

CHAPTER 11

**The Medicare Advantage
program: Status report**

The Medicare Advantage program: Status report

Chapter summary

Each year, the Commission provides a status report on the Medicare Advantage (MA) program, which gives Medicare beneficiaries the option of receiving benefits from private plans rather than from traditional fee-for-service (FFS) Medicare. In 2024, the MA program included 5,678 plan options offered by 175 organizations, enrolled about 33.6 million beneficiaries (54 percent of Medicare beneficiaries with both Part A and Part B coverage), and paid MA plans an estimated \$494 billion (not including payments for drug coverage offered by MA plans). To monitor program performance, we examine MA enrollment trends, plan availability for the coming year, plan generosity (including enhanced financial protections and supplemental benefits), and payments for MA plan enrollees relative to spending for beneficiaries enrolled in FFS Medicare. We also provide updates on risk adjustment, risk-coding practices, favorable selection of enrollees into MA, the structure of the MA market, and the current state of quality reporting in MA.

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 FFS Medicare, while others may prefer features of MA, like reduced

In this chapter

- Robust MA enrollment, plan availability, and rebates
- Higher payments to MA plans stem from favorable selection and coding intensity
- Industry concentration, integration, and financial condition
- Quality in MA
- Commission recommendations to improve MA payment policies
- Technical Appendix 11-A: Favorable selection
- Technical Appendix 11-B: Coding intensity

premiums and cost-sharing liability. MA plans are required by statute to offer an out-of-pocket spending limit that is not included in FFS Medicare, and plans can reduce cost-sharing liability, offer integrated Part D benefits, and provide supplemental benefits that generally are not available to beneficiaries in FFS unless they purchase additional health insurance coverage or pay for the services out of pocket. The Commission has separately expressed concerns about the FFS program, including a benefit design that exposes beneficiaries to substantial financial risk, use of low-value care that can stem from open networks and the general absence of utilization management, and Medigap policies that include first-dollar coverage. Because Medicare pays private plans a partially predetermined rate that is risk adjusted for each 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 a nearly record-high level of supplemental benefits. From 2018 to 2024, the share of eligible Medicare beneficiaries enrolled in MA rose from 37 percent to 54 percent. In 2025, the average Medicare beneficiary has a choice of 42 plans offered by an average of eight organizations.

In 2025, we estimate that Medicare will spend 20 percent more for MA enrollees than it would spend if those beneficiaries were enrolled in FFS Medicare, a difference that translates into a projected \$84 billion. The higher payments we estimate relative to FFS vary significantly across MA parent organizations and are not an estimate of plan profits and administrative expenses. These increased payments to MA plans are the primary source of funding for supplemental benefits, which include coverage of non-Medicare services (services not covered by Part A and Part B) and better financial protection for MA enrollees relative to beneficiaries in FFS Medicare without supplemental coverage. The rebates that plans use to finance these benefits have nearly doubled since 2018 and account for a projected 17 percent of payments to all MA plans (some of which goes to plan administrative expenses and profit).

In 2025, the Medicare program pays conventional plans \$2,255 per beneficiary for supplemental benefits (including \$180 for plan administrative expenses and profit). On average, plans project using about 38 percent of these funds to reduce cost sharing for MA enrollees, 25 percent for non-Medicare services, about 23 percent to enhance plans' Part D benefit through lower

premiums or reduced cost sharing, about 6 percent to reduce MA enrollees' Part B premiums, and about 8 percent for administrative expenses and profit. However, currently there is no reliable information about the extent to which beneficiaries use these benefits or about their value.

The relatively higher payments to MA plans are financed by the taxpayers and beneficiaries who fund the Medicare program. Higher MA spending increases Part B premiums for all beneficiaries, including those in FFS Medicare; the Commission estimates that Part B premium payments will be about \$13 billion higher in 2025 because of higher Medicare payments to MA plans (equivalent to roughly \$198 per beneficiary per year).

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, in total, private plans have never been paid less than FFS Medicare because of policies that increase payments to MA above FFS payments and distort the nature of plan competition in MA. For example, MA benchmarks are set above FFS spending in many markets in part to encourage more uniform plan participation across the country. Payments under the quality-bonus program further increase MA payments above FFS (without, the Commission has found, producing meaningful information on plan quality for Medicare beneficiaries or the Medicare program).

The two largest factors responsible for higher payments to plans in recent years are favorable selection and coding intensity. "Favorable selection" into MA occurs when beneficiaries with lower actual spending relative to their risk score tend to enroll in MA; it is the extent to which risk-standardized spending of MA enrollees would be lower than the FFS average without any intervention from MA plans. "Coding intensity" refers to the tendency for more diagnosis codes to be recorded for MA enrollees, which causes risk scores—and payments—for the same beneficiaries to be higher when they are enrolled in MA than they would be in FFS. Both favorable selection and coding intensity lead to pricing errors that cause CMS's risk-adjustment system to set the payment rate too high for a given MA enrollee.

Favorable selection may stem from a variety of factors, including beneficiary propensities for using care for reasons unrelated to their health, differences in health status that are not accounted for by risk scores, or provider practice styles, among other reasons. Similarly, MA coding intensity is driven by several

factors, including MA plans' documenting diagnoses more comprehensively than providers in FFS Medicare, submitting fraudulent diagnostic data, and other reasons. Separately identifying all of these different factors is challenging and in many cases is not possible given available data. However, regardless of the causes, favorable selection of enrollees in MA and higher MA coding intensity increase Medicare's payments to plans. Higher payments to MA plans fund more generous benefits, but those higher payments increase Medicare spending and create an imbalance, and policymakers must weigh the added cost with the unmeasured value of the added benefits. Past experience with reductions in MA payments has demonstrated that plans can adjust their bidding behavior and lessen effects on plan participation and beneficiary enrollment while achieving program savings.

The Commission contends that important reforms are needed to improve Medicare's policies of paying and overseeing MA plans. First, reforms are needed to reduce the level of Medicare payments to MA plans. Relatively higher levels of payment stem largely from coding intensity and favorable selection. Second, the program that is used to reward plans for better quality is administratively burdensome, adds significantly to program costs, and does not meaningfully improve quality. Relatedly, beneficiaries lack meaningful quality information when choosing among MA plans. Third, MA benchmarks generate a number of inequities, including "cliff" effects from dividing counties into quartiles, caps on benchmarks, and benchmarks that are skewed by the inclusion of FFS-spending data for beneficiaries with only Part A coverage. Fourth, Medicare must address the challenges, burdens, and care disruptions for beneficiaries that stem from the process of choosing between plans and from changes to provider networks. Finally, the Commission finds that plan-submitted data about beneficiaries' health care encounters are incomplete, and we lack information about the use of many MA supplemental benefits. Without these data, policymakers cannot fully understand enrollees' use of services, which limits policymakers' ability to oversee the program and assess the value that enrollees get from supplemental benefits.

