the drug supply chain include incentives that drive POS prices higher, particularly when payments are based on a percentage of prices (Fein 2018, Feldman 2018, Garthwaite and Morton 2017, Sood et al. 2021). Meanwhile, manufacturers now focus on developing drugs and biologics for smaller patient
populations, products that are launched at high prices and may not have direct therapeutic competitors. Over time, these factors, combined with the consolidation of supply-chain participants, have pushed POS prices higher (Sood et al. 2020).

Prices paid at the pharmacy are an important indicator of Part D's costs because POS prices affect beneficiary cost sharing and the rate at which enrollees reach Part D's catastrophic phase. To examine growth in prices, the Commission contracted with Acumen LLC to construct a series of volume-weighted price indexes that reflect total amounts paid to pharmacies for Part D prescriptions, including ingredient costs and dispensing fees. The indexes reflect prices measured at the median of the distribution.

## In 2021, the growth in average prices accelerated, exceeding prepandemic growth rates

Between 2006 and 2021, prices for all drugs and biologics, measured by individual national drug codes (NDCs), more than doubled on average (an index value of 2.04 ) (Table 12-3). ${ }^{23}$ Overall, drug prices grew by 4.2 percent in 2021, exceeding price growth observed before 2020 (averaging 3.5 percent annually).

Single-source drugs and biologics command increasingly high prices, averaging nearly 40 times that of average generic prices in 2021, up from less than six times in the early years of the program (data not shown). Their prices have grown at a mid- to high-single-digit percentage for most of the past five years, following years of double-digit growth (latter data not shown) (Table 12-3).

Because generic drugs account for 90 percent of all prescriptions, decreases in generic prices help moderate overall price growth. Our price index for generic drugs has declined consistently in the past and continued to do so in 2021. However, the rate of decrease in generic prices has slowed in recent years, from annual decreases in the low- to mid-double digits before 2017, to an annual decrease of about 9 percent between 2017 and 2020 and a decrease of 7.5 percent in 2021 (Table 12-3). As a result, in 2021, our overall price index that takes generic substitution into account rose by 3.5 percent, up from an average growth rate of less than 1 percent observed before 2020. ${ }^{24}$


Note: Indexes are calculated using chain-weighted Fisher price indexes and are measured at the median of the distribution relative to prices as of January 2006. Prices reflect total amounts paid to pharmacies before rebates or discounts from manufacturers and pharmacies. Indexes shown are rounded.
*Annual percentage changes reflect growth in the price index since December of the previous year calculated using unrounded data.

Source: Acumen LLC analysis for MedPAC

## Limited opportunity for further generic substitution means future savings will depend on adoption of biosimilars

Prices for generics are often a fraction of the prices for their brand-name counterparts (Association for Accessible Medicines 2021, Government Accountability Office 2016, Schondelmeyer and Purvis 2019). Part D enrollees have embraced their use, with generic dispensing growing in the decade between 2007 and 2017 from just over 60 percent of all prescriptions to nearly 90 percent (Medicare Payment Advisory Commission 2022c). Broad acceptance of generic medicines among prescribers and patients has provided significant savings to beneficiaries and the Medicare program.

However, generics' share of prescriptions has plateaued since 2017, driven primarily by the shift in the drug development pipeline. Now, Medicare spends significant amounts on products for which generic versions are not available because they are biologics, which are given longer periods of market exclusivity when they are licensed. Another factor contributing to
the stagnation in the share of generic prescriptions in Part D may be the increased use of pharmacy discount cards that bypass insurance to obtain lower prices (see text box on pharmacy discount cards, p. 402). A recent report by IQVIA estimated that, among Medicare beneficiaries, claims processed using pharmacy discount cards accounted for about 2 percent of total Medicare pharmacy claims (Adolph et al. 2022).

Going forward, further opportunities for generic substitution will likely be limited, and any meaningful savings will have to come from the successful launch and adoption of biosimilars by prescribers and beneficiaries (see text box on top-selling biologics, p. 404).

## Reinsurance spending has accounted for a growing share of program costs

The costs of providing Part D benefits are shared by Medicare (taxpayers) and its enrollees. Medicare pays

## Pharmacy discount cards improve access but have drawbacks

As more patients face high out-of-pocket (OOP) costs for medicines, pharmacy discount cards have gained prominence among patients and clinicians (Adolph et al. 2022, NORC at the University of Chicago 2022). Unlike manufacturer coupons, which are offered directly to patients for specific brand-name drugs, pharmacy discount cards provide access to lower (negotiated) prices for both brand-name and generic drugs. Between 2017 and 2021, the share of prescriptions dispensed with a discount card (across all payers, including commercial) nearly doubled from 3.3 percent to 5.4 percent (Adolph et al. 2022). Most of that growth was attributable to one company, GoodRx, which had 46 percent of the discount card market in 2021 (Adolph et al. 2022).

Pharmacy discount cards allow patients to search online for the lowest prices for their medicines across pharmacies. The digital platform allows discount card companies to take advantage of differences in discounts negotiated by pharmacy benefit managers (PBMs) to offer patients access to the lowest price. (Some discount cards, such as the Walmart Rx program, may work more like a cash discount card with discounted prices available only at certain pharmacies.) The discount may vary by drug and by vendor but can be as much as 80 percent below retail (cash-pay) prices (Feke 2022). Both the PBM and the marketer of the discount card earn fees from participating pharmacies, who, in turn, may see an increase in prescription volume, "potentially boosting overall revenue from items other than prescription medications despite the potential reduction in revenues" from discounts and pharmacy-transaction and marketing fees (Fein 2022, Hilas 2021).

Most pharmacy discount cards are available at no cost, and patients can access the discounted prices simply by presenting the card at participating pharmacies. Uninsured or underinsured individuals who face full retail prices at the pharmacy are most likely to benefit from using them. However, individuals with health insurance may also benefit from discount cards, for example, if they have a high deductible or if the medicines they need are not covered by their insurance. In 2021, just under 20 percent of Medicare beneficiaries used a discount card for at least one of their medicines compared with 12 percent for patients with commercial insurance (Adolph et al. 2022). Among the commercially insured, patients who faced a deductible were twice as likely to use a discount card compared with patients who did not face a deductible (Adolph et al. 2022).

By lowering OOP expenses, pharmacy discount cards can increase access to medicines. However, because discount cards operate outside of patients' insurance, there are drawbacks to their use. For example, discount cards "may result in a disservice to the patient in the long run because bypassing their insurance . . . will mean that the patient's OOP expense will not contribute to their plan deductible" (Balick 2020). For Part D enrollees, it also means that their OOP spending will not count toward the annual OOP limit. Use of discount cards may also make it difficult for a patient's prescriber and insurance plan to ensure the patient adheres to their medication regimens (Balick 2020). For Part D plans, lacking knowledge of patients' medication purchases could also affect their star ratings, for which adherence is used as a measure of a plan's quality.
plan sponsors two subsidies on behalf of each enrollee in their plans:

- Direct subsidy-A monthly prospective amount set as a share of the national average bid for Part D basic benefits, adjusted for the risk of the individual enrollee.
- Reinsurance-Reimbursement to plans for 80 percent of drug spending above an enrollee's annual OOP threshold (the catastrophic phase of the benefit). Plans receive prospective payments for reinsurance that are reconciled with actual spending (net of postsale rebates and discounts) for each enrollee who reached the OOP threshold after the end of the benefit year.

|  | Annual spending, in billions |  |  |  |  | Average annual growth rate |
| :---: | :---: | :---: | :---: | :---: | :---: | :---: |
|  | 2017 | 2018 | 2019 | 2020 | 2021 | 2017-2021 |
| Capitated payments (direct subsidy) | \$14.6 | \$13.5 | \$11.8 | \$10.9 | \$7.8 | -14.5\% |
| Cost-based reinsurance payments | 37.6 | 40.6 | 46.1 | 48.5 | 52.4 | 8.7 |
| Subtotal, basic benefits | 52.2 | 54.1 | 57.9 | 59.4 | 60.2 | 3.6 |
| Low-income cost-sharing and premium subsidy | 27.3 | 28.5 | 29.7 | 33.0 | 35.1 | 6.5 |
| Retiree drug subsidy* | 0.8 | 0.7 | 0.7 | 0.6 | 0.6 | -6.9 |
| Total Part D | 80.3 | 83.3 | 88.3 | 93.0 | 95.9 | 4.1 |
| Enrollee premiums for basic benefits** | 14.0 | 14.2 | 13.8 | 13.6 | 14.9 | 1.6 |

Note: Figures for capitated payments account for risk-sharing payments that plans make or receive under Part D's risk corridors. Figures for amounts that are paid prospectively (cost-based reinsurance and low-income subsidy) have been reconciled to actual spending amounts. Components may not sum to stated totals due to rounding.
*Subsidy for employers providing comparable or more generous coverage than the basic Part D benefit.
${ }^{* *}$ Excludes low-income premium subsidies. In addition, in 2021, enrollees paid $\$ 7.5$ billion in premiums for enhanced benefits.
Source: MedPAC analysis based on Table IV.B10 of the 2022 annual report of the Boards of Trustees of the Medicare trust funds.

Combined, the direct subsidy and expected reinsurance payments aim to cover 74.5 percent of the expected cost of basic benefits. Today, nearly all of Medicare's payments take the form of reinsurance (cost-based reimbursement) rather than the direct subsidy (capitated payments). In 2023, direct subsidy payments to plans average less than $\$ 2$ per member per month, compared with payments of nearly $\$ 94$ per member per month for reinsurance. ${ }^{25}$ In addition to reinsurance, Medicare shares financial risk with plan sponsors by risk adjusting direct subsidy payments to reflect the expected costliness of a plan's enrollees and by limiting each plan's overall losses or profits through risk corridors if actual benefit spending, excluding reinsurance, is much higher or lower than the plan sponsor anticipated in its bid.

Beneficiary premiums are designed to cover the remaining 25.5 percent of the expected cost of basic benefits. In addition to monthly premiums, Part D enrollees also pay any cost sharing required by plan
sponsors or, in the case of LIS enrollees, cost-sharing amounts set in law.

## Trends in program subsidies and costs

Between 2017 and 2021, program spending rose from $\$ 80.3$ billion to $\$ 95.9$ billion (Table 12-4), or an average of 4.1 percent per year. In 2021, Medicare paid $\$ 7.8$ billion for direct subsidies, $\$ 52.4$ billion for reinsurance, $\$ 35.1$ billion for the LIS, and $\$ 0.6$ billion for the RDS. Medicare payments for reinsurance have grown faster than other components of Part D spending. Between 2017 and 2021, reinsurance payments rose by 8.7 percent annually, compared with a decline of 14.5 percent for the capitated direct subsidy payments. Multiple other factors have contributed to the decline in direct subsidy payments, including the increased use of generic drugs by Part D enrollees and the rapid growth in direct and indirect remuneration (DIR) that disproportionately offsets basic benefit costs paid by plans.

## Top-selling biologics are now facing or will soon face biosimilar competition

The biosimilar market has only recently expanded to retail prescription drugs in the U.S. market and is therefore just beginning to have an impact on Part D spending, though that impact so far has been quite limited. With the recent and expected introduction of biosimilars for some top-selling Part D drugs, however, the trend is expected to change over the coming years.

In 2020, less than $\$ 1$ billion was spent on biosimilar products in Part D, all of which was for insulin products, and most of those were authorized generics as opposed to true biosimilar competitors (Medicare Payment Advisory Commission 2022a). ${ }^{26}$ However, Lantus-which had $\$ 3.7$ billion in gross sales in Part D in 2020—now faces competition from two interchangeable biosimilars: Semglee, which received interchangeable status in 2021, and Rezvoglar, which received interchangeable status in November 2022. Interchangeable status permits pharmacists, in some states, to automatically substitute a biosimilar for a brandname prescription. ${ }^{27}$ Still, the use of Semglee remained limited as of March 2022, particularly in the Part D market, which was probably largely influenced by plans' limited coverage of Semglee or their preference for Lantus and not necessarily a reflection of patient choice (Fein 2023, IQVIA 2022).

Several other top-selling products for autoimmune conditions are now facing or are expected to face biosimilar competition.

- Humira-with gross Part D spending of $\$ 4.2$ billion in 2020-began facing biosimilar competition in January 2023, and another seven biosimilars are expected by the end of 2023 , including one that has interchangeable status.
- Multiple biosimilars for Enbrel-with gross Part D sales of $\$ 2.1$ billion in 2020 -have already been approved and are expected to enter the U.S. market in 2028, following patent expirations.
- Stelara-which had $\$ 1.1$ billion in gross Part D sales in 2020-has at least nine potential biosimilar candidates currently in the development pipeline.

The approval of biosimilars for each of these products presents an opportunity for patients and the Medicare program to save significantly. While OptumRx and Cigna have announced they would cover biosimilars of Humira in their commercial plans, it was not clear as of December 2022 whether these products will similarly be covered in Part D.

In 2021, Part D enrollees paid $\$ 14.9$ billion in premiums for basic benefits (not including the premiums paid by Medicare on behalf of LIS enrollees), up nearly 10 percent from 2020. In addition, enrollees paid $\$ 7.5$ billion in premiums for enhanced benefits.