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. In addition, because of Medicare's fiscal situation, the growth in subsidization of supplemental benefits should be considered with attention to their value.

In the Commission's view, current policy does not allow policymakers to understand and assess how beneficiaries are using or valuing those benefits.

Medicare payments to plans—In 2025, Medicare's payments to MA plans will total a projected \$538 billion (about \$507 billion excluding projected payments for enrollees with end-stage renal disease). As noted above, we project that Medicare's payments to MA plans in 2025 (including rebates that finance supplemental benefits) will be \$84 billion more, or about 20 percent higher, than if MA enrollees were enrolled in FFS Medicare. This estimate reflects higher MA coding intensity, even after the annual CMS coding adjustment; favorable selection of beneficiaries in MA; setting benchmarks—the maximum amount Medicare will pay an MA plan to provide Part A and Part B benefits—above FFS spending in low-FFS-spending counties; and payments associated with benchmark increases under the quality-bonus program, which the Commission contends does not effectively promote high-quality care.

Favorable selection—When setting MA benchmarks, CMS implicitly assumes that if MA enrollees were in FFS, their average Medicare spending would be equal to that of current FFS enrollees in the same county after adjusting for differences in risk scores. Favorable selection into MA causes risk scores to systematically overpredict spending for MA enrollees; that is, spending on the average MA enrollee is lower relative to what their risk score—and MA-plan payment—would suggest. This lower-than-predicted spending is evident in the years prior to a beneficiary enrolling in an MA plan and thus cannot be attributed to any plan activity (such as utilization management or coding practices). Favorable selection can pertain to health status (relative to the risk-based payments that MA plans receive) but can also pertain to factors such as beneficiary propensities for seeking care for reasons that are unrelated to their health.

We estimate that favorable selection increased MA payments in 2022 by roughly 10 percent above what the program would have paid under FFS Medicare. We project that in 2025, favorable selection will increase MA payments by roughly 11 percent above what the program would have paid under FFS Medicare, or \$44 billion of the \$84 billion in higher total payments to MA plans. We found relatively little variation in favorable selection by MA market penetration; that is, we estimate that favorable selection persists as the share of MA enrollees in a market increases. In addition, there were larger favorable-selection effects on MA enrollees with higher risk scores, implying that selection persists even as beneficiaries with more chronic conditions

enroll in MA. These two findings highlight the fact that selection can grow even when sicker beneficiaries join MA because selection is driven by the tendency for risk scores to overpredict what FFS spending would have been for MA enrollees, not the average risk. In other words, Medicare's payments to MA plans can be too high even for enrollees with expensive health conditions. In fact, beneficiaries with higher risk scores can exhibit greater selection because there is more potential for overprediction.

The Commission's estimates of favorable selection are reasonably robust and in line with a growing body of research that also estimates substantial effects from favorable selection on Medicare payments to MA plans.

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 both MA and FFS Medicare, claims include both procedure and diagnosis codes; however, most FFS Medicare claims are paid using only procedure codes, which offers little incentive for providers to record more diagnosis codes than necessary to justify providing a service. Indeed, research has shown that diagnoses are reported inconsistently from year to year even for FFS beneficiaries with chronic conditions such as kidney failure or paraplegia. Instead, FFS providers may be more likely to focus on diagnoses that are a primary reason for a visit. In contrast, MA plans have a financial incentive to ensure that their providers record all possible diagnoses because adding new risk-adjustment-eligible diagnoses raises an enrollee's risk score and results in higher payments to the plan. Plans have several mechanisms that do not exist in FFS Medicare to document diagnoses for their enrollees, including chart reviews (which document diagnoses not captured through the usual means of reporting diagnoses) and health risk assessments (which sometimes rely on unverified enrollee-reported data). In addition, whistleblowers and the Department of Justice allege that some MA plans have submitted fraudulent diagnoses for risk adjustment. There are no data available to parse the share of higher MA coding intensity that is due to lower coding incentives in FFS Medicare, variation in diagnostic discretion, fraud, or other reasons. However, because the risk-adjustment model is calibrated on FFS claims, relatively higher MA coding intensity—regardless of the reason—increases payments to MA plans above FFS spending. In response to a congressional request, we include in this chapter an analysis of the differences in incentives between FFS Medicare and MA plans to document

diagnoses, as well as estimated rates of documenting chronic conditions in subsequent years in MA and FFS Medicare.

We estimate that in 2023, MA risk scores were about 17 percent higher than scores for similar FFS beneficiaries due to higher coding intensity. (Last year, the Commission adopted a new method of estimating the effects of coding intensity; see Chapter 13 of our March 2024 report and Technical Appendix 11-B (p. 388) for more information on our method of estimating coding intensity.) We project that in 2025, MA risk scores will be about 16 percent higher than scores for similar FFS beneficiaries after accounting for the phase-in of the V28 risk-adjustment model. By law, CMS reduces all MA risk scores by the same amount 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 2025, the adjustment will reduce MA risk scores by the minimum amount, 5.9 percent, resulting in MA risk scores that will remain about 10 percent higher than they would have been if MA enrollees were in FFS Medicare. Those higher scores will result in a projected \$40 billion of the \$84 billion in higher total payments to MA plans.

We continue to find that coding intensity varies significantly across MA plans: 15 percent of MA enrollees are in plans that have coding intensity that falls below the 5.9 percent reduction (and even below FFS levels), and other plans code far above that amount, including 16 MA organizations with average coding intensity that is more than 20 percent higher than FFS levels. Among the 10 largest MA organizations, we estimate a 26 percentage point variation in average coding intensity. Higher coding intensity allows some plans to offer more supplemental benefits—and attract more enrollees—than other plans. That result distorts both the nature of plan competition in MA and 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, use two years of MA and FFS diagnostic data, and apply an adjustment to MA risk scores to address any residual impact of coding intensity. In analysis of risk scores for 2020 through 2023, we find that about half of higher MA coding intensity could result from use of diagnoses from chart reviews and health risk assessments and that these two mechanisms are primary factors driving coding differences among MA plans. Thus, the Commission expects that our recommendation, along with the exclusion of chart reviews from risk adjustment, would reduce the heterogeneity in observed coding intensity across MA organizations.