## In 2021, the number of beneficiaries reaching the catastrophic phase rebounded after a drop in 2020

In 2021, the number of Part D high-cost enrolleesthose with spending high enough to reach the
catastrophic phase of the benefit-rose by more than 6 percent to 4.1 million (Figure 12-3) after dropping by 11 percent in 2020. (Much of the decline in 2020 was likely driven by an unusually large, statutory 25 percent jump in the OOP threshold from its 2019 level. ${ }^{28}$ ) In 2021, the number of high-cost enrollees without the LIS continued to grow more rapidly than the number of high-cost enrollees with the LIS. As a result, in 2021, enrollees without the LIS accounted for 36 percent of all high-cost enrollees, up from less than 20 percent before 2012.


Note: LIS (low-income subsidy), OOP (out-of-pocket). Percentages shown are high-cost enrollees as a share of all Part D enrollees. "High-cost enrollees" refers to those individuals with drug spending high enough to reach Part D's OOP threshold. The "catastrophic phase" refers to drug spending above that threshold. Under Part D, manufacturers of brand-name drugs must provide a discount in the coverage gap to enrollees who do not receive the LIS. Components may not sum to stated totals due to rounding.
*Amounts are based on preliminary Part D prescription drug event data.
Source: Enrollee counts for 2010 to 2021 are based on MedPAC analysis of Part D prescription drug event data

CMS adjusts the annual OOP threshold each year based on a formula set in law. Between 2020 and 2021, the annual OOP threshold increased from $\$ 6,350$ to $\$ 6,550$. Because LIS enrollees continued to make up most of those with high costs and the LIS pays for nearly all costs in the coverage gap (above any nominal copayments required by law), the effects of the increase in the OOP threshold fell almost entirely on Medicare (see Figure 12-1, p. 390). In contrast, for enrollees without the LIS, the financial impact of a higher OOP threshold differed depending on whether the prescription was for a generic or a brand-name drug. For brand-name drugs, the manufacturer's coverage-gap discount is treated as though it were the enrollee's own OOP spending (see Figure 12-1). In 2021, coverage-gap discounts among high-cost enrollees without the LIS averaged just under $\$ 4,500$, accounting for 69 percent of the OOP threshold amount $(\$ 6,550)$.

In 2021, the number of enrollees who used drugs with very high prices-where a single prescription was sufficiently expensive to meet the OOP thresholdrose by just under 5 percent to 11 percent of highcost enrollees (over 464,000 enrollees). That figure is lower than the corresponding figure for 2019 (483,000 enrollees) but still substantially higher than the 2010 figure (33,000 enrollees). High-cost enrollees without the LIS were more likely to have such claims compared with high-cost enrollees with the LIS ( 18 percent compared with just under 8 percent, respectively).

## Part D plans bear less than one-third of the risk for Part D spending

Insurance risk provides an incentive for plan sponsors to offer attractive benefits while managing their enrollees' spending through formularies and other

|  | All Part D plans | By plan type* |  |  |
| :---: | :---: | :---: | :---: | :---: |
|  |  | PDPs | MA-PDs** | SNPs |
| As a share of spending net of all DIR and coverage-gap discounts: |  |  |  |  |
| Plans at risk | 26\% | 15\% | 33\% | 12\% |
| Medicare at risk | 61 | 69 | 50 | 86 |
| Reinsurance | 38 | 43 | 33 | 44 |
| Low-income cost-sharing subsidy | 23 | 26 | 17 | 42 |
| Beneficiary cost sharing | 13 | 16 | 16 | 1 |

Note: PDP (prescription drug plan), MA-PD (Medicare Advantage-Prescription Drug [plan]), SNP (special needs plan), DIR (direct and indirect remuneration). Plans are at risk for a portion of basic benefit costs and any supplemental benefits not subsidized by Medicare. Components may not sum to totals due to rounding.
*Excludes employer group waiver plans.
**Excludes SNPs.
Source: MedPAC analysis of Medicare Part D prescription drug event and direct and indirect remuneration data from CMS.
tools. The Commission has been concerned that the shift of risk from plan sponsors to Medicare has eroded plans' incentives to manage spending (Medicare Payment Advisory Commission 2022c). In 2021, plans were at risk for 26 percent of Part D spending net of all DIR and coverage-gap discounts (Table 12-5). Medicare, on the other hand, was at risk for over 60 percent of net Part D spending, consisting of 38 percent for reinsurance and 23 percent for the low-income costsharing subsidy.

The extent to which plans bear insurance risk varied by plan types. For example, MA-PDs' share of insurance risk was more than double that of PDPs. The difference may reflect the fact that nearly all MA-PD enrollees are in enhanced plans that offer supplemental benefits for which plans are fully at risk. In comparison, about half of PDP enrollees were in plans that offered basic coverage and did not include supplemental benefits. SNPs, which consist mostly of dual-eligible special needs plans that serve beneficiaries who receive both Medicare and Medicaid benefits, had a comparatively lower risk ( 12 percent) than other Part D plans. That difference may, in part, be due to the lack of plan
liability in the coverage gap for beneficiaries with the LIS (see Figure 12-1, p. 390).

## While most Part D enrollees were satisfied, room for improvement remains

Measuring the quality of the pharmacy benefit and enrollees' medication use is critical for assessing Part D's value, but it is a task that requires nuance. On the one hand, effective treatment for many conditions may hinge primarily on access and adherence to prescription drugs. For this reason, Medicare evaluates how well Part D plans make medicines available through their formularies and network pharmacies. On the other hand, Medicare beneficiaries are likely to have multiple chronic conditions, they take an average of nearly five prescription drugs, and they are at higher risk for adverse drug events associated with polypharmacy. Thus, the degree to which Part D plans help to manage enrollees' medication therapies is critically important as well.

CMS collects quality and performance data to monitor plan sponsors' operations and evaluate access to medicines, enrollee experience, and patient safety. A subset of these data is used in the 5-star rating system made available through Medicare's Plan Finder at Medicare.gov to help beneficiaries evaluate their plan options. The agency also uses star ratings that are based in part on prescription drug benefits to determine MA quality bonus payments. (Although both MA-PDs and stand-alone PDPs are evaluated with star ratings, only MA-PDs are eligible for quality bonus payments through the Part C payment system.) The agency displays other Part D quality measures on the CMS website, including some metrics that are either being removed from or evaluated for addition to the star rating system. In addition, by law, Part D plans are required to carry out medication therapy management (MTM) programs and programs to manage opioid use.

For 2023, average star ratings fell relative to 2022 levels, but the 2022 ratings were affected by changes CMS made to address the coronavirus pandemic in how it calculated the ratings. The average ratings for 2023 were more comparable with those for 2021. Star ratings could provide useful information when enrollees are choosing among plan options or when rewarding plan sponsors for effective management of drug use and spending. However, none of the beneficiaries who participated in Commission-sponsored focus groups in the summer of 2022 mentioned using the Medicare star ratings as a source of information for choosing a health plan (NORC at the University of Chicago 2022). The Commission supports the use of quality measurements that are patient oriented, encourage coordination across providers, and promote positive change in the delivery system. Because the provision of prescription drugs is different from the provision of medical services, the quality measures currently used for Part D may not help beneficiaries make informed choices among plan options or allow CMS to reward plan sponsors that provide better value to beneficiaries and taxpayers.

Formulary management is the most important tool used by plan sponsors to manage beneficiaries' medication use and is a key determinant affecting beneficiary access to medications. Greater flexibility to use formulary tools could help plan sponsors manage spending while ensuring that prescribed
medicines are safe and appropriate for the patient, potentially reducing overuse and misuse. However, for some enrollees, those same tools could limit access to needed medications. To ensure access, CMS reviews each plan's formulary to check that it includes medicines in a wide range of therapeutic classes used by the Medicare population and applies utilization management tools in appropriate ways. Further, Part D law requires sponsors to have a transition process to ensure that new enrollees, as well as current members whose drugs are no longer covered or are subject to new restrictions, have access to the medicines they have already been taking. ${ }^{29}$

Medicare also requires plan sponsors to establish a process for coverage determination and appeals. Part D requires quicker adjudication times than the time frames used for most medical benefits covered by MA plans. ${ }^{30}$ If an enrollee is dissatisfied with a plan's final coverage decision, the enrollee may appeal the decision to an independent review entity and then to higher levels of appeal.

## For some beneficiaries, high OOP costs may be a barrier to access

More than 80 percent of elderly Part D enrollees report that their Part D plans provide good value and that their OOP costs are reasonable (Medicare Today 2021). At the same time, in focus groups convened for the Commission, physicians and beneficiaries were acutely aware of high drug costs and reported having frequent discussions about ways to lower costs (NORC at the University of Chicago 2022). These seemingly conflicting results reflect the dichotomy between the majority of beneficiaries who take generic drugs for common conditions and the relatively small number of beneficiaries who use many brand-name drugs or high-cost specialty drugs.

For an enrollee without the LIS (and even those qualifying for only the partial LIS), the cost-sharing burden for brand-name drugs and biologics can be substantial (see text box on reducing cost sharing for insulins, pp. 408-410). For high-cost specialty drugs, cost sharing can total thousands of dollars in the catastrophic phase of the benefit alone (Cubanski et al. 2019). (Most enrollees who receive Part D's LIS do not face a large financial hurdle because their cost sharing is limited to nominal copayments.)

## Insulin and the Inflation Reduction Act of 2022

The Inflation Reduction Act of 2022 (IRA) includes a $\$ 35$ per month limitation on copayments for an insulin product covered under Part D and exempts those products from any plan deductibles. These changes are effective in 2023. An estimated 3.3 million Medicare beneficiaries took insulin in 2020 (Centers for Medicare \& Medicaid Services 2022e). In 2021, more than 10 percent of insulin users ages 65 and older reported rationing insulin, raising concerns about its affordability among Medicare beneficiaries (Gaffney et al. 2022).

In 2021, the Center for Medicare \& Medicaid Innovation began a voluntary demonstration-the Senior Savings Model (SSM)-that allows Part D plans that offer enhanced coverage and insulin manufacturers to provide insulin for $\$ 35$ per prescription for a month's supply, regardless of the enrollee's benefit phase at the time, just as the IRA now requires. An analysis of prescription drug event claims data found the average monthly out-ofpocket (OOP) cost across insulin products in 2020 was $\$ 54$ per prescription for those beneficiaries not receiving the low-income subsidy, indicating that the $\$ 35$ per month price limit could save, on average, \$19 in lower cost sharing per fill (Cubanski and Damico 2022). Findings from the two years of experience with this model provide insights as to what impacts we can expect from the IRA provision.

By 2022, a total of 2,058 plans covering 16.9 million beneficiaries participated in the SSM, with 62
percent of those beneficiaries enrolled in Medicare Advantage-Prescription Drug plans (MA-PDs) (Medicare Payment Advisory Commission 2022a). When plans submitted their Part D bids for 2023, which occurred prior to the passage of the IRA, 2,617 plans had voluntarily chosen to participate. Plan participation has grown 60 percent since 2021, suggesting a continued increase in interest in this model.

An evaluation conducted after the first two years found that monthly enrollment-weighted premiums for MA-PD plans were similar (approximately \$1 to \$2 less per month) for participating plans compared with nonparticipating plans in each year (Taylor et al. 2022). Participating prescription drug plans (PDPs), on the other hand, had significantly higher premiums (ranging from $\$ 28$ to $\$ 31$ more per month) in the first two years, relative to nonparticipating PDPs. That said, participating MA-PDs and PDPs were both more likely than nonparticipants to offer no or reduced deductibles, and participating PDPs were more likely than nonparticipants to offer additional gap coverage.

After accounting for OOP spending, insulin users were expected to save money if they switched to a model-participating plan, even in PDPs with higher premiums, although average overall savings were significantly greater in MA-PDs (Figure 12-4) (Baig and Dusetzina 2022). This estimate was based on the premium, deductible, and cost-sharing amounts for participating and nonparticipating plans (weighted
(continued next page)

For many reasons, beneficiaries have not always benefited from lower-priced alternatives (Dusetzina et al. 2020). For example, the difference in the list prices for a specialty generic and its brand counterpart may be relatively small. As a result, sponsors may continue to prefer the brand version that has lower costs for the plan owing to the coverage-gap discount or
rebates paid by the manufacturer. Even when entries of multiple generic competitors result in substantially lower prices and plan sponsors adjust their formularies to prefer the generic version, beneficiaries can still pay relatively high OOP costs because the coverage-gap discount does not apply to generic drugs and because, unlike their brand counterparts, generic specialty drugs

## Insulin and the Inflation Reduction Act of 2022 (cont.)

## FIGURE

12-4
In 2022, beneficiary spending was typically lower for long-acting insulin users enrolled in SSM plans


Note: SSM (Senior Savings Model), OOP (out of pocket), NP (nonparticipating), PDP (prescription drug plan), MA-PD (Medicare AdvantagePrescription Drug [plan]). SSM plans were required to limit OOP costs for participating insulin products to $\$ 35$ for a month's supply.

Source: MedPAC based on data from Baig and Dusetzina 2022.
by plan enrollment) and assumed 12 fills of a long-acting insulin pen (Lantus Solostar, Levemir FlexTouch, Basaglar KwikPen, or Tresiba FlexTouch), weighted by use of each product in 2020.

Participating and nonparticipating plans all covered a median of between 12 and 13 insulins (Taylor et al. 2022). Figure 12-5 (p. 410) shows the average OOP cost for model-covered insulin products. Some plans chose to cover additional insulin products, beyond those covered under the model, allowing additional choice for patients-though often at a higher cost. Plans covered more nonmodel products in 2022 than 2021 and charged higher prices for them: Average
copayments for these products ranged from $\$ 0$ to $\$ 80$ in 2021 and $\$ 42$ to $\$ 100$ in 2022. MA-PDs were more likely to cover additional insulins than PDPs.

Plans were less likely to cover follow-on, biosimilar, and authorized generic insulins-which have lower list prices but may have similar net pricesthan their branded counterparts. For instance, Basaglar-a follow-on product-was covered by only one-third or fewer of participating plans in either year, while branded long-acting insulins were covered by 67 percent to 90 percent of plans (Taylor et al. 2022). Coverage for authorized generics ranged from 0 percent to 39 percent of participating plans.
(continued next page)

## Insulin and the Inflation Reduction Act of 2022 (cont.)

FIGURE
12-5
Under the SSM, OOP costs for many insulins were below the $\mathbf{\$ 3 5}$ cap, but increased for nearly all insulins in 2022


Note: OOP (out of pocket), MA-PD (Medicare Advantage-Prescription Drug [plan]), PDP (prescription drug plan). Average OOP cost by insulin type calculated using average OOP cost for each product within a subclass and weighted by the number of plans (weighted equally, regardless of enrollment) covering each product. SSM plans were required to limit OOP costs for participating insulin products to $\$ 35$ for a month's supply.

Source: MedPAC based on data from Taylor et al. 2022.

Semglee, the first official interchangeable biosimilar insulin, was covered by only 16 MA-PDs in 2022.

While insulin-dependent beneficiaries are likely to save money, a few other possible effects from this coverage change may be of interest to policymakers. First, providing an OOP cap for beneficiaries reduces pressure on manufacturers to keep prices low, at least for Part D enrollees. Second, the role of rebates may change under this model, though their use seems to continue through 2021 (the latest year for which direct and indirect remuneration data are available). Given rebates' typical use to negotiate preferential formulary status, which
may not be as beneficial with OOP costs already limited, some analysts may have expected rebates to diminish under this model. The data, however, indicate rebates are still influential: Monthly OOP costs for many model insulins were below $\$ 35$, and coverage of brand-name products continues to be significantly higher than that of nonbranded insulins with lower list prices. Manufacturers, therefore, may continue to use rebates to ensure inclusion as a covered product, to help patients pay even lower OOP costs, or to avoid prior authorization requirements.
are "less likely to be covered by patient-assistance programs that Medicare beneficiaries might have used" to lower their OOP costs (Dusetzina et al. 2020).

High cost sharing can result in beneficiaries not initiating therapy or abandoning prescriptions at the pharmacy (Doshi et al. 2018, Dusetzina et al. 2020). ${ }^{31}$ One recent study of fee-for-service Medicare beneficiaries who were newly prescribed a specialty drug found that LIS enrollees were twice as likely to fill their prescription within 90 days than enrollees without the LIS (Dusetzina et al. 2022). The study found that patients did not fill their initial prescriptions for 30 percent of anticancer medicines, 22 percent of hepatitis C treatments, and 50 percent of diseasemodifying therapies for immune conditions and high cholesterol. For drugs on specialty tiers, beneficiaries have little recourse because they may not request a tiering exception to obtain the specialty-tier drugs at lower (preferred) cost sharing. ${ }^{32}$ It is not possible to measure the full extent to which high prices impede access to needed medications. However, growth in the number of therapies that command very high prices is likely to raise the number of beneficiaries who face affordability issues (Dusetzina et al. 2020, Park and Look 2020).

## Beneficiary survey on satisfaction, costs, and plan choice

The Medicare Current Beneficiary Survey (MCBS) asks a nationally representative sample of the Medicare population about their health status, expenditures, and experience with the Medicare program. We examined the findings of the 2020 survey to assess beneficiaries' satisfaction with the Part D program, the costs they pay, and demographic information to better understand certain subpopulations of enrollees. In the 2020 MCBS, 79 percent of enrollees reported being satisfied with the Part D program (Table 12-6, p. 412).

While approximately 80 percent to 90 percent of enrollees reported satisfaction with the amount paid for their prescriptions, the drugs covered, and the pharmacies participating, enrollees were less satisfied with other aspects of the program. Just over half reported the program was easy to understand, two-thirds were satisfied with the information they received, and more than one-fourth reported not being confident their coverage met their needs. Despite some
dissatisfaction, only 11 percent of enrollees reported comparing benefits among PDPs, and 6 percent compared the drug benefits of MA-PD plans (data not shown).

White enrollees were more likely than enrollees of other races to be satisfied with the program ( 81 percent vs. 73 percent to 77 percent) (Table 12-6, p. 412). Enrollees without the LIS were less likely to report having cost issues, and their satisfaction rate is 10 percentage points higher than the rate for LIS enrollees ( 82 percent vs. 72 percent). MA-PD enrollees were slightly more likely to be satisfied with the program than PDP enrollees ( 82 percent vs. 76 percent).

Overall, 83 percent of enrollees were satisfied with the amount they paid for prescriptions, which averaged $\$ 617$ annually, compared with an average of $\$ 977$ paid by those who reported being dissatisfied (data not shown).

As for drug coverage, only 60 percent of beneficiaries without a chronic condition were satisfied with coverage compared with 85 percent of those with a chronic condition. The average beneficiary payment of those satisfied with drug coverage was $\$ 649$ annually compared with $\$ 902$ for those dissatisfied with coverage.

Overall, 25 percent of enrollees reported an affordability issue, including 14 percent who did not take their medicine as prescribed because of cost. ${ }^{33}$ Affordability issues were most prevalent among beneficiaries with incomes between 100 percent and 250 percent of the federal poverty level (FPL), with roughly one-third reporting a cost issue, compared with one-fifth of beneficiaries with higher incomes. Still, nearly a quarter of beneficiaries eligible for full LIS subsidies (with income of less than 100 percent FPL) reported having cost issues, suggesting that these subsidies help but do not fully eliminate affordability challenges. Affordability challenges can also be quite pronounced for those with disabilities. In the 2020 MCBS, 39 percent of respondents under age 65 (most of whom have qualified for Medicare because of a disability) reported an affordability challenge, and 27 percent did not take their medicine on time or as prescribed because of cost issues (Cubanski et al. 2016). ${ }^{34}$

Premiums have long been viewed as the main factor that beneficiaries consider when choosing their plan,

## Beneficiary satisfaction and affordability issues vary by subgroup, 2020

|  | Overall satisfaction | Beneficiary experienced a cost-related access issue | In choosing plan, beneficiary considered: |  |
| :---: | :---: | :---: | :---: | :---: |
|  |  |  | Premium | Prescription cost |
| Overall | 79\% | 14\% | 26\% | 30\% |
| Race/ethnicity |  |  |  |  |
| White | 81 | 13 | 29 | 31 |
| Asian | 77 | 18 | 24 | 29 |
| Black | 73 | 18 | 21 | 31 |
| Hispanic | 73 | 13 | 15 | 21 |
| Native American | 75 | 27 | 15 | 26 |
| Multiple races | 76 | 22 | 19 | 24 |
| LIS status |  |  |  |  |
| Not receiving LIS | 82 | 13 | 30 | 33 |
| Receiving LIS | 72 | 17 | 13 | 21 |
| Plan type |  |  |  |  |
| PDP | 76 | 14* | 23 | 23 |
| MA-PD | 82 | 15* | 31 | 39 |

Note: LIS (low-income subsidy), PDP (prescription drug plan), MA-PD (Medicare Advantage-Prescription Drug [plan]).
*All figures here are statistically significant except those marked with an asterisk.

Source: Acumen analysis of Medicare Current Beneficiary Survey, 2020.
but the survey found that only 26 percent considered plan premiums, while 30 percent considered the cost they would pay for drugs (Table 12-6), and 32 percent considered the convenience of the pharmacy options available (latter data not shown). Individuals eligible for at least a partial LIS subsidy (having income at 150 percent of FPL or lower) were less likely to consider financial aspects (premium, deductible, OOP costs, or formulary coverage).

## Medication therapy management programs

Medicare requires each Part D plan sponsor to carry out MTM programs that focus on the quality of pharmaceutical care for high-risk beneficiaries by improving their therapeutic outcomes and reducing adverse drug events. CMS reviews and must approve a sponsor's description of its MTM program as part of
the annual Part D bidding process. The programs target two categories of beneficiaries: (1) those who have multiple chronic conditions, take multiple medications, and are likely to have drug spending that exceeds an annual cost threshold (\$4,935 for 2023), and (2) those who are at risk for opioid misuse or abuse.

Plan sponsors are required to enroll, with optout provisions, all eligible enrollees in their MTM programs and report certain measures annually to CMS about all eligible beneficiaries. MTM programs must offer interventions-such as medication reviews, patient-directed education and counseling, and care coordination-for both beneficiaries and prescribers. At a minimum, the programs must provide enrolled beneficiaries with a comprehensive medication review (CMR) at least annually and a targeted medication review (TMR) at least quarterly for ongoing monitoring
and follow-up of any medication-related issues. ${ }^{35}$ CMS expects plan sponsors to have a process in place to measure and evaluate the outcomes of their interventions. Sponsors must also provide MTM program enrollees with information about the safe disposal of prescription drugs that are controlled substances.

For years, the Commission has had concerns about the effectiveness of MTM programs, particularly in standalone PDPs, which do not bear financial risk for medical spending like MA-PDs. In measures used for the 2023 star ratings (based on 2021 data), an average of just 53 percent of enrollees in PDP MTM programs received a comprehensive medication review, compared with an average of 83 percent in MA-PD MTM programs (Centers for Medicare \& Medicaid Services 2022a). A study found that MTM was effective in MA-PDs operated by one plan when the program was targeted to resolve medication-related problems (MRPs); CMR, however, was not effective when the reviews were conducted for other eligible individuals with no MRPs (Ferries et al. 2019).

Over the period from 2017 to 2021, CMS tested an Enhanced MTM model to see if new payment
incentives and regulatory flexibilities would spur standalone PDPs to improve their medication management interventions and reduce Medicare spending. Participating sponsors were allowed to set their own targeting criteria and tailor their MTM interventions to their enrollees. ${ }^{36}$ CMS made prospective payments per beneficiary per month and performance-based payments to the sponsors to cover the estimated costs of their interventions. Six participating Part D sponsors operated 22 PDPs in 5 regions of the country over the 5 -year period. In 2020, about 1.3 million enrollees in those plans were eligible for enhanced MTM services, and about 39 percent of those eligible received services (Acumen LLC 2021). Although an evaluation of the entire five-year demonstration is not yet complete, the evaluations of the first four years found no statistically significant effects on Medicare spending for Part A and Part B services, while plan payments under the model were larger than observable decreases in spending, resulting in net costs to Medicare of \$271 million thus far (Acumen LLC 2022). Measures of use of diabetes medications showed modest improvement, but measures of potentially unsafe medication use in the elderly did not improve.

## Endnotes

1 Even today, when the defined standard benefit has 25 percent coinsurance in both the initial coverage phase and coveragegap phase, many Part D plans structure their cost sharing differently across the two phases, charging copayments for generics and preferred drugs initially but charging 25 percent coinsurance in the coverage gap.

2 In 2023, individuals with the partial LIS pay a $\$ 104$ deductible and 15 percent coinsurance on prescriptions up to the OOP threshold. Above the OOP threshold, those LIS enrollees pay $\$ 4.15$ for each generic prescription and $\$ 10.35$ for brand prescriptions. (For more on the magnitude of cost sharing for partial LIS enrollees, see Dusetzina et al. 2021.) As a result of the Inflation Reduction Act of 2022, starting in 2024, beneficiaries who now receive the partial LIS subsidy will instead receive the full LIS subsidy.

3 For example, in 2023, generic tiers cannot have copayments that exceed $\$ 20$ per prescription or charge coinsurance of more than 25 percent in the benefit phase between the deductible and the initial coverage limit. Plans may not use copayments of more than $\$ 100$ or coinsurance higher than 50 percent for drugs on nonpreferred tiers.

4 In 2024, eligibility requirements for full LIS benefits will expand. As a result, nearly 300,000 beneficiaries who currently receive partial benefits and pay higher cost sharing will become eligible to pay lower cost sharing.

5 Under the IRA, Part D will eliminate cost sharing above Part D's OOP threshold in 2024 and then, in 2025, lower that threshold from current-law levels to $\$ 2,000$. Each year thereafter, CMS will increase that threshold by the annual change in per capita drug spending.

6 Drugs selected for price negotiation will not be subject to the manufacturer discount. For LIS beneficiaries and for certain smaller manufacturers, the new manufacturer discount program will be phased in over time, reaching final levels by 2031.

7 The Commission also recommended that plans be allowed to establish preferred and nonpreferred tiers for specialtytier drugs to encourage their enrollees to use lower-priced therapies. CMS began permitting sponsors to use two specialty tiers in 2022, but so far only a handful of plans do so.

8 EGWPs are sponsored by employers that contract directly with CMS or EGWPs are sponsored on a group basis with an insurer or pharmacy benefit manager to administer the Part D benefit. They differ from employer plans that receive the

RDS in that Medicare Part D is the primary payer rather than the employer.

9 A portion of the difference between an MA plan's payment benchmark and its bid for providing Part A and Part B services is referred to as "MA rebate dollars." Plan sponsors can use MA rebate dollars to supplement benefits or lower Part D or MA premiums. In 2022, MA-PD sponsors applied on average more than $\$ 47$ per month ( 28 percent) of their Part C rebate dollars to Part D benefits. Of that amount, 46 percent was used to lower Part D premiums for basic benefits and the rest was used for supplemental drug benefits.