Quality in MA—The MA quality-bonus program increases MA payments by about \$15 billion annually. In 2025, 69 percent of MA enrollees are in a plan that received a quality-bonus increase to its benchmark. At the same time, beneficiaries in MA and FFS report similar satisfaction with their coverage. Enrollees in both MA and FFS tend to rate their coverage and access to care highly—a trend that has held over time. For example, scores for all measures on the MA and FFS Consumer Assessment of Healthcare Providers and Systems surveys, except annual flu vaccine, were above 80 percent from 2018 to 2023. ■

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. MA plans typically have flexibility to use alternative payment models, 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 has fewer incentives to coordinate care and is limited in its ability to make care delivery more efficient.¹

The Commission strongly supports including 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 FFS Medicare, while others may prefer features of MA, like reduced premiums and cost-sharing liability. MA plans are required by statute to offer an out-of-pocket spending limit that is not included in FFS Medicare. MA plans also can offer integrated Part D benefits, provide supplemental benefits not covered by Part A or Part B of Medicare, and reduce cost-sharing liability and premiums. For 2025, we estimate that conventional MA plans (those available to all MA enrollees) will receive an average rebate from CMS of \$2,255 per enrollee (or \$2,075 after subtracting plan projections for administrative costs and profit for these services) to provide supplemental benefits during the year and that more than half of that amount will be allocated to reducing beneficiaries' cost sharing or Part B and Part D premiums. In exchange for these benefits, MA plan enrollees accept provider networks and utilization-management tools such as higher cost sharing to access providers who are not in their plan's network. Because private plans and FFS Medicare have structural aspects that appeal to different segments of the Medicare population, the Commission supports payment policies that do not unduly favor MA or FFS.

The Commission has expressed concern about the FFS benefit design and has recommended changes to give beneficiaries better protection against high out-of-pocket (OOP) spending and to create incentives for them to make better decisions about their use of

discretionary care. Protecting beneficiaries against high OOP spending would enhance the overall value of the FFS benefit and mitigate the need for beneficiaries to purchase supplemental insurance (Medicare Payment Advisory Commission 2012a). The Commission's recommendation also creates clearer incentives for beneficiaries to make better decisions about their use of care through adjustments and refinements in cost sharing based on evidence of service value while holding the aggregate beneficiary cost-sharing liability about the same as under current law. Finally, our recommendation would add a charge on supplemental insurance (such as Medigap) to recoup at least some of the additional costs resulting from the higher service use that supplemental insurance imposes on the Medicare program while still providing beneficiaries the choice to buy supplemental coverage if they wish to do so.

Each year, as required by law, 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, plan generosity (including enhanced financial protections and supplemental benefits), and payments for MA plan enrollees relative to spending for beneficiaries enrolled in traditional FFS Medicare. We also provide updates on risk adjustment, risk-coding practices, favorable selection of enrollees into MA, the structure of the MA market, and the current state of quality reporting 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.² The analysis does not include non-MA private-plan options such as cost plans that may be available to some beneficiaries. The primary MA plan types are:

- **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.³ They can choose individual counties to serve and can vary their premiums and benefits across counties.
- **Regional PPOs**—These plans must offer a uniform benefit package and premium across CMS-designated regions made up of one or more

states. Regional PPOs have more flexible provider-network requirements than local PPOs. For instance, regional PPOs may meet Medicare access requirements by arranging for enrollees to obtain plan-covered services through noncontracted providers at in-network cost-sharing levels for enrollees.

Two additional plan classifications cut across plan types: special-needs plans (SNPs) and employer group plans. SNPs offer benefit packages tailored to specific populations (that is, 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 and are not available to all Medicare beneficiaries, so they are not included in our analysis of bids or plan availability.

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 decreasing a plan's payment rate for beneficiaries who are likely to have lower medical expenses. The general purpose of risk adjustment is to accurately predict costs on average for a group of beneficiaries with similar attributes that affect health care costs, thereby reducing incentives for plans to avoid beneficiaries with certain unprofitable attributes and to attract those with profitable attributes.

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 its costs of providing the Part A and Part B benefit package for a beneficiary of average spending. The benchmark

is the maximum amount of Medicare payment set by law for an MA plan to provide Part A and Part B benefits.⁴ (Medicare also pays many plans for providing the Part D drug benefit, but those payments are determined through the Part D bidding process and are not discussed here.) Plans with higher quality ratings are rewarded with a higher benchmark (although the increase to the benchmark can be limited by the Affordable Care Act of 2010 (ACA) benchmark caps).

For 2025, almost 100 percent of plans bid below their benchmarks. For these plans, the base rate is the plan's bid plus a "rebate" equal to 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).⁵ 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).

The rebate that plans receive must be used to provide supplemental benefits to enrollees in the form of lower cost sharing, lower premiums, or coverage of non-Medicare services (benefits not covered by Part A or Part B). Plans also devote some of the rebate to their administrative costs and profit. Plans can 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.⁶ (A more detailed description of the MA program's payment system can be found in our *Payment Basics* series at <https://www.medpac.gov/document-type/payment-basic/>.)

How Medicare calculates MA benchmarks

Under the 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.⁷ 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 enable enrollees to receive supplemental benefits, and high-FFS-spending counties have benchmarks lower than FFS spending with the goal of generating Medicare savings because MA plans have greater

opportunity to produce spending efficiencies in these areas. 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 2024 to the 107.5 percent quartile in 2025 would have a blended rate of 103.75 percent in 2025.

By statute, plans that are 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.⁸ 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 and beneficiary premiums. The Commission has repeatedly recommended that an MA quality-incentive program be budget neutral (that is, financed with a share of plan payments) and focused on measures tied to clinical outcomes and patient experience (Medicare Payment Advisory Commission 2020a, Medicare Payment Advisory Commission 2019, Medicare Payment Advisory Commission 2012b, Medicare Payment Advisory Commission 2004).