10 As with the income-related premium for Part B, higher Part D premiums apply to individuals with an annual adjusted gross income greater than $\$ 97,000$ and to couples with an adjusted gross income greater than $\$ 194,000$. A beneficiary whose income exceeds these levels pays a monthly adjustment amount in addition to their Part D plan premium. For 2023, adjustments range from $\$ 12.20$ to $\$ 76.40$ per month, depending on income.

11 The LEP amount depends on the length of time an individual goes without coverage as generous as Part D and is calculated by multiplying 1 percent of the base beneficiary premium by the number of full, uncovered months an individual was eligible but was not enrolled in a Part D plan and went without other creditable coverage.

12 Most MA plans are MA-PDs, offering combined medical and outpatient drug benefits. However, a small share of MA plans (including Medicare Savings Account plans) do not offer prescription drug coverage.

13 The five sponsors are UnitedHealth, Cigna, Humana, Aetna (owned by CVS Health), and Centene. Other sponsors of nationally or near-nationally marketed PDPs (Elixir and Clear Spring Health) offer one basic and one enhanced plan in a region. Mutual of Omaha operates in 33 of 34 Part D regions and has expanded its offerings in 2023 to include a second enhanced plan in addition to its basic and existing enhanced plan. While it also segments its enrollees, Mutual of Omaha has premiums for its basic plans that are typically higher than either of its enhanced plans, and none of its basic premiums fall below LIS benchmarks.

14 Most of the 50 organizations operate both PDPs and MA-PDs. About 20 of those 50 sponsors offer PDPs that are available only to employer groups.

15 Some vertically integrated PBMs operate exclusively for the plan sponsor that owns them. Humana Pharmacy Solutions (Humana), IngenioRx (Anthem/Elevance), and Kaiser Pharmacy (Kaiser) are examples. Other PBMs serve the sponsor that owns them as well as other clients, e.g., CVS/ Caremark (CVS Health), OptumRx (UnitedHealth Group), and Express Scripts (Cigna) (Guardado 2022).

16 The Commission's calculation is based on Part D prescription drug event and direct and indirect remuneration data from CMS.

17 Among plans that have them in 2023, preferred pharmacies make up an average of 37 percent, 46 percent, and 48 percent of all PDP, general MA-PD, and SNP network pharmacies, respectively.

18 Examples include incentive bonuses (such as bonuses that encourage generic dispensing), fees that are assessed on other measures such as medication adherence that are set by the sponsor or its PBM, or other contingent amounts that cannot reasonably be determined at the point of sale.

19 The Commission's calculation is based on Part D prescription drug event and direct and indirect remuneration data from CMS.

20 The policy does not apply to manufacturer rebates.
21 CMS requires Part D plan sponsors to report PBM-negotiated rebates so that Medicare can appropriately pay the program's share of net-of-rebate drug spending rather than listprice spending. However, postsale rebates and discounts received by PBM subsidiaries such as mail-order and specialty pharmacies are not reported (Medicare Payment Advisory Commission 2017). In interviews conducted for the Commission, PBM auditors and consultants voiced concerns that there is less visibility into the transfer prices that PBMs pay to their mail-order and specialty pharmacies, which affects what payers are subsequently charged (Hargrave 2017). PBMs noted that they have corporate firewalls to keep transactions between subsidiaries at arm's length. However, information firewalls are difficult to enforce.

22 In reconciliation data for 2021, just over 50 percent of Part D plans received risk-corridor payments from Medicare, indicating their bids were lower than actual benefit costs.

23 An individual NDC uniquely identifies the drug, its labeler, dosage form, strength, and package size.

24 For this index, Acumen groups NDCs that are pharmaceutically identical, aggregating prices across drug trade names, manufacturers, and package sizes. As a result,
brand-name drugs are grouped with their generics if they exist, and this price index more closely reflects the degree to which market share has moved between the two.

25 Calculated from information in CMS's announcement of the 2023 Part D national average monthly bid amount and base beneficiary premium (Centers for Medicare \& Medicaid Services 2022c).

26 Authorized generics are produced by the same manufacturer as the branded version or by another manufacturer with the approval of the maker of the branded version. Some competing insulin products were produced by other manufacturers but are referred to as "follow-on" products rather than biosimilars. While the biosimilar approval pathway was created in 2010 following passage of the Biologics Price Competition and Innovation Act (included in the Affordable Care Act of 2010), biosimilar insulin products were unable to use this pathway until March 2020.

27 The Food and Drug Administration can require additional information from a biosimilar manufacturer to provide evidence that switching between an originator product and the biosimilar is safe and effective, in order to be approved as interchangeable.

28 The Affordable Care Act of 2010 required Medicare to temporarily apply slower growth rates to the OOP threshold between 2014 and 2019. However, for 2020 and thereafter, the OOP threshold reverted to the levels that would have been in place had the slower growth rates never applied.

29 The transition fill is a temporary one-month supply provided within the first 90 days of coverage in a new plan or the new contract year for existing enrollees.

30 Plan sponsors must make coverage determination and exception decisions within 72 hours of a request or within 24 hours for expedited requests. If the initial request for an exception does not include the necessary supporting statement, the plan has up to 14 calendar days to obtain the information. See our March 2020 report to the Congress for more details (Medicare Payment Advisory Commission 2020b).

31 The relationship between higher cost sharing and adherence, treatment initiation, or the rate of prescription abandonment is likely to vary widely across therapeutic classes. For example, patients may be less sensitive to higher cost sharing for certain cancer treatments compared with therapies for chronic conditions such as rheumatoid arthritis (Medicare Payment Advisory Commission 2019b).

32 Part D enrollees can apply to bona fide independent charity patient assistance programs (PAPs) for help with cost sharing. Pharmaceutical manufacturers can provide cash donations to independent charity PAPs without invoking anti-kickback concerns if the charity is structured properly. However, recent enforcement actions regarding manufacturer donations to charities suggest that some PAPs are in violation of the anti-kickback statute (Office of Inspector General 2018, Sagonowsky 2017).

33 We assessed the number of people who experienced affordability issues by examining the number who reported doing any of the following because of cost: delaying filling or not getting a prescription, skipping or taking smaller doses, using a credit card in order to pay over time, asking for their doctor's approval to stop taking a medicine, spending less to save for a prescription, or not using coverage because the cost was too high.

34 Among enrollees 65 and older, depending on age bracket, between 19 percent and 23 percent reported any affordability challenge and 8 percent to 13 percent did not take a medicine as prescribed because of cost issues.

35 CMRs must include a person-to-person or telehealth consultation performed by a pharmacist or other qualified provider and a written summary of the review that includes a medication list and action plan, if any, provided to beneficiaries in CMS's standardized format. A TMR is distinct from a CMR because it is focused on specific medication-related problems, actual or potential. A TMR can be conducted person to person or be system generated, and details of interventions can be delivered by mail or faxed to the beneficiary or the prescriber, as appropriate (Centers for Medicare \& Medicaid Services 2021).

36 For example, a sponsor might choose to provide more counseling services on medication adherence and devote fewer resources to CMRs.

## References

Acumen LLC. 2022. Evaluation of the Part D Enhanced Medication Therapy Management (MTM) model: Fourth evaluation report. Report prepared by Acumen for the Center for Medicare \& Medicaid Innovation. Burlingame, CA: Acumen. https:// innovation.cms.gov/data-and-reports/2022/mtm-fourthevalrept.

Acumen LLC. 2021. Evaluation of the Part D Enhanced Medication Therapy Management (MTM) Model: Third evaluation report. Report prepared by Acumen for the Center for Medicare \& Medicaid Innovation. Burlingame, CA: Acumen.

Adolph, N., B. Engbers, and A. Kokra. 2022. Pharmacy discount card utilization and impact. Parsippany, NJ: IQVIA U.S. Market Access Strategy Consulting.

Association for Accessible Medicines. 2021. The U.S. generic \& biosimilar medicines savings report. Washington, DC: AAM. http://accessiblemeds.org/sites/default/files/2021-10/AAM-2021-US-Generic-Biosimilar-Medicines-Savings-Report-web.pdf.

Baig, K., and S. B. Dusetzina. 2022. Premiums and out-of-pocket spending for long-acting insulins under the Medicare Part D Senior Savings Model. JAMA (published online November 11).

Balick, R. 2020. Are drug coupons and discount cards good or bad? The answer is complicated. Pharmacy Today, November. https://www.pharmacytoday.org/article/S1042-0991(20)31054-9/pdf.

Boards of Trustees, Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. 2022. 2022 annual report of the Boards of Trustees of the Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds. Washington, DC: Boards of Trustees.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022a. 2023 Medicare Advantage and Part D star ratings. https://www.cms.gov/newsroom/fact-sheets/2023-medicare-advantage-and-part-d-star-ratings.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022b. Announcement of calendar year (CY) 2023 Medicare Advantage (MA) capitation rates and Part C and Part D payment policies. https://www.cms.gov/files/ document/2023-announcement.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022c. Annual release of Part D national average bid amount and other Part C \& D bid information. July 29. https://www.cms.gov/files/document/july-29-2022-parts-c-dannouncement.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022d. Contract year (CY) 2023 final Part D bidding instructions. https://www.cms.gov/files/document/202 3partdbiddinginstructions.pdf.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022e. Part D Senior Savings Model. Baltimore, MD: CMS. https://innovation.cms.gov/innovation-models/part-d-savings-model.

Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2021. Correction to contract year 2022 Part D Medication Therapy Management program guidance and submission instructions dated April 30, 2021. https://www.cms. gov/files/document/memo-contract-year-2022-medication-therapy-management-mtm-program-submission-v-083121.pdf.

Congressional Budget Office. 2021. A comparison of brand-name drug prices among selected federal programs. Washington, DC: CBO. https://www.cbo.gov/publication/57007.

Cubanski, J., and A. Damico. 2022. Insulin out-of-pocket costs in Medicare Part D. Washington, DC: Kaiser Family Foundation. https://www.kff.org/medicare/issue-brief/insulin-out-of-pocket-costs-in-medicare-part-d/.

Cubanski, J., W. Koma, and T. Neuman. 2019. The out-of-pocket cost burden for specialty drugs in Medicare Part D in 2019. Issue brief. Washington, DC: Kaiser Family Foundation.

Cubanski, J., T. Neuman, and A. Damico. 2016. Medicare's role for people under age 65 with disabilities. Washington, DC: Kaiser Family Foundation. https://www.kff.org/medicare/issue-brief/ medicares-role-for-people-under-age-65-with-disabilities/.

Doshi, J. A., P. Li, H. Huo, et al. 2018. Association of patient out-of-pocket costs with prescription abandonment and delay in fills of novel oral anticancer agents. Journal of Clinical Oncology 36, no. 5 (February 10): 476-482.

Dusetzina, S. B., W. Elkins, and J. Hoadley. 2021. Extra help needs a hand: Partial subsidies in the Medicare Part D program. Journal of General Internal Medicine (May 23).

Dusetzina, S. B., H. A. Huskamp, R. L. Rothman, et al. 2022. Many Medicare beneficiaries do not fill high-price specialty drug prescriptions. Health Affairs 41, no. 4 (April): 487-496.

Dusetzina, S. B., B. Muluneh, N. L. Keating, et al. 2020. Broken promises: How Medicare Part D has failed to deliver savings to older adults. New England Journal of Medicine 383, no. 24 (December 10): 2299-2301.

Fein, A. 2023. The big three PBMs' 2023 formulary exclusions: Observations on insulin, Humira, and biosimilars. Drug Channels blog. January 10. https://www.drugchannels.net/2023/01/the-big-three-pbms-2023-formulary.html.

Fein, A. 2022. Behind the GoodRx-Express Scripts Partnership: How PBMs profit from discount cards in pharmacy benefits. Drug Channels blog. November 15. https://www.drugchannels. net/2022/11/behind-goodrx-express-scripts.html.

Fein, A. 2018. Building a new drug wholesaler compensation model: What happens as brand inflation slows? Drug Channels blog. July 24. https://www.drugchannels.net/2018/07/building-new-drug-wholesaler.html.

Feke, T. 2022. Best prescription discount cards. https://www. verywellhealth.com/best-prescription-discount-cards-4801786.

Feldman, R. 2018. Perverse incentives: Why everyone prefers high drug prices-Except for those who pay the bills. https://papers. ssrn.com/sol3/papers.cfm?abstract_id=3162432.

Ferries, E., J. T. Dye, B. Hall, et al. 2019. Comparison of medication therapy management services and their effects on health care utilization and medication adherence. Journal of Managed Care \& Specialty Pharmacy 25, no. 6 (June): 688-695.

Gaffney, A., D. U. Himmelstein, and S. Woolhandler. 2022. Prevalence and correlates of patient rationing of insulin in the United States: A national survey. Annals of Internal Medicine 175, no. 11 (November): 1623-1626.

Garthwaite, C. 2019. Testimony by Craig Garthwaite, Associate Professor of Strategy, Herman Smith Research Professor in Hospital and Health Services Management, Director of the Program on Healthcare at Kellogg (HCAK) at the Kellogg School of Management at Northwestern University before the Senate Judiciary Committee Subcommittee on Antitrust, Competition Policy, and Consumer Rights. June 19. https://www.judiciary. senate.gov/imo/media/doc/Garthwaite\ Testimony.pdf.