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,

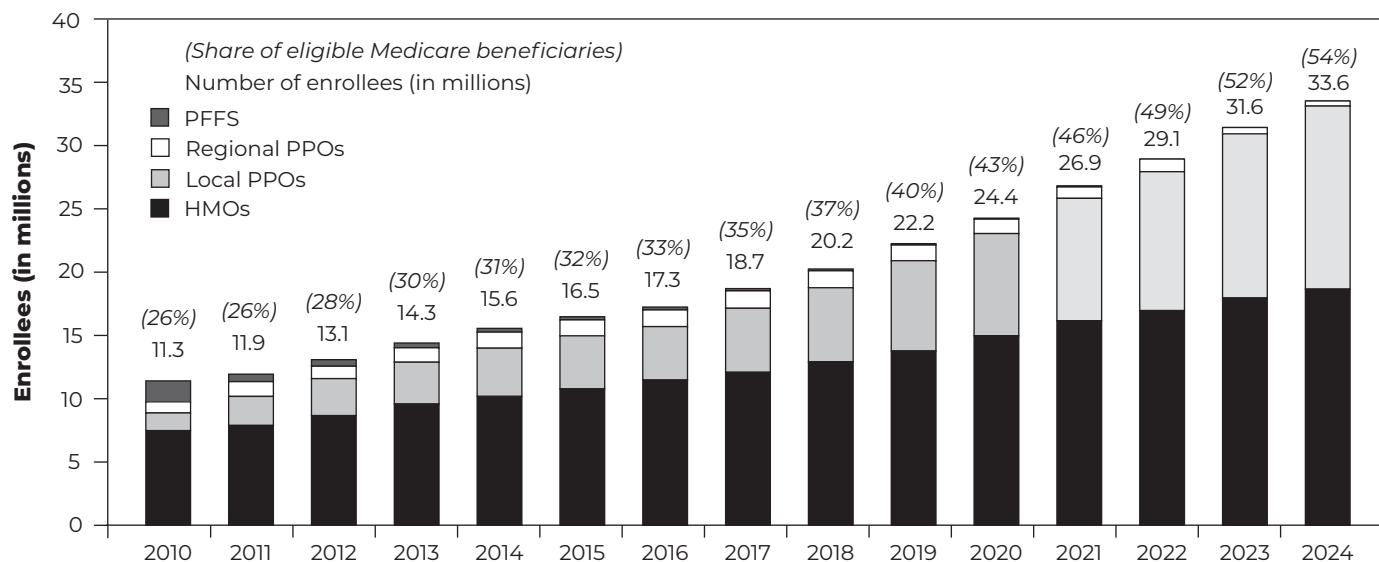
Medicaid enrollment, and disability status) and certain diagnoses grouped into HCCs to calculate a risk score for each enrollee. HCCs are medical conditions or groups of related conditions with similar treatment costs. Some conditions have more than one HCC, which differ by severity of the condition and are arrayed in a hierarchy. For example, the CMS-HCC model has four HCCs for chronic kidney disease listed here in order of highest severity: Stage 5, Stage 4, Stage 3B, and Stage 3 (except Stage 3B). 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 applicable to that beneficiary.

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.⁹ Diagnostic data collected from encounters in one year are used to predict Medicare costs for the following year.

CMS designed this risk-adjustment model to maximize its ability to predict annual medical expenditures for FFS Medicare beneficiaries while also ensuring that the model's diagnostic categories were clinically meaningful and "sufficiently clinically specific to minimize opportunities for gaming or discretionary coding" (Pope et al. 2004). CMS has two requirements aimed at ensuring 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.¹⁰ Diagnoses resulting from telehealth services meet the face-to-face requirement when the services are provided using interactive audio and video telecommunication that enables real-time communication with the beneficiary. To verify that diagnoses are supported by evidence in the patient's medical record, CMS conducts risk-adjustment data validation (RADV) audits. RADV audits have been limited so far, but the available results show significant issues with medical-record support for risk-adjustment

FIGURE 11-1

Share of eligible Medicare beneficiaries enrolled in Medicare Advantage has more than doubled since 2010



Note: 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 this figure.

Source: MedPAC analysis of CMS enrollment files, July 2010 to July 2024.

diagnoses (Schulte and Hacker 2022).¹¹ For example, the Department of Health and Human Services Office of Inspector General has conducted RADV-like audits of high-risk diagnoses for at least 30 MA contracts and found that 70 percent of all diagnosis codes audited were not supported by medical records and that some diagnoses were not supported over 90 percent of the time (Office of Inspector General 2023). (See text box for update on RADV audits, pp. 364–365.)

The CMS–HCC model is calibrated using FFS claims data so that each beneficiary’s risk score reflects the expected spending that would occur for a beneficiary relative to the national average spending in FFS Medicare. Therefore, risk scores do not reflect geographic spending variation, a beneficiary’s propensity to seek care, differences between MA and FFS Medicare (including variation in plans’ benefit design or initiatives to influence spending), or differences in diagnostic-coding practices between MA

and FFS Medicare and across MA plans. These factors do drive differences between actual spending for MA enrollees and the expected spending based on MA risk scores. Some of these factors are reflected in our estimates of the effects of favorable selection into MA and of higher diagnostic-coding intensity in MA.

Robust MA enrollment, plan availability, and rebates

Substantial growth in MA-plan enrollment, availability, and rebates indicates a robust MA program. As of 2024, more than half of eligible Medicare beneficiaries were enrolled in MA plans. For 2025, the average beneficiary has access to 42 plans sponsored by eight organizations. Rebates that finance supplemental benefits are at nearly record-high levels.

**TABLE
11-1**

Enrollment growth in local PPOs continued to outpace growth in other plan types in 2024

	MA enrollment (in millions)		Percent change in enrollment (2023–2024)
	July 2023	July 2024	
Total MA-eligible beneficiaries	60.4	61.7	2%
Total MA enrollment	31.6	33.6	6
Plan type			
HMO	18.1	18.7	3
Local PPO	12.9	14.5	12
Regional PPO	0.5	0.4	-27
PFFS	<0.05	<0.05	-8
Restricted-availability plans included in totals above			
SNPs*	6.1	6.9	13
Employer group*	5.5	5.8	6

Note: MA (Medicare Advantage), HMO (health maintenance organization), PPO (preferred-provider organization), PFFS (private fee-for-service), SNP (special-needs plan). The total Medicare population used to calculate enrollment shares in this table excludes the approximately 8 percent of beneficiaries who are not eligible to enroll in an MA plan because they do not have both Part A and Part B coverage. Totals and calculated values may be affected by rounding.

* SNPs and employer group plans have restricted availability. Their enrollment is included in the statistics by plan type. We present them separately to provide a more complete picture of the MA program.

Source: MedPAC analysis of CMS enrollment files.

In 2024, 6 percent growth in MA plan enrollment; 54 percent of eligible Medicare beneficiaries enrolled in MA plans

Between July 2023 and July 2024, enrollment in MA plans grew by 6 percent—or 2 million enrollees—to 33.6 million enrollees, while the total MA-eligible population (beneficiaries with both Part A and Part B coverage) grew only 2 percent. Between 2023 and 2024, MA enrollment rose from 52 percent to 54 percent of eligible Medicare beneficiaries (Figure 11-1). The share of eligible Medicare beneficiaries enrolled in MA has more than doubled since 2010. MA has become increasingly attractive to beneficiaries because plans provide cost-sharing reductions, non-Medicare benefits, and a cap on out-of-pocket expenses at little or no premium. Many beneficiaries with care needs that are met within plan networks and coverage policies will likely have lower total financial

liability (premiums and cost sharing) compared with beneficiaries who stay in FFS and purchase the most comprehensive supplemental coverage (Ippolito et al. 2024). Some MA enrollees with high care needs do experience greater cost liabilities compared with beneficiaries in FFS (e.g., greater cost sharing for in-network and out-of-network services compared with Medigap premiums) (Keohane et al. 2015).¹²

Among plan types, recent growth in MA enrollment has been disproportionately higher among local PPOs. Although HMOs continued to enroll the most beneficiaries (19 million) in 2024, enrollment in local PPOs grew faster (12 percent) than in HMOs (3 percent) (Table 11-1). Between 2023 and 2024, enrollment in local PPOs grew by 1.6 million, accounting for more than three-quarters of the overall increase in MA enrollment. Local PPOs may appeal to beneficiaries

because they provide a greater degree of coverage for services received outside of a plan's provider network (relative to the lack of out-of-network coverage provided under HMOs). (Enrollees in PPOs pay higher cost sharing for services received out of network than for services received in network.)