Garthwaite, C., and F. Scott Morton. 2017. Perverse market incentives encourage high prescription drug prices. ProMarket blog. November 1. https://promarket.org/perverse-market-incentives-encourage-high-prescription-drug-prices/.

Government Accountability Office. 2016. Generic drugs under Medicare: Part D generic drug prices declined overall, but some had extraordinary price increases. GAO-16-706. Washington, DC: GAO.

Greaney, T. L. 2019. Testimony before the Senate Judiciary Committee, Subcommittee on Antitrust, Competition Policy and Consumer Rights on "Your doctor/pharmacist/insurer will see you now: Competitive implications of vertical consolidation in the healthcare industry." June 12.

Guardado, J. R. 2022. Policy research perspectives: Competition in commercial PBM markets and vertical integration of health insurers with PBMs. Chicago, IL: American Medical Association. https://www.ama-assn.org/system/files/prp-pbm-shares-hhi. pdf.

Hargrave, E. 2017. Stakeholder perspectives about the roles of pharmacy benefit managers and specialty pharmacies in the specialty drug market. Contractor report prepared for the Medicare Payment Advisory Commission. Washington, DC: MedPAC.

Herman, B. 2022. The health insurer will see you now: How UnitedHealth is keeping more profits, as your doctor. Stat News, December 5. https://www.statnews.com/2022/12/05/ unitedhealth-keeping-profits-as-your-doctor-insurer/.

Hilas, O. 2021. A pharmacist's primer on prescription discount cards. US Pharmacist 46, no. 10: 21-23.

IQVIA. 2022. Lessons from Semglee: Early perspectives on pharmacy biosimilars. Parsippany, NJ: IQVIA. https://www.iqvia. com/locations/united-states/library/white-papers/lessons-from-semglee-early-perspectives-on-pharmacy-biosimilars.

Lieberman, S., M. Darling, and P. Ginsburg. 2017. A billion here, a billion there: Selectively disclosing actual generic drug prices would save real money. USC-Brookings Schaeffer Initiative for Health Policy blog post. September 12.

Liu, L., Centers for Medicare \& Medicaid Services, Department of Health and Human Services. 2022. Personal email communication with author. November 30.

Medicare Payment Advisory Commission. 2022a. A data book: Health care spending and the Medicare program. Washington, DC: MedPAC. https://www.medpac.gov/wp-content/ uploads/2022/07/July2022_MedPAC_DataBook_SEC_v2.pdf.

Medicare Payment Advisory Commission. 2022b. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2022c. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2020a. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2020b. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2019a. Comment letter on CMS's notice of proposed rulemaking entitled "Modernizing Part D and Medicare Advantage to lower drug prices and reduce out-of-pocket expenses." January 16.

Medicare Payment Advisory Commission. 2019b. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2019c. Report to the Congress: Medicare payment policy. Washington, DC: MedPAC.

Medicare Payment Advisory Commission. 2017. Background on pharmacy benefit managers and specialty pharmacies. Presentation at the Commission's September public meeting. https://www.medpac.gov/wp-content/uploads/import_data/ scrape_files/docs/default-source/default-document-library/ pbms-and-specialty-pharmacies---final.pdf.

Medicare Payment Advisory Commission. 2016. Report to the Congress: Medicare and the health care delivery system. Washington, DC: MedPAC.

Medicare Today. 2021. Senior satisfaction survey. https:// medicaretoday.org/resources/senior-satisfaction-survey/.

NORC at the University of Chicago. 2022. Beneficiary and clinician perspectives on Medicare and other issues: Findings from 2022 focus groups and site visits in select states. Report prepared by staff from NORC at the University of Chicago for the Center for Medicare \& Medicaid Innovation. Chicago, IL: NORC.

Office of Inspector General, Department of Health and Human Services. 2021. CMS should strengthen its prescription drug event guidance to clarify reporting of sponsor margin for Medicare Part D bids. A-03-17-00001. Washington, DC: OIG.

Office of Inspector General, Department of Health and Human Services. 2018. Letter from Gregory E. Demske, Chief Counsel of HHS OIG, to James C. Stansel, Executive VP and Chief Counsel of PhRMA. https://oig.hhs.gov/compliance/alerts/guidance/ stansel-letter.pdf.

Park, J., and K. A. Look. 2020. Part D coverage gap reform: Trends in drug use and expenditures. American Journal of Managed Care 26, no. 8 (August): 349-356.

Pifer, R. 2020. CVS reportedly creating group purchasing organization for PBM business. Healthcare Dive, July 1. https:// www.healthcaredive.com/news/cvs-reportedly-creating-group-purchasing-organization-for-pbm-business/580889/.

Sagonowsky, E. 2017. IRS investigates patient charity as a possible "conduit" for Big Pharma sales. Fierce Pharma, June 29. https:// www.fiercepharma.com/pharma/irs-probes-whether-patient-charity-acted-as-a-conduit-for-big-pharma.

Schondelmeyer, S., and L. Purvis. 2019. Trends in retail prices of generic prescription drugs widely used by older Americans: 2017 year-end update. Washington, DC: AARP.

Scott Morton, F., and L. Boller. 2017. Enabling competition in pharmaceutical markets. Working paper \#30. Washington, DC: Center for Health Policy at Brookings.

Sood, N., K. Mulligan, and K. Zhong. 2021. Do companies in the pharmaceutical supply chain earn excess returns? International Journal of Health Economics and Management 21, no. 1 (March): 99-114.

Sood, N., M. Ribero, M. Ryan, et al. 2020. The association between drug rebates and list prices. Los Angeles, CA: USC Schaeffer, Leonard D. Schaeffer Initiative for Innovation in Health Policy \& Economics.

Starc, A., and A. Swanson. 2021a. Preferred pharmacy networks and drug costs. American Economic Journal: Economic Policy 13, no. 3 (August): 406-446.

Starc, A., and A. Swanson. 2021b. Promoting preferred pharmacy networks. https://onepercentsteps.com/wp-content/uploads/ brief-pppn-210208-1700.pdf.

Taylor, E., D. Khodyakov, C. Buttorff, et al. 2022. Part D Senior Savings Model: Model reach and scope. Report prepared for the Center for Medicare \& Medicaid Innovation, Centers for Medicare \& Medicaid Services. Santa Monica, CA: RAND Health Care. https://innovation.cms.gov/data-and-reports/2022/pdss-first-eval-rpt.

Waddill, K. 2022. Centene announces sale of pharmacy benefit manager, pharmacy. May 5, Health Payer Intelligence. https:// healthpayerintelligence.com/news/centene-announces-sale-of-pharmacy-benefit-manager-pharmacy.


## Commissioners' voting on recommendations

## Commissioners' voting on recommendations

In the Medicare, Medicaid, and SCHIP Benefits Improvement and Protection Act of 2000, the Congress required MedPAC to call for individual Commissioner votes on each recommendation and to document the voting record in its reports. The information below satisfies that mandate.

## Chapter 1: Context for Medicare payment policy

No recommendations

## Chapter 2: Assessing payment adequacy and updating payments in fee-for-service Medicare

No recommendations

## Chapter 3: Hospital inpatient and outpatient services

3-1 For fiscal year 2024, the Congress should update the 2023 Medicare base payment rates for general acute care hospitals by the amount specified in current law plus 1 percent.

Yes: Barr, Casalino, Chernew, Cherry, Damberg, Dusetzina, Ginsburg, Grabowski, Jaffery, Kan, Navathe, Poulsen, Rambur, Riley, Ryu, Safran, Sarran

3-2 In fiscal year 2024, the Congress should:

- begin a transition to redistribute disproportionate share hospital and uncompensated care payments through the Medicare Safety-Net Index (MSNI);
- add $\$ 2$ billion to the MSNI pool;
- scale fee-for-service MSNI payments in proportion to each hospital's MSNI and distribute the funds through a percentage add-on to payments under the inpatient and outpatient prospective payment systems; and
- pay commensurate MSNI amounts for services furnished to Medicare Advantage (MA) enrollees directly to hospitals and exclude them from MA benchmarks.

Yes: Barr, Casalino, Chernew, Cherry, Damberg, Dusetzina, Ginsburg, Grabowski, Jaffery, Kan, Navathe, Poulsen, Rambur, Riley, Ryu, Safran, Sarran

## Chapter 4: Physician and other health professional services

4-1 For calendar year 2024, the Congress should update the 2023 Medicare base payment rate for physician and other health professional services by 50 percent of the projected increase in the Medicare Economic Index.

Yes: Barr, Casalino, Chernew, Cherry, Damberg, Dusetzina, Ginsburg, Grabowski, Jaffery, Kan, Navathe, Poulsen, Rambur, Riley, Ryu, Safran, Sarran

4-2 The Congress should enact a non-budget-neutral add-on payment, not subject to beneficiary cost sharing, under the physician fee schedule for services provided to low-income Medicare beneficiaries. These add-on payments should equal a clinician's allowed charges for these beneficiaries multiplied by:

- 15 percent for primary care clinicians and
- 5 percent for non-primary care clinicians.

Yes: Barr, Casalino, Chernew, Cherry, Damberg, Dusetzina, Ginsburg, Grabowski, Jaffery, Kan, Navathe, Poulsen, Rambur, Riley, Ryu, Safran, Sarran

## Chapter 5: Ambulatory surgical center services: Status report

The Commission reiterates its March 2022 recommendation that the Secretary require ambulatory surgical centers to report cost data.

## Chapter 6: Outpatient dialysis services

For calendar year 2024, the Congress should update the 2023 Medicare end-stage renal disease prospective payment system base rate by the amount determined under current law.

Yes: Barr, Casalino, Chernew, Cherry, Damberg, Dusetzina, Ginsburg, Grabowski, Jaffery, Kan, Navathe, Poulsen, Rambur, Riley, Ryu, Safran, Sarran

## Chapter 7: Skilled nursing facility services

For fiscal year 2024, the Congress should reduce the 2023 Medicare base payment rates for skilled nursing facilities by 3 percent.

Yes: Barr, Casalino, Chernew, Cherry, Damberg, Dusetzina, Ginsburg, Grabowski, Jaffery, Kan, Navathe, Poulsen, Rambur, Riley, Ryu, Safran, Sarran

## Chapter 8: Home health care services

For calendar year 2024, the Congress should reduce the 2023 Medicare base payment rate for home health agencies by 7 percent.

Yes: Barr, Casalino, Chernew, Cherry, Damberg, Dusetzina, Ginsburg, Grabowski, Jaffery, Kan, Navathe, Poulsen, Rambur, Riley, Ryu, Safran, Sarran

## Chapter 9: Inpatient rehabilitation facility services

For fiscal year 2024, the Congress should reduce the 2023 Medicare base payment rate for inpatient rehabilitation facilities by 3 percent.

Yes: Barr, Casalino, Chernew, Cherry, Damberg, Dusetzina, Ginsburg, Grabowski, Jaffery, Kan, Navathe, Poulsen, Rambur, Riley, Ryu, Safran, Sarran

## Chapter 10: Hospice services

For fiscal year 2024, the Congress should update the 2023 Medicare base payment rates for hospice by the amount specified in current law and wage adjust and reduce the hospice aggregate cap by 20 percent.

Yes: Barr, Casalino, Chernew, Cherry, Damberg, Dusetzina, Ginsburg, Grabowski, Jaffery, Kan, Navathe, Poulsen, Rambur, Riley, Ryu, Safran, Sarran

## Chapter 11: The Medicare Advantage program: Status report

No recommendations

## Chapter 12: The Medicare prescription drug program (Part D): Status report

No recommendations

| AAGR | average annual growth rate |
| :---: | :---: |
| A-APM | advanced alternative payment model |
| ACA | Affordable Care Act of 2010 |
| ACH | acute care hospital |
| ACO | accountable care organization |
| ACS | ambulatory care sensitive |
| AKI | acute kidney injury |
| ALOS | average length of stay |
| ANA | activity not attempted |
| APC | ambulatory payment classification |
| APM | alternative payment model |
| APRN | advanced practice registered nurse |
| ASC | ambulatory surgical center |
| ASCQR | ASC Quality Reporting |
| ASP | average sales price |
| BBA | Bipartisan Budget Act |
| BETOS | Berenson-Eggers Type of Service |
| BLS | Bureau of Labor Statistics |
| CAH | critical access hospital |
| CAHPS ${ }^{\text {® }}$ | Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$ |
| CARES | Coronavirus Aid, Relief, and Economic Security |
| CBO | Congressional Budget Office |
| CCP | coordinated care plan |
| CDC | Centers for Disease Control and Prevention |
| CEC | Comprehensive ESRD Care |
| CHC | continuous home care |
| CHIP | Children's Health Insurance Program |
| CKD | chronic kidney disease |
| CMG | case-mix group |
| CMI | case-mix index |
| CMMI | Center for Medicare \& Medicaid Innovation |
| CMR | comprehensive medication review |
| CMS | Centers for Medicare \& Medicaid Services |
| CMS-HCC | CMS hierarchical condition category |
| CON | certificate of need |
| COPD | chronic obstructive pulmonary disease |
| COVID-19 | coronavirus disease 2019 |
| CPI-U | consumer price index for all urban consumers |
| C-SNP | chronic condition special needs plan |
| CT | computed tomography |
| CY | calendar year |


| DIR | direct and indirect remuneration |
| :---: | :---: |
| DMEPOS | durable medical equipment, prosthetics, orthotics, and supplies |
| DOJ | Department of Justice |
| DPP | disproportionate patient percentage |
| DRG | diagnosis related group |
| DSH | disproportionate share hospital |
| D-SNP | dual-eligible special needs plan |
| E\&M | evaluation and management |
| ED | emergency department |
| EGWP | employer group waiver plan |
| EHR | electronic health record |
| ESA | erythropoiesis-stimulating agent |
| ESRD | end-stage renal disease |
| ETC | ESRD Treatment Choices |
| FDA | Food and Drug Administration |
| FFS | fee-for-service |
| FMAP | Federal Medical Assistance Percentage |
| FPL | federal poverty level |
| FQHC | federally qualified health center |
| FY | fiscal year |
| g/dL | grams per deciliter |
| GAO | Government Accountability Office |
| GDP | gross domestic product |
| GI | gastrointestinal |
| GIP | general inpatient care |
| H-CAHPS ${ }^{\text {® }}$ | Hospital Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$ |
| HCC | hierarchical condition category |
| HEDIS ${ }^{\circledR}$ | Healthcare Effectiveness Data and Information Set ${ }^{\circledR}$ |
| HHA | home health agency |
| HH-CAHPS ${ }^{\circledR}$ | Home Health Care Consumer Assessment of Healthcare Providers and Systems ${ }^{\circledR}$ |
| HI | Hospital Insurance (Medicare Part A) |
| HIV/AIDS | human immunodeficiency virus/acquired immunodeficiency syndrome |
| HMO | health maintenance organization |
| HOPD | hospital outpatient department |
| HPSA | Health Professional Shortage Area |
| HSA | hospital service area |
| HUD | Department of Housing and Urban Development |


| HVIP | hospital value incentive program | NDA | new drug application |
| :---: | :---: | :---: | :---: |
| ICD | International Classification of Diseases | NDC | national drug code |
| IOL | intraocular lens | NP | nurse practitioner |
| IPPS | inpatient prospective payment systems | NP | nonparticipating |
| IRA | Inflation Reduction Act of 2022 | NPI | national provider identifier |
| IRC | inpatient respite care | NPP | nonphysician practitioner |
| IRF | inpatient rehabilitation facility | OACT | Office of the Actuary |
| IRF-PAI | Inpatient Rehabilitation Facility Patient | OB/GYN | obstetrics and gynecology |
|  | Assessment Instrument | OIG | Office of Inspector General |
| I-SNP | institutional special needs plan | OOP | out of pocket |
| LDO | large dialysis organization | OPPS | outpatient prospective payment system |
| LEP | late enrollment penalty | OQR | Outpatient Quality Reporting |
| LIP | low-income percentage | OR | operating room |
| LIS | low-income [drug] subsidy | OT | occupational therapy |
| LOS | length of stay | PA | physician assistant |
| LTCH | long-term care hospital | PAC | post-acute care |
| LVI | low volume and isolated | PACE | Program of All-Inclusive Care for the Elderly |
| MA | Medicare Advantage | PAMA | Protecting Access to Medicare Act of 2014 |
| MAC | Medicare administrative contractor | PAP | patient assistance program |
| MACRA | Medicare Access and CHIP Reauthorization Act of 2015 | PBM PCIP | pharmacy benefit manager Primary Care Incentive Payment |
| MA-PD | Medicare Advantage-Prescription Drug [plan] | PCR | payment-to-cost ratio |
| MCBS | Medicare Current Beneficiary Survey | PD | peritoneal dialysis |
| MCC | major complication or comorbidity | PDGM | Patient-Driven Groupings Model |
| MCCM | Medicare Care Choices Model | PDP | prescription drug plan |
| MCP | monthly capitated payment | PDPM | Patient-Driven Payment Model |
| MDH | Medicare-dependent hospital | PFFS | private fee-for-service |
| MedPAC | Medicare Payment Advisory Commission | PFS | physician fee schedule |
| MedPAR | Medicare Provider Analysis and Review | PHE | public health emergency |
| MEI | Medicare Economic Index | PLI | professional liability insurance |
| MIPS | Merit-based Incentive Payment System | POS | point of sale |
| MLR | medical loss ratio | PPE | personal protective equipment |
| MOOP | maximum out-of-pocket | PPO | preferred provider organization |
| MRP | medication-related problem | PPP | Paycheck Protection Program |
| MSA | Medicare Savings Account | PPS | prospective payment system |
| MSA | metropolitan statistical area | PRF | Provider Relief Fund |
| MS-DRG | Medicare severity-diagnosis related group | PT | physical therapy |
| MSN | Medicare safety-net | Q | quartile |
| MSNI | Medicare Safety-Net Index | QBP | quality bonus program |
| MSP | Medicare as a secondary payer | QIP | Quality Incentive Program |
| MSS | medical social services | QMB | Qualified Medicare Beneficiary |
| MTM | medication therapy management | RADV | risk-adjustment data validation |
| N/A | not applicable | RAPS | Risk Adjustment Processing System |
| N/A | not available |  |  |


| RBCS | Restructured BETOS Classification System | SSDI | Social Security Disability Insurance |
| :--- | :--- | :--- | :--- |
| RDS | retiree drug subsidy | SSI | Supplemental Security Income |
| REH | rural emergency hospital | SSI | surgical site infection |
| REIT | real estate investment trust | SSO | short-stay outlier |
| RHC | routine home care | SSM | Senior Savings Model |
| RHC | rural health center | TDAPA | transitional drug add-on payment adjustment |
| RIC | rehabilitation impairment category | TEFRA | Tax Equity and Fiscal Responsibility Act of 1982 |
| RN | registered nurse | TMR | targeted medication review |
| ROI | return on investment | TPNIES | transitional add-on payment adjustment for new |
| RTI | Research Triangle Institute |  | and innovative equipment and supplies |
| RVU | relative value unit | UIC | Urban Influence Code |
| SCH | sole community hospital | VA | Department of Veterans Affairs |
| SGR | sustainable growth rate | VBID | value-based insurance design |
| SLP | speech-language pathology | VBP | value-based purchasing |
| SMI | Supplementary Medical Insurance | VIP | value incentive program |
| SNF | skilled nursing facility | WAC | wholesale acquisition cost |
| SNP | special needs plan |  |  |

## More about MedPAC

## Commission members

## Michael E. Chernew, Ph.D., chair

Harvard Medical School
Boston, MA

## Amol Navathe, M.D., Ph.D., vice chair

Perelman School of Medicine
University of Pennsylvania
Philadelphia, PA

Term expires April 2023
Michael E. Chernew, Ph.D.
David Grabowski, Ph.D.
Harvard Medical School
Boston, MA
Betty Rambur, Ph.D., R.N., F.A.A.N.

University of Rhode Island College of Nursing
Kingston, RI
Wayne J. Riley, M.D., M.P.H., M.B.A.

Downstate Health Sciences University State University of New York Brooklyn, NY

Dana Gelb Safran, Sc.D.
National Quality Forum
Washington, DC

Term expires April 2024

## Lynn Barr, M.P.H.

Barr-Campbell Family Foundation Incline Village, NV

Cheryl L. Damberg, Ph.D.
RAND Corporation
Santa Monica, CA

## Stacie B. Dusetzina, Ph.D.

Vanderbilt University School of Medicine Nashville, TN

Marjorie Ginsburg, B.S.N., M.P.H.

Sacramento, CA
Jonathan Jaffery, M.D., M.S., M.M.M.

Association of American Medical Colleges Madison, WI

Jaewon Ryu, M.D., J.D.
Geisinger Health System
Danville, PA

Term expires April 2025

## Lawrence Casalino, M.D., Ph.D.

Weill Cornell Medical School
Department of Population Health Sciences New York, NY

Robert A. Cherry, M.D., M.S.
UCLA Health
Los Angeles, CA
Kenny Kan, F.S.A., C.P.A., C.F.A., M.A.A.A.

Horizon Blue Cross Blue Shield Newark, NJ

Amol Navathe, M.D., Ph.D.
Gregory P. Poulsen, M.B.A.
Intermountain Healthcare
Salt Lake City, UT
Scott Sarran, M.D.
Triple Aim Geriatrics
Cook County, IL

## Commissioners' biographies

Lynn Barr, M.P.H. Lynn Barr, M.P.H., is a leader in the movement to transform and improve our nation's health care systems for the underserved. After serving 8 years in the Army as a laboratory scientist and a $30-$ year career developing innovative drug, device, and IT systems in four start-ups, she earned her master of public health degree to pursue delivery system reform for the safety net. Employed at a rural hospital as a chief information officer, Ms. Barr organized a National Rural Accountable Care Consortium to overcome barriers for rural health systems so they could benefit from Medicare's advanced payment models. In 2014, she formed Caravan Health to provide technical support to providers interested in population health programs through Practice Transformation Networks, Medicare and commercial accountable care organizations, Comprehensive Primary Care Plus, and other advanced payment models. Ms. Barr is currently director of the Barr-Campbell Family Foundation.

Lawrence Casalino, M.D., Ph.D. Lawrence Casalino, M.D., Ph.D., is the Livingston Farrand Professor of Public Health and former chief (2008 to 2021) of the Division of Health Policy and Economics in the Weill Cornell Medical School Department of Population Health Sciences. His research focuses on the intended and unintended effects of public and private policies on the types of provider organizations that exist, the processes they use to provide care, the quality and cost of care, and the impact of policies and organizational processes on socioeconomic and racial/ethnic disparities. Dr. Casalino has served as senior advisor to the director of the U.S. Agency for Healthcare Research and Quality, as chair of the Academy Health Annual Research Meeting, as a member of the Panel of Health Advisors for the Congressional Budget Office, on the Fair Health board of directors, and on many other national committees, technical advisory panels, and nonprofit boards. Before academia, Dr. Casalino worked full time as a primary care physician for 20 years and, before that, as a community organizer.

Michael E. Chernew, Ph.D. Michael E. Chernew, Ph.D., is the Leonard D. Schaeffer Professor of Health Care Policy and the director of the Healthcare Markets and Regulation Lab in the Department of Health Care Policy at Harvard Medical School. Dr. Chernew's research
examines several areas related to improving the health care system, including studies of novel benefit designs, Medicare Advantage, alternative payment models, low-value care, and the causes and consequences of rising health care spending. He is also a member of the Congressional Budget Office's Panel of Health Advisors and vice chair of the Massachusetts Health Connector Board. Dr. Chernew is a member of the National Academy of Sciences, a research associate at the National Bureau of Economic Research, and a MITRE fellow. He is currently a coeditor of the American Journal of Managed Care. He has served on a number of CMS technical advisory panels reviewing the assumptions used by Medicare actuaries to assess the financial status of the Medicare trust funds. He was awarded the John D. Thompson Prize for Young Investigators by the Association of University Programs in Public Health in 1998 and received the Alice S. Hersh Young Investigator Award from the Association of Health Services Research in 1999. Dr. Chernew previously served on the Commission from 2008 to 2014 and was vice chair from 2012 to 2014. He earned his undergraduate degree from the University of Pennsylvania and his Ph.D. in economics from Stanford University.

Robert A. Cherry, M.D., M.S. Robert A. Cherry, M.D., M.S., is chief medical and quality officer at UCLA Health in Los Angeles, CA. Dr. Cherry has extensive experience in quality and safety improvements and value-based care in health systems across the United States. He has coordinated innovative analytical methods to increase clinical quality of care, improve patient experience, and provide value to patients. He also has served on the board of many organizations, including the California Community Foundation, and was appointed to the California Health Facilities Financing Authority, which assists nonprofit organizations with financing, construction, and remodeling of health facilities. A trauma and critical care surgeon, Dr. Cherry earned his medical degree from Columbia University and a master in health care management from Harvard University.

Cheryl L. Damberg, Ph.D. Cheryl L. Damberg, Ph.D., is director of the RAND Center of Excellence on Health System Performance, distinguished chair in health care payment policy, and a principal senior economist
at the RAND Corporation in Santa Monica, CA. Her research explores the impact of strategies to drive cost and quality improvements in health care. She also studies how providers are redesigning health care delivery in response to new payment models and increased accountability and the effects of health care consolidation on health care spending and quality performance. Her work has focused on improving the design of value-based payment systems to address disparities and improve health equity. Dr. Damberg is an international expert in pay-for-performance and value-based payment reforms and has advised Congress and federal agencies on these and other issues. She earned her Ph.D. in public policy from the Pardee RAND Graduate School of Public Policy Studies.

Stacie B. Dusetzina, Ph.D. Stacie B. Dusetzina, Ph.D., is an associate professor of health policy and an Ingram Associate Professor of Cancer Research at Vanderbilt University Medical Center in Nashville, TN. She has conducted extensive research on topics related to Medicare coverage for prescription drugs, including studies focusing on drug pricing, Medicare Part D benefit design, and Medicare formulary coverage policies. Dr. Dusetzina has served as a committee member for the National Academies of Sciences, Engineering, and Medicine on the topic "Ensuring Patient Access to Affordable Drug Therapies" and as an expert witness for the Senate Special Committee on Aging. She received her Ph.D. in pharmaceutical sciences from the Eshelman School of Pharmacy at the University of North Carolina at Chapel Hill and postdoctoral training in the Department of Health Care Policy at Harvard Medical School.