Increased SNP enrollment accounted for nearly 40 percent of all MA enrollment growth between 2023 and 2024. In 2024, SNP enrollment grew by 13 percent—a continuation of the rapid growth (above 10 percent per year) observed over the last five years. HMOs accounted for nearly three-quarters of the SNP enrollment growth (data not shown). While enrollment in non-SNP HMOs was essentially unchanged, enrollment in SNP HMOs grew by 11 percent (data not shown). Local PPO SNPs have proliferated since 2018, rising from 4 percent of SNP enrollment to 19 percent in 2024. Altogether, in 2024, Medicare beneficiaries who were eligible to enroll in SNPs were predominantly enrolled in HMOs, while enrollment of beneficiaries who did not qualify for a SNP was more evenly distributed between HMOs and PPOs.

Enrollment patterns differ in urban and rural areas. In 2024, the majority (56 percent) of eligible urban beneficiaries were enrolled in MA compared with 47 percent of eligible beneficiaries residing in rural counties.¹³ However, the growth of MA enrollment in rural areas has been faster in recent years. In 2024, MA enrollment in rural areas grew by 8 percent (compared with 6 percent growth in urban areas). The predominant plan type often differs between urban and rural areas as well. In 2024, 39 percent of rural MA enrollees were in HMO plans compared with about 59 percent of urban enrollees. By contrast, 58 percent of rural enrollees were in local PPOs compared with 40 percent of urban enrollees.

Geographic variation in the growth of MA has resulted in some areas having a very high share of eligible Medicare beneficiaries enrolled in MA and other areas having a relatively low share. In some states (including Iowa, Kansas, Maryland, Massachusetts, and Nebraska), less than 40 percent of eligible Medicare beneficiaries are enrolled in MA; however, a relatively small share of the MA-eligible population (less than 10 percent) lives in such states. In contrast, in 30 states (including California, New York, Ohio, Pennsylvania, and Texas) and Puerto Rico, home to more than three-quarters of

eligible Medicare beneficiaries, more than half of the eligible population was enrolled in an MA plan in 2024. In 10 of these 30 states (including Alabama, Florida, Georgia, Louisiana, and Michigan), encompassing roughly 20 percent of eligible beneficiaries, the share enrolled in MA exceeded 60 percent. MA enrollment is particularly high in some metropolitan areas (e.g., El Paso, TX; Grand Rapids, MI; Greensboro, NC; Miami, FL; Pittsburgh, PA; Rochester, NY) and in Puerto Rico, where more than 75 percent of eligible Medicare beneficiaries were enrolled in MA plans. MA benchmarks are computed at the county level, and in an increasing number of counties, more than half of eligible Medicare beneficiaries are enrolled in MA plans.

Availability of MA plans remains high in 2025

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 2025, with most Medicare beneficiaries having access to many plans. Measures of availability were similar relative to 2024. While almost all beneficiaries have had access to some type of MA plan since 2006, local HMOs and PPOs have become more widely available in recent years (Table 11-2). In 2025, nearly 100 percent of Medicare beneficiaries have an HMO or local PPO plan operating in their county of residence, unchanged from 2024.¹⁴

The availability of SNPs continues to be high across the types of special-needs populations served (Table 11-2). In 2025, 95 percent of beneficiaries reside in areas where SNPs serve beneficiaries who are dually eligible for Medicare and Medicaid (unchanged from 2024), 85 percent live where SNPs serve beneficiaries with chronic conditions (up from 72 percent in 2024), and 80 percent live where SNPs serve institutionalized beneficiaries (up from 78 percent in 2024). Overall, 99 percent of beneficiaries reside in counties served by at least one type of SNP (data not shown). Our measure of SNP availability reflects only the share of MA-eligible beneficiaries residing in a county served by a SNP. However, individuals must meet additional coverage criteria to be eligible to enroll in a SNP; for example, to enroll in an institutional SNP, a beneficiary would typically reside in a skilled nursing facility that has a relationship with the plan.

**TABLE
11-2**

Access to Medicare Advantage plans remains high

Share of Medicare beneficiaries with access to at least one MA plan

Type of plan	2021	2022	2023	2024	2025
Any MA plan	99%	99%	>99.5%	>99.5%	>99.5%
Local CCP	98	99	99	>99.5	>99.5
Regional PPO	72	74	74	74	68
PFFS	34	35	29	30	29
Special-needs plans					
Dual eligible	92	94	94	95	95
Chronic condition	57	59	66	72	85
Institutional	72	74	77	78	80
Zero-premium plan with drug coverage	96	98	99	99	99
Average number of choices					
County weighted	18	22	26	28	28
Beneficiary weighted	32	36	41	43	42
Average number of insurers					
County weighted	4	5	5	6	6
Beneficiary weighted	7	8	8	8	8

Note: MA (Medicare Advantage), CCP (coordinated-care plan), PPO (preferred provider organization), PFFS (private fee-for-service). “Local CCP” includes HMO and local PPO plans. This table’s figures exclude employer-only plans and Medicare Medical Savings Account plans. Special-needs plans are included in the three rows of special-needs plans but excluded from all other rows. For 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 through 2025, the share of Medicare beneficiaries includes only beneficiaries with both Part A and Part B coverage (i.e., MA-eligible beneficiaries). A “zero-premium plan with drug coverage” includes Part D coverage with no Part D premium (but may include the Part B 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.