Marjorie Ginsburg, B.S.N., M.P.H. Marjorie Ginsburg, B.S.N., M.P.H., is the founding executive director of the nonprofit Center for Healthcare Decisions Inc., which she ran from 1994 to 2016. In that role, she was responsible for the design, implementation, and evaluation of projects and programs that foster civic engagement on complex health policy issues affecting individuals and society at large. Among the policy issues Ms. Ginsburg studied were end-of-life care, health plan benefits design, and strategies to reduce overuse of unnecessary medical care. Since 2017, Ms. Ginsburg has been an active volunteer Medicare counselor in Sacramento with California's SHIP and is a consultant for others working on civic deliberation to advance responsible health policy. She received her
A.A. in nursing at De Anza College, her B.S.N. at the University of Maryland, and her M.P.H. at UC Berkeley.

David Grabowski, Ph.D. David Grabowski, Ph.D., is a professor in the Department of Health Care Policy at Harvard Medical School in Boston, MA. His research primarily focuses on the economics of aging, with an emphasis on post-acute and long-term care financing, organization, and delivery of services. He has published over 200 peer-reviewed papers related to these issues. Dr. Grabowski has served as a member of multiple CMS technical expert panels related to post-acute care payment and quality reporting. He also was a member of the CMS Coronavirus Commission for Safety and Quality in Nursing Homes. He serves on the editorial board of several journals, including the American Journal of Health Economics. Dr. Grabowski received his Ph.D. in public policy from the Irving B. Harris School of Public Policy at the University of Chicago.

Jonathan Jaffery, M.D., M.S., M.M.M. Jonathan Jaffery, M.D., M.S., M.M.M., is chief health care officer at the American Association of Medical Colleges (AAMC), where he leads efforts to improve health care access, quality, equity, and affordability and to advance clinical leadership and effectiveness. Throughout his career, he has worked to align innovative care models that improve the health of populations with payment models that support that work. Previously, Dr. Jaffrey was on the faculty in the Division of Nephrology in the Department of Medicine at the University of Wisconsin-Madison (UW). Dr. Jaffery's prior roles include chief population health officer at UW Health and president of the UW Health ACO, where he provided strategic leadership for UW Health's transformation to value-based care. From 2008 to 2010, he served as the chief medical officer for the state of Wisconsin's Medicaid program. As a 2010-2011 Robert Wood Johnson Foundation Health Policy Fellow, Dr. Jaffery worked for the Senate Committee on Finance on a variety of issues relating to delivery-system and payment reform. A board-certified nephrologist, Dr. Jaffery is a member of numerous professional organizations, including the American Association for Physician Leadership and the American Society of Nephrology, and he is a fellow of the American College of Physicians. A graduate of the University of Michigan and the Ohio State University College of Medicine, Dr. Jaffery has graduate degrees from the University of Wisconsin School of Medicine and Public Health and
the University of Southern California Marshall School of Business.

Kenny Kan, F.S.A., C.P.A., C.F.A., M.A.A.A. Kenny Kan, F.S.A., C.P.A., C.F.A., M.A.A.A., is vice president and chief actuary of Horizon Blue Cross Blue Shield (BCBS) of New Jersey in Newark, NJ, where he recently helped launch a Medicare Advantage plan. Before joining Horizon BCBS, Mr. Kan was chief actuary for two other large health plans, where he oversaw efforts to assess payment and delivery innovations designed to improve quality and reduce cost. He also served for six years on the Maryland Health Care Commission. He is a fellow of the Society of Actuaries and a member of the American Academy of Actuaries. Mr. Kan earned his master in professional accounting from the University of Texas.

Amol Navathe, M.D., Ph.D. Amol Navathe, M.D., Ph.D., is director of the Payment Insights Team, codirector of the Healthcare Transformation Institute, and associate director of the Center for Health Incentives and Behavioral Economics in the Department of Medical Ethics and Health Policy at the University of Pennsylvania's Perelman School of Medicine. He is also an associate professor at Penn and staff physician at the Corporal Michael J. Crescenz VA Medical Center in Philadelphia, PA. Dr. Navathe's research group designs, tests, and evaluates payment models for public and private payers, including national insurers and state Blue Cross Blue Shield plans. His work led to the founding of Embedded Healthcare, a health care technology company that accelerates high-value practice using behavioral economics. Dr. Navathe received his M.D. from the University of Pennsylvania and his Ph.D. in health care management and economics from the Wharton School at the University of Pennsylvania.

Gregory P. Poulsen, M.B.A. Gregory P. Poulsen, M.B.A., is senior vice president at Intermountain Healthcare, an integrated health system based in Salt Lake City, UT. He has vast experience in strategy and policy for providing higher-quality health care while reducing health care costs. In addition, Mr. Poulsen was a key architect of many innovations at Intermountain Healthcare, including offering a Medicare Advantage plan and assisting with the transition to a value-based integrated health care delivery system. Mr. Poulsen was a founding member of the Commonwealth Fund Commission on a High Performance Health System as
well as a member of several other value-focused boards and task forces. He earned his master of business administration from Brigham Young University.

Betty Rambur, Ph.D., R.N., F.A.A.N. Betty Rambur, Ph.D., R.N., F.A.A.N., is the Routhier Endowed Chair for Practice and professor of nursing in the College of Nursing at the University of Rhode Island, where she has conducted research on such topics as alternative payment models, telehealth nursing, and value-based workforce redesigns. Before joining the University of Rhode Island, Dr. Rambur served on the Green Mountain Care Board-a five-member regulatory, innovation, and evaluation board that has broad responsibility for cost containment and oversight of Vermont's transition to post-fee-for-service provider reimbursement. Previously, Dr. Rambur served as dean of the College of Nursing and Health Sciences at the University of Vermont and was chairperson for the North Dakota Health Task Force, a statewide health care financing reform initiative. Dr. Rambur received her Ph.D. in nursing from Rush University.

Wayne J. Riley, M.D., M.P.H., M.B.A. Wayne J. Riley, M.D., M.P.H., M.B.A., is president of the State University of New York (SUNY) Downstate Health Sciences University, tenured professor of internal medicine and of health policy and management, and the chair of the Board of the New York Academy of Medicine. Immediately prior to joining Downstate, Dr. Riley served as clinical professor of medicine and adjunct professor of health care management at Vanderbilt University and as the 10th president and chief executive officer of Meharry Medical College. He began his career at Baylor College of Medicine, where he completed residency training in internal medicine and held several key administrative posts, including vice president and vice dean for health affairs and governmental relations, assistant dean for education, and assistant chief of medicine at Ben Taub Hospital-a leading public safety-net teaching hospital. Dr. Riley is a member of the National Academy of Medicine (NAM) of the National Academy of Sciences, where he served as vice chair and chair of the NAM Section on the Administration of Health Services, Education and Research. He is also president emeritus of the American College of Physicians, the nation's largest medical specialty society representing internal medicine, and the president of the Society of Medical Administrators, an organization of 50 of the nation's leading physician-
executives. He is an independent director of HCA Healthcare Inc., Compass Pathways PLC, and HeartFlow Group Inc. Dr. Riley earned a B.A. in anthropology from Yale University, an M.P.H. in health systems management from the Tulane University School of Public Health and Tropical Medicine, an M.D. from Morehouse School of Medicine, and an M.B.A. from Rice University's Jesse H. Jones Graduate School of Business.

Jaewon Ryu, M.D., J.D. Jaewon Ryu, M.D., J.D., is the president and CEO for Geisinger, an integrated health care system headquartered in Danville, PA, that comprises hospitals, employed providers, a health plan, a medical school, and research and innovation centers. He previously served as president of integrated care delivery at Humana and held leadership roles at the University of Illinois Hospital \& Health Sciences System and at Kaiser Permanente. Dr. Ryu received his undergraduate education at Yale University and his medical and law degrees from the University of Chicago, after which he completed his residency training in emergency medicine at Harbor-UCLA Medical Center.

Dana Gelb Safran, Sc.D. Dana Gelb Safran, Sc.D., is president and CEO of the National Quality Forum. A central feature of her work throughout her career has been combining the science of quality measurement with the art of its use to drive significant change in the quality, outcomes, and affordability of care. Dr. Safran's prior roles include serving for more than a decade as a senior executive at Blue Cross Blue Shield of Massachusetts (BCBSMA), where she was a lead
architect of the BCBSMA Alternative Quality Contract (AQC), which is widely credited with having catalyzed the value-based payment movement among public and private payers nationally. She was also a founding member of the executive team at Haven, a joint venture of Amazon, Berkshire Hathaway, and JPMorgan Chase to achieve better health outcomes, care experiences, and costs of care through innovation in care delivery, benefit design, and purchasing. Most recently, she was an executive team member at WELL Health Inc., a health care technology company. Dr. Safran is on the faculty of Tufts University School of Medicine and has held a broad range of advisory roles in the public sector and internationally, supporting efforts to improve health and health care through effective uses of performance measurement. She holds a B.A. in biology and government from Wesleyan University and completed her postgraduate studies at the Harvard School of Public Health to earn an Sc.M. and Sc.D. in health policy and management.

Scott Sarran, M.D., M.B.A. Scott Sarran, M.D., M.B.A., is the principal at Triple Aim Geriatrics, where he provides consultative services focused on improving systems of care for at-risk Medicare beneficiaries. His experience includes chief medical officer roles at large (Blue Cross Blue Shield IL and HealthCare Service Corporation) and small (MoreCare IL and Fidelis Senior Care) commercial, Medicaid, Medicare Advantage, and special needs plans (institutional, institutional equivalent, and chronic disease). He has also held chief medical officer roles with provider organizations (including Advocate HealthCare, Cook County Health, and University of Chicago), managing delegated risk.

James E. Mathews, Ph.D.
Executive director
Dana K. Kelley, M.P.A.
Deputy director

Analytic staff
Alison Binkowski, M.P.H, M.I.A.
Rachel Burton, M.P.P.
Carol Carter, Ph.D.
Evan Christman, M.P.Aff.
Betty Fout, Ph.D.
Geoffrey Gerhardt, M.P.P.
Tara O'Neill Hayes, M.S.P.P.M.
Andy Johnson, Ph.D.
Kathryn E. Linehan, M.P.H.
Jared Lane Maeda, Ph.D., M.P.H.
Kim Neuman, M.A.
Nancy Ray, M.S.
Eric Rollins, M.P.P.
Luis Serna, M.S.
Rachel Schmidt, Ph.D.
Katelyn R. Smalley, Ph.D., M.Sc.
Jeffrey Stensland, Ph.D.
Shinobu Suzuki, M.A.
Ledia Tabor, M.P.H.
Jamila Torain, Ph.D., M.P.H.
Ariel Winter, M.P.P.
Daniel Zabinski, Ph.D.

Research assistants
Lauren Stubbs
Corinna Cline

Assistant director
Stephanie Cameron, Sc.M.
Special assistant
Hope Kim

Chief financial officer
Mary Beth Spittel, M.S.

Production manager
Tina Jennings, MTESL
Administrative staff
Brian Gimbert
Nathan Graham
Timothy Gulley
Cynthia Wilson

## Advising the Congress on Medicare issues


[^0]:    Source: MedPAC analysis of the Medicare Current Beneficiary Survey, Cost Supplement file, 2019.

[^1]:    Note: FFS (fee-for-service), IPPS (inpatient prospective payment systems), OPPS (outpatient prospective payment system), N/A (not applicable). The number of general acute care hospitals that provided OPPS services is higher than the number that provided IPPS services primarily because about 200 facilities gained hospital provider numbers during the public health emergency but did not provide any inpatient services to FFS beneficiaries. Number of hospitals rounded to the nearest 10. "OPPS—Separately payable drugs" includes drugs, devices, blood products, and brachytherapy sources. Payments include applicable beneficiary cost-sharing responsibilities. "Year" refers to fiscal year for inpatient services and calendar year for outpatient services.

[^2]:    Note: "Relatively efficient hospitals" and "other hospitals" were identified based on their mean performance during 2017-2019 relative to the median hospital's performance during those years. We removed hospitals with a low share of Medicaid patient days reported on cost reports (the bottom 10 percent of hospitals) and hospitals in markets with high service use (top 10 percent of hospitals) due to concerns that socioeconomic conditions and aggressive treatment patterns can influence unit costs and risk-adjusted quality metrics. Data differ slightly from the data presented in our March 2022 report because we limit this set of data to providers that had 2021 cost report data. "Mortality rate" is the risk-adjusted rate of mortality within an inpatient stay through 30 days after the stay. "Readmission rate" is the risk-adjusted rate of readmission within 30 days of an inpatient stay. "Standardized Medicare costs per stay" is standardized for area wage rates, case-mix severity, prevalence of outlier and transfer cases, interest expense, low-income shares, and teaching intensity. "Share of patients rating the hospital a 9 or 10 (out of 10)" is based on Hospital Consumer Assessment of Healthcare Providers and Systems survey data collected from patients discharged July to December of 2021.

[^3]:    Note: MSNI (Medicare Safety-Net Index), LIS (low-income subsidy), FFS (fee-for-service), MS-DRG (Medicare severity-diagnosis related group), APC (ambulatory payment classification), MA (Medicare Advantage), DPP (disproportionate patient percentage). The MSNI identifies Iow-income beneficiaries as those receiving Part D's LIS, which includes all beneficiaries who receive full or partial Medicaid benefits, as well as those who do not qualify for Medicaid benefits in their state but who receive the Part D LIS because they have limited assets and an income below 150 percent of the federal poverty level. The measure of low-income beneficiaries incorporated in the DPP is limited to inpatient days for Medicare beneficiaries eligible for Supplemental Security Income; in 2021, these beneficiaries had incomes below 74 percent of the federal poverty level.

[^4]:    Source: MedPAC.

[^5]:    Note: DSH (disproportionate share hospital), IPPS (inpatient prospective payment systems), SSI (Supplemental Security Income), UC (uncompensated care), FFS (fee-for-service), MA (Medicare Advantage), MSNI (Medicare Safety-Net Index), OPPS (outpatient prospective payment system), LIS (lowincome subsidy). LIS beneficiaries include all beneficiaries who receive full or partial Medicaid benefits, as well as those who do not qualify for Medicaid benefits in their state but who receive the Part D LIS because they have limited assets and an income below 150 percent of the federal poverty level.
    *The uncompensated care payments in 2019 were still a blend of one-third payment based on Medicaid and SSI days and two-thirds based on reported uncompensated care costs. Uncompensated care payments were fully based on uncompensated care costs in 2020.

[^6]:    Note: FFS (fee-for-service). We use the number of FFS Medicare beneficiaries enrolled in Part B to define units of service and allowed charges per beneficiary.

[^7]:    Note: Totals may not sum to 100 percent because of rounding and because the table excludes the following responses: "Don't know" and "Refused." Each year's sample consists of approximately 4,000 Medicare beneficiaries and 4,000 privately insured people, but sample sizes for individual questions varied. Surveyed Medicare beneficiaries include those enrolled in fee-for-service Medicare or Medicare Advantage. Results from 2022 are not directly comparable to prior years due to a change in our survey methodology (e.g., switching from an interviewer-administered survey to a self-administered survey).
    a Statistically significant difference between Medicare beneficiaries and the privately insured in a given year (at a 95 percent confidence level).
    ${ }^{\text {b }}$ Statistically significantly difference between 2021 and a prior year within the same insurance category (at a 95 percent confidence level).

[^8]:    Source: MedPAC-sponsored access-to-care surveys conducted from 2018 to 2022.

[^9]:    Note: Totals may not sum to 100 percent because of rounding and because the table excludes the following responses: "Don't know" and "Refused." Sample consists of approximately 4,000 Medicare beneficiaries and 4,000 privately insured people, but sample sizes for individual questions varied. Surveyed Medicare beneficiaries include those enrolled in fee-for-service Medicare or Medicare Advantage. "Urban" respondents reside in an urban or suburban part of a metropolitan statistical area (MSA); the Census Bureau defines MSAs as having at least one urbanized area with a population of 50,000 or more and including adjacent territory that has a high degree of social and economic integration as measured by commuting ties. "Rural" respondents reside outside of an MSA.
    ${ }^{\text {a }}$ Statistically significant difference between Medicare beneficiaries and the privately insured within the same area type (at a 95 percent confidence level).
    ${ }^{\mathrm{b}}$ Statistically significant difference by area type within the same insurance category (at a 95 percent confidence level),

[^10]:    Source: MedPAC-sponsored access-to-care survey conducted in August 2022.

[^11]:    Note: Totals may not sum to 100 percent because of rounding and because the table excludes the following responses: "Don't know" and "Refused." Sample consists of approximately 4,000 Medicare beneficiaries and 4,000 privately insured people, but sample sizes for individual questions varied. Surveyed Medicare beneficiaries include those enrolled in fee-for-service Medicare or Medicare Advantage. "White" refers to non-Hispanic White respondents, "Black" refers to non-Hispanic Black respondents, and "Hispanic" refers to Hispanic respondents of any race.
    a Statistically significant difference between Medicare beneficiaries and the privately insured within the same race/ethnicity category (at a 95 percent confidence level).
    b Statistically significant difference by race/ethnicity within the same insurance group (at a 95 percent confidence level).

[^12]:    Source: MedPAC analysis of CMS Provider of Services file, 2022

[^13]:    Note: ASC (ambulatory surgical center). CAHPS is a registered trademark of the Agency for the Healthcare Research and Quality. *CMS has made this measure voluntary in 2025 and mandatory in 2027.

    Source: Final rule for outpatient prospective payment system and ambulatory surgical center payment system, 2022.

[^14]:    Note: SNF (skilled nursing facility). Except for the margins at the 25th and 75th percentiles, the margins in the table are aggregates for the facilities included in the group. All margins exclude the federal relief funds. "Frontier" refers to SNFs located in counties with six or fewer people per square mile. "Facility volume" includes all facility days.

    Source: MedPAC analysis of 2020 and 2021 freestanding SNF Medicare cost reports.

[^15]:    Note: Home health agencies were classified as majority urban if they provided more than 50 percent of 30 -day periods to beneficiaries in urban counties and were classified as majority rural if they provided more than 50 percent of episodes to beneficiaries in rural counties. These data do not include federal provider relief funds that HHAs received due to the public health emergency.

[^16]:    Note: MSS (medical social services), HHA (home health agency). Sample includes freestanding HHAs with complete data for three consecutive years. "Low-use 30-day periods" are those with low numbers of in-person visits, and these periods are paid on a per visit basis (the threshold for these payments depends on the payment group a period is assigned to, and it ranges from two to six in-person visits). "Outlier 30-day periods" are those that received a very high number of in-person visits and qualified for outlier payments. Share of in-person visits by type may not sum to 100 percent due to rounding.

[^17]:    Note: IRF (inpatient rehabilitation facility), FFS (fee-for-service). "Other neurological conditions" includes multiple sclerosis, Parkinson's disease, polyneuropathy, and neuromuscular disorders. "Fracture of the lower extremity" includes hip, pelvis, and femur fractures. Patients with debility have generalized deconditioning not attributable to other conditions. "Other orthopedic conditions" excludes fractures of the hip, pelvis, and femur, and hip and knee replacements. "All other conditions" includes conditions such as amputations, arthritis, and pain syndrome. "Brain injury" and "spinal cord injury" include both traumatic and nontraumatic injuries. All FFS Medicare IRF cases with valid patient assessment information were included in this analysis. Yearly figures presented in the table are rounded.
    ${ }^{\text {a }}$ The compliance threshold requires that at least 60 percent of an IRF's patients have 1 of 13 specified diagnoses or have a comorbidity that could cause significant decline in functional ability such that the patient requires intensive rehabilitation. Some FFS cases with conditions that do not meet the compliance threshold could thus be counted toward the threshold if they had certain comorbidities. In response to the coronavirus public health emergency, CMS waived the compliance threshold beginning in March 2020.
    ${ }^{b}$ Cases admitted for rehabilitation after major joint replacement of the lower extremity count toward the compliance threshold if joint replacement was bilateral, if the patient had a body mass index of 50 or greater, or if the patient was age 85 or older.
    ${ }^{c}$ Conditions in the "all other" category that meet the compliance threshold include congenital deformity, lower limb amputations, major multiple traumas, burns, and certain arthritis cases.

[^18]:    Note: IRF (inpatient rehabilitation facility), N/A (not applicable). All data are medians unless otherwise indicated. The analysis included 1,012 IRFs that met the data requirements and minimum case counts (60). IRFs were identified as "relatively efficient" based on a cost measure (costs per discharge) and two quality measures (rates of hospitalizations during the stay and successful discharge to community) between 2017 and 2019 Relatively efficient IRFs were those in the best third of the distribution for one measure and not in the worst third for any measure in each of the three years. Costs per discharge were standardized for differences in area wages; mix of cases; and prevalence of high-cost outliers, short-stay outliers, and transfer cases. Quality measures were calculated for all facilities with 60 or more fee-for-service stays. Successful discharge to the community includes beneficiaries discharged to the community (excluding those discharged to the same nursing home) who did not have an unplanned hospitalization or die in the 30 days after discharge. The all-condition hospitalization measure captures all unplanned hospital admissions and readmissions and outpatient observation stays that occur during the stay. High rates of hospitalization during the stay indicate worse quality and high rates of successful discharge to community indicate better quality. "Other neurological conditions" includes multiple sclerosis, Parkinson's disease, polyneuropathy, and neuromuscular disorders.

    Source: MedPAC analysis of Medicare cost report data, Medicare Provider Analysis and Review data, and Inpatient Rehabilitation Facility-Patient Assessment Instrument data from CMS for 2017 to 2021.

[^19]:    Note: FFS (fee-for-service), MA (Medicare Advantage). For each demographic group, the share of decedents who used hospice is calculated as follows: The number of beneficiaries in the group who both died and received hospice in a given year is divided by the total number of beneficiaries in the group who died in that year. "MA beneficiaries" refers to hospice enrollees who were enrolled in MA as of the last month of life. Prior to 2021, all individuals in the "MA beneficiaries" group received hospice paid for by the FFS program; beginning in 2021 , most individuals in the "MA beneficiaries" group received hospice paid for by FFS, and a small number received hospice paid for by their MA plan under the MA valuebased insurance design model. Beneficiary location reflects the beneficiary's county of residence in one of four categories (urban, micropolitan, rural adjacent to urban, or rural nonadjacent to urban) based on an aggregation of the Urban Influence Codes (UIC). This chart uses the 2013 UIC definition. The frontier category is defined as population density equal to or less than six people per square mile and overlaps with the beneficiary county of residence categories. Analysis excludes beneficiaries without Medicare Part A because hospice is a Part A benefit.

[^20]:    Source: MedPAC analysis of data from the Common Medicare Enrollment file and hospice claims data from CMS.

[^21]:    Note: "Visits" refers to in-person visits only. Nurse visits include both registered nurse and licensed practical nurse visits. "Social worker visits and calls" includes in-person social worker visits and social worker phone calls to patients or family. Number of visits by category may not sum to total number of visits due to rounding.

[^22]:    Source: MedPAC analysis of Medicare hospice claims data from CMS

[^23]:    Note: MA (Medicare Advantage), FFS (fee-for-service).
    aThe June 2020 quality recommendation incorporates the Commission's prior recommendations eliminating the doubling of the quality increases in specified counties (recommended in March 2016) and establishing a geographic basis for MA quality reporting that reflects health care market areas (June 2005, March 2010, and March 2018).
    bThe June 2021 benchmark recommendation incorporates the Commission's prior recommendations eliminating the cap on benchmark amounts implemented by the Affordable Care Act of 2010 (recommended in March 2016), basing benchmarks on FFS spending data only for beneficiaries with both Part A and Part B (recommended in March 2017), and establishing a geographic basis for MA payments that reflects health care market areas (recommended in June 2005, March 2010, and March 2018).
     Medicare Payment Advisory Commission 2016.

[^24]:    Note: MA (Medicare Advantage), FFS (fee-for-service). Estimates have not been adjusted for favorable selection of beneficiaries who choose to enroll in MA plans (i.e., underlying differences in risk-standardized spending between the MA and FFS populations that are not captured by risk scores, which would increase MA payments relative to FFS spending). The table reflects the Commission's estimates of the impact of coding intensity in each year. Retrospective estimates include both claims and nonclaims FFS spending. Retrospective estimates are restricted to beneficiaries who had both Part A and Part B coverage, had Medicare as their primary payer, did not have end-stage renal disease, and resided in the 50 states and the District of Columbia. Prospective estimates use the figures for FFS per beneficiary spending that CMS's Office of the Actuary generates to determine the MA benchmarks that plans use when submitting bids. Those FFS spending figures are calculated by summing (1) riskstandardized Part A FFS monthly spending for all Part A enrollees and (2) risk-standardized Part B FFS monthly spending for all Part B enrollees. In contrast with Figure $17-5$, employer plans are not included in the results in the table. Our originally published prospective estimates did not include employer plans because, as of 2017, these plans stopped submitting bids. As shown in Figure 11-5, including employer plans would increase MA payments relative to FFS spending by about 1 percentage point in each year. Prospective estimates of coding are our most recent estimates (from two years prior) at the time of publication of the Commission's annual March report to the Congress. Retrospective estimates of coding differences reflect the actual coding estimate for each given year.
    *In our March 2016 report, the Commission did not publish a 2016 estimate of the impact of coding intensity on MA payments relative to FFS spending.
    ${ }^{\text {a }}$ Table 12-4 of the Medicare Payment Advisory Commission's Report to the Congress: Medicare payment policy, 2016.
    ${ }^{\text {b }}$ Table 13-6 of the Medicare Payment Advisory Commission's Report to the Congress: Medicare payment policy, 2017.
    ‘Table 13-4 of the Medicare Payment Advisory Commission's Report to the Congress: Medicare payment policy, 2018.
    dTable 13-3 of the Medicare Payment Advisory Commission's Report to the Congress: Medicare payment policy, 2019.

[^25]:    Note: MA (Medicare Advantage), PHE (public health emergency). Before 2020, many MA plans used contract consolidations to artificially increase star ratings. Flexible reporting rules were allowed during the first year of the coronavirus pandemic, boosting 2022 star ratings, but reporting rules returned to normal in 2023. Star ratings are applied to plan payments in the subsequent year. For example, 2023 star ratings are used in the calculation of 2024 payment rates.

[^26]:    Source: MedPAC analysis of CMS star rating fact sheets for 2015 through 2023

[^27]:    Note: LIS (low-income subsidy), OOP (out-of-pocket). Figure depicts the restructured defined standard benefit as it would apply to brand-name drugs and biologics. For generic drugs (not depicted above), plan sponsors must cover 75 percent of enrollee spending between the deductible and OOP cap (instead of 65 percent for brand-name drugs and biologics), and Medicare's reinsurance will pay for 40 percent of spending in the catastrophic region (instead of 20 percent). The deductible and total spending amount at the OOP threshold are projections and subject to change.

    Source: MedPAC depiction of redesigned Part D benefit structure resulting from changes made by the Inflation Reduction Act of 2022.