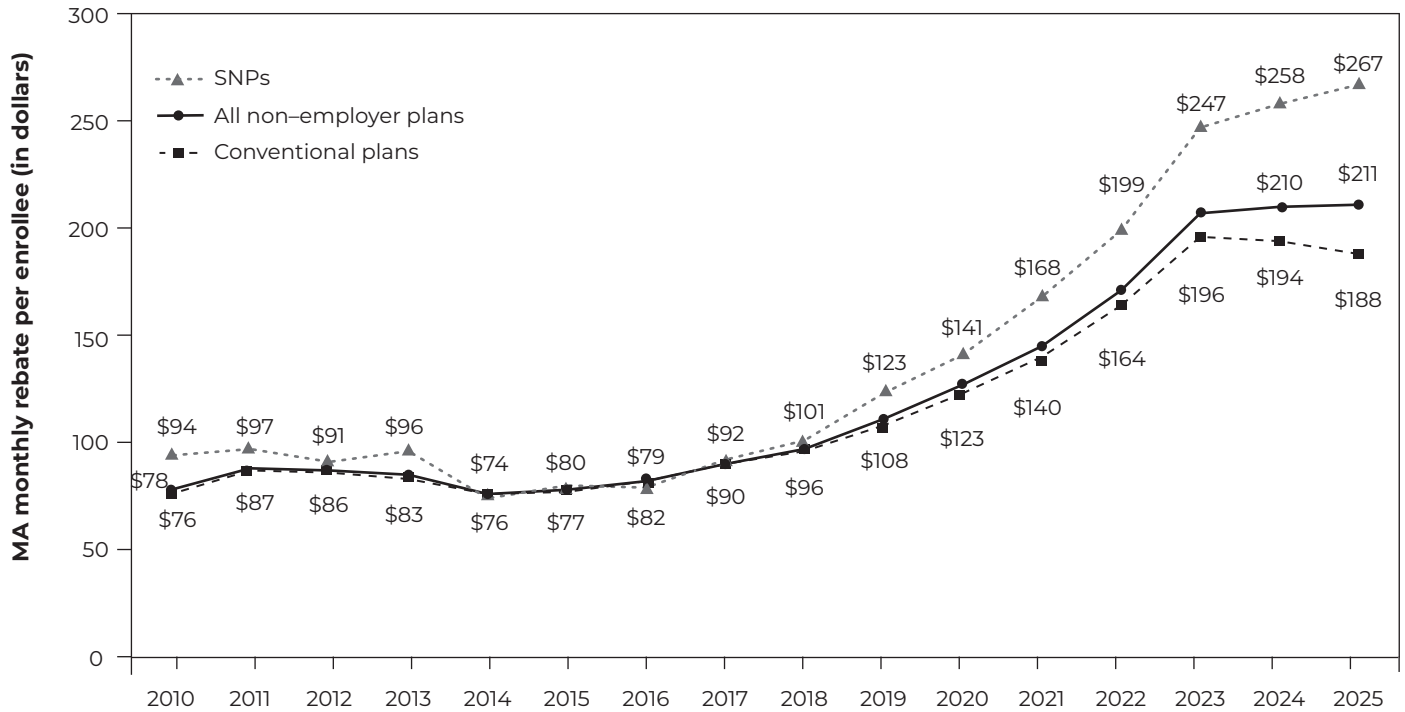
Source: MedPAC analysis of CMS bid and enrollment data.

In 2025, nearly 100 percent of eligible Medicare beneficiaries (unchanged from 2024) have access to at least one “zero-premium” plan with drug coverage—that is, a conventional (open to all MA-eligible beneficiaries) MA plan that includes Part D drug coverage and charges no Part C or Part D premium (enrollees may pay the Medicare Part B premium) (Table 11-2).¹⁵ About 76 percent of MA enrollment is projected to be in these zero-premium plans (data not shown). Also in 2025, 99 percent of beneficiaries (unchanged from 2024) have access to at least one plan

that offers some reduction in the Part B premium (data not shown); about 32 percent of 2025 conventional MA enrollment is projected to be in these premium-reduction plans (a substantial increase from 12 percent in 2024); and the average monthly premium reduction is \$44 for enrollees in one of these plans (data not shown). As plans have increasingly offered Part B–premium reductions, MA enrollees may become increasingly attracted to the direct assistance these benefits provide.

**FIGURE
11-2**

MA rebates for conventional plans and SNPs have more than doubled since 2017



Note: MA (Medicare Advantage), SNP (special-needs plan). Employer group 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 supplemental 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. Data for 2010 to 2020 differ slightly (by less than \$2, on average) from the amounts we reported in previous years, which did not account for plans' adjustments for beneficiaries with Medicare as a secondary payer.

Source: MedPAC analysis of data from CMS on plan bids.

In most counties, beneficiaries have access to many MA plans. In 2025, the average number of plans available in a county is 28 plans (unchanged from 2024) (Table 11-2, p. 333). Plan availability can also be evaluated by the number of plan choices available to the average beneficiary. According to that calculation, the average beneficiary in 2025 has 42 available plans, similar to 43 plans in 2024. An additional measure of plan access is the number of insurers offering products to the average beneficiary. In 2025, the average beneficiary can choose from plans sponsored by eight organizations (unchanged from 2024); 97 percent of beneficiaries have access to MA plans sponsored by at least three organizations, 95 percent of beneficiaries can choose from plans sponsored by at least four organizations,

and 90 percent of beneficiaries can choose from plans sponsored by at least five organizations (data not shown). Given the large number of plan choices, the Commission has expressed concern that beneficiaries may find it difficult to discern differences in plan benefit packages in order to make an optimal choice (Medicare Payment Advisory Commission 2023a).

MA rebates, which plans use to provide supplemental benefits to enrollees, remain at nearly record levels in 2025

Rebates to MA plans continue to be at nearly record levels in 2025. Plans must use those rebates to provide supplemental benefits—such as lower cost sharing, lower premiums, or benefits not covered by Part A

**TABLE
11-3**

Conventional MA plans project that rebates will be used to reduce cost sharing, to cover Part B and Part D premiums, and to offer non-Medicare benefits in 2025

	Rebate (per member per month)			Share of total rebate	
	2024	2025	2025 percent change	2024	2025
Total	\$194	\$188	-3%	100%	100%
Supplemental benefit type					
Cost sharing	75	80	6	39	43
Non-Medicare supplemental	53	53	1	27	28
Part D supplemental	34	29	-16	18	15
Part D premium	24	15	-39	13	8
Part B premium	7	11	50	4	6

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 cap on beneficiaries' out-of-pocket expenses. 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. We do not have reliable information about beneficiaries' use of these benefits. Components may not sum to totals due to rounding.

Source: MedPAC analysis of data from CMS on plan bids.

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.

Rebates for non-employer plans reached a nominal record high of \$210 per enrollee per month in 2025—a slight increase from \$209 per enrollee per month in 2024.¹⁶ These rebates account for 17 percent of plan payments, unchanged from 2024. Rebates for conventional MA plans—excluding employer plans and SNPs—average \$188 per enrollee per month (\$2,255 annually per enrollee; \$2,075 after subtracting plan projections for administrative costs and profit), a decrease from the record high \$196 per enrollee per month in 2023 (Figure 11-2). While modestly declining since 2023, the average MA rebate among conventional plans remains nearly twice as high as it was in 2018. For SNPs, the average rebate is significantly higher—\$267 per member per month in 2025—and has continued to increase in recent years. Since 2019, the monthly average rebate for SNPs has increasingly outpaced the rebates for conventional plans. These higher rebates

have coincided with higher enrollment growth in SNPs and greater coding intensity for MA enrollees who are eligible for Medicaid (many of whom are enrolled in SNPs) relative to other MA enrollees. We will continue working to understand why rebates are increasingly diverging between SNPs and conventional plans.

We assess plans' use of rebates based on projected rebate allocations included in plans' bids, but we do not have reliable information about enrollees' actual use of supplemental benefits. In 2025, the share of plan rebates allocated toward cost-sharing reductions is projected to increase relative to 2024 levels (Table 11-3). Plans project that \$80 per enrollee per month in rebates (43 percent of rebate dollars, an increase from 39 percent in 2024) will go toward reducing cost sharing for Medicare services, 6 percent more relative to 2024. Plans allocate a portion of those dollars toward their projected administrative costs and profit of providing cost-sharing reductions.¹⁷ In addition, the projected rebates allocated to cost-sharing reductions include coverage for the beneficiary maximum out-of-

pocket (MOOP) cap on plan-approved Part A and Part B expenses. In 2025, plans project that, on average, their liability for the MOOP limit will be \$14 per enrollee per month—equivalent to 7 percent of rebates (unchanged from 2024; data not shown) and 1 percent of projected plan payments (unchanged from 2024; data not shown).^{18,19} Cost-sharing reductions lower a beneficiary's out-of-pocket expenses and reduce the likelihood that a beneficiary will reach their MOOP limit. All cost-sharing reductions, including the MOOP limit, are subject to plan coverage policies. In addition, for beneficiaries who switch MA insurers midyear during a special enrollment period, their MOOP limit does not include the OOP expenses accumulated earlier in the year from their previous plan.²⁰

In 2025, plans project that 28 percent of rebates (averaging \$53 per enrollee per month) will be used for non-Medicare-covered supplemental benefits. Plans allocate a portion of those dollars toward their projected administrative costs and profit of providing non-Medicare supplemental benefits.²¹ Coverage for vision, hearing, and dental services are some of the most common types of supplemental benefits.²² These benefits address health challenges that many seniors face as they age and for which there is limited coverage under FFS Medicare. In 2025, nearly all MA enrollees (in both non-SNPs and SNPs) are in plans that offer some coverage of dental, vision, or hearing services (Freed et al. 2024). Plans may also offer nonmedical supplemental benefits such as nonemergency transportation services, assistance paying for over-the-counter items, meals, and gym memberships. The share of plans offering these types of benefits—and the share of enrollees in such plans—has risen as MA rebates have increased.

Other uses of rebate dollars in 2025 are for Part D supplemental benefits (15 percent of projected rebates), reductions in Part D premiums (8 percent of projected rebates), and reductions in Part B premiums (6 percent of projected rebates) (Table 11-3, p. 335). MA plans cannot allocate administrative expenses or profit to Part B–premium reductions, but administrative expenses and profit for Part D–premium reductions and Part D supplemental benefits may be included in plans' Part D bids.²³ Since 2022, plans have allocated an increasing share of rebates toward reductions in Part B premiums and a decreasing share of rebates toward reductions in Part D premiums (data not shown).²⁴

As Medicare spending on MA rebates grows, it is increasingly important for policymakers to understand how plans use rebates and the extent to which enrollees use the supplemental benefits that rebates fund. Based on bid data, we know how much Medicare pays to plans in the form of rebates, but little else. Although plans are required to submit encounter data for supplemental benefits, the limited data that plans have reported have been found to be unreliable.²⁵ Altogether, the data that Medicare collects are insufficient for examining the use of supplemental benefits, making it impossible to know how much plans spend on each type of benefit, which enrollees use each benefit (and how frequently), or whether service use differs by such factors as age, sex, race, disability status, and geographic area. Without this information, it is difficult to assess the impact of these benefits on enrollees' health and to determine whether Medicare's spending on these benefits is in line with the value they provide or the cost of providing them (Government Accountability Office 2023).²⁶

Higher payments to MA plans stem from favorable selection and coding intensity

The Commission estimates that MA payments (including rebates that finance supplemental benefits) substantially exceed what would have been spent on those beneficiaries had they been in FFS, continuing the trend of higher levels of payment throughout the history of Medicare's payment policy for managed care. Before applying any adjustments for favorable selection or coding intensity, we estimate that Medicare payments to MA plans have generally been similar to historical spending for FFS beneficiaries with both Part A and Part B coverage. But the effects of favorable selection (prior to any coding differences) have consistently caused the risk scores of MA enrollees to overpredict what their spending would have been in FFS—increasing MA payments by an estimated 11 percent (\$44 billion) above FFS spending in 2025. In addition, diagnostic coding by MA plans overstates the health differences between MA and FFS enrollees assumed in risk scores—further increasing MA payments by an estimated 10 percent (\$40 billion) above FFS spending in 2025.

In 2025, Medicare's payments to MA plans will total a projected \$538 billion (about \$507 billion after

**TABLE
11-4**

MA payments estimated to be substantially above what FFS spending would have been due to the effects of coding intensity and favorable selection

	Share of FFS spending in 2025		
	Benchmarks	Bids	Payments
Overall estimate	130%*	100%*	120%
Estimated before coding and selection	108*	83*	100
Estimated coding effect	+10	+8	+10
Estimated selection effect	+11	+9	+11

Note: MA (Medicare Advantage), FFS (fee-for-service). The “overall estimate” of benchmarks, bids, and payments as a share of FFS spending incorporates all three components of the Commission’s methodology for comparing payments: a base comparison of MA payments with FFS spending that standardizes for differences in risk scores and geography but does not account for the effects of coding intensity and favorable selection; an adjustment to that base comparison for favorable selection; and an adjustment for coding intensity. The values in the “estimated before coding and selection” row reflect estimates using only the base comparison, without adjusting for the effects of coding intensity and favorable selection. The values in the third and fourth rows are the additive adjustments to the base comparison for the effects of coding and selection. Estimates do not include beneficiaries with end-stage renal disease. More details on our methodology can be found later in this chapter and in the technical appendixes to this chapter. Components may not sum to totals due to rounding.

* Estimates of benchmarks and bids relative to FFS spending do not include employer plans.

Source: MedPAC analysis of data from CMS on plan bids, enrollment, benchmarks, FFS expenditures, and risk scores.

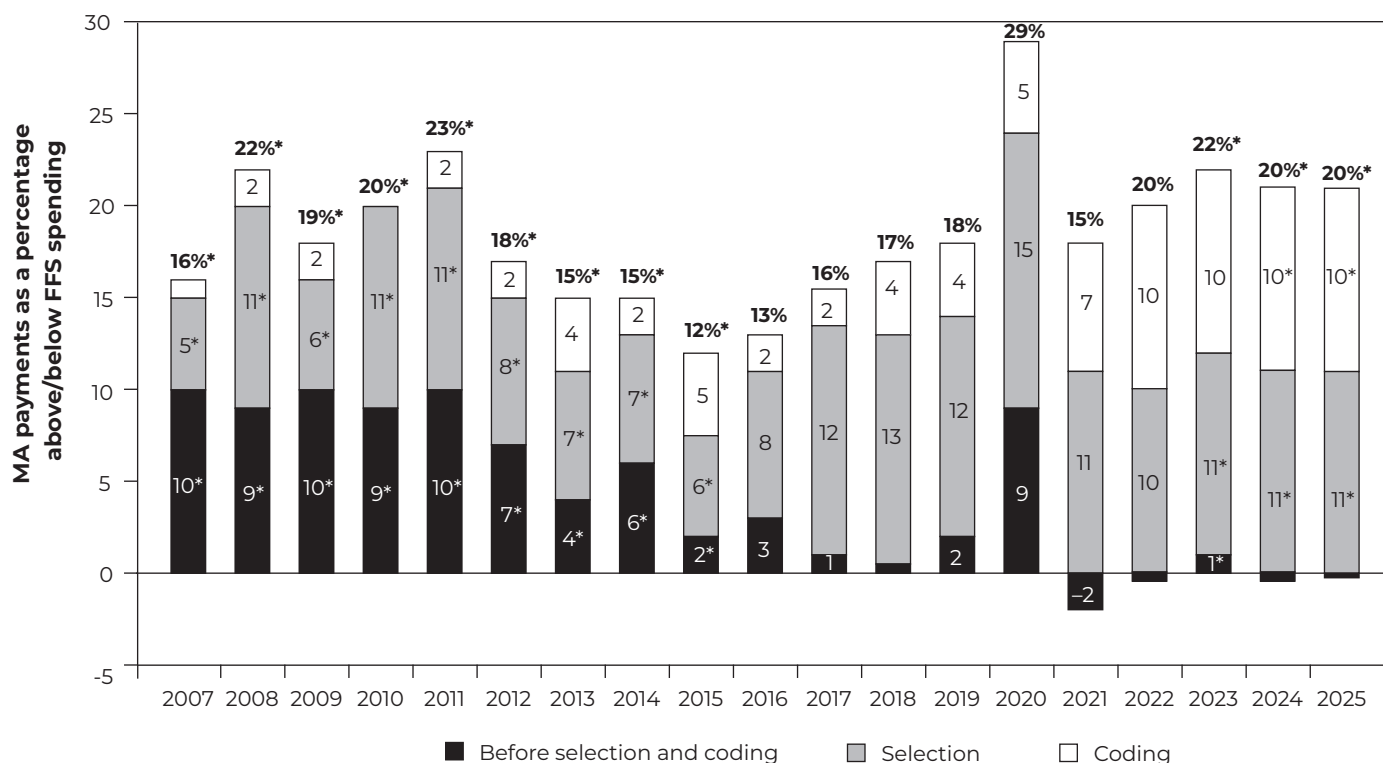
excluding projected payments for enrollees with end-stage renal disease).²⁷ We estimate that, because of differences between MA and FFS in coding intensity and selection, Medicare spends 20 percent more for MA enrollees than it would spend if those beneficiaries were enrolled in FFS Medicare, a difference that translates into a projected \$84 billion—or 17 percent of total payments to MA plans, excluding end-stage renal disease payments—in 2025.²⁸ The payments above FFS spending correspond with our projections of plan rebates in 2025, which we also estimate to be 20 percent of FFS spending and 17 percent of total payments to plans. These higher payments relative to FFS Medicare vary significantly across MA organizations (as shown by the variation in the effects of coding intensity across MA organizations, among other factors). In addition, these payments above what would have occurred in FFS are not an estimate of plan profits and administrative expenses. Instead, these additional payments are the primary source of funding used to provide more generous supplemental benefits and better financial protection for MA enrollees, which help attract enrollees and increase plans’ total revenues.

We reach this estimate by first projecting actual payments to MA plans in 2025. We project that those payments, on average, will be equal to about 100 percent of CMS’s projections of FFS spending in 2025 (Table 11-4) and that benchmarks and bids will be 108 percent and 83 percent of FFS spending, respectively.

However, to accurately compare MA and FFS spending, we must ensure that the two populations are comparable by accounting for differences in coding intensity and favorable selection. “Coding intensity” refers to the tendency for more diagnosis codes to be recorded for MA enrollees, which causes risk scores for the same beneficiaries to be higher when they are enrolled in MA than they would be in FFS. “Favorable selection” into MA occurs when beneficiaries with lower actual spending relative to their risk scores tend to enroll in MA; it is the extent to which risk-standardized spending of MA enrollees would be lower than the FFS average without any intervention from MA plans (including coding intensity). As in prior years, we have made technical refinements to our methods for estimating coding intensity and favorable selection, and these updates are reflected in both projected and historical comparisons of MA payments and FFS spending.²⁹

FIGURE 11-3

Higher MA payments relative to what estimated spending would have been in FFS since 2007



Note: MA (Medicare Advantage), FFS (fee-for-service). Estimates of MA payments relative to what spending would have been in FFS before selection and coding are less than 0.5 percent for 2018, 2022, 2024, and 2025. Estimates of MA payments related to coding are less than 0.5 percent for 2007 and 2010. We exclude MA payments for beneficiaries with end-stage renal disease. Components may not sum to totals due to rounding. * Specified values were derived from projected data (for 2023 to 2025) or earlier versions of the methodologies for estimating each component (for 2007 to 2015). Values without an asterisk were estimated using historical data and the current and most comprehensive version of the methodology for estimating each component. See text for details.

Source: MedPAC analysis of Medicare enrollment, Medicare claims spending, and risk-adjustment files.

Accounting for greater coding intensity and favorable selection in MA increases our projections of benchmarks, bids, and plan payments as a share of FFS spending. Indeed, we project that benchmarks in 2025 are 130 percent of FFS spending, indicating that Medicare could spend up to 30 percent more, in aggregate, for beneficiaries enrolled in MA than it would if those same beneficiaries were in FFS Medicare. Actual MA payments are 120 percent of FFS spending because most plans bid below those benchmarks.

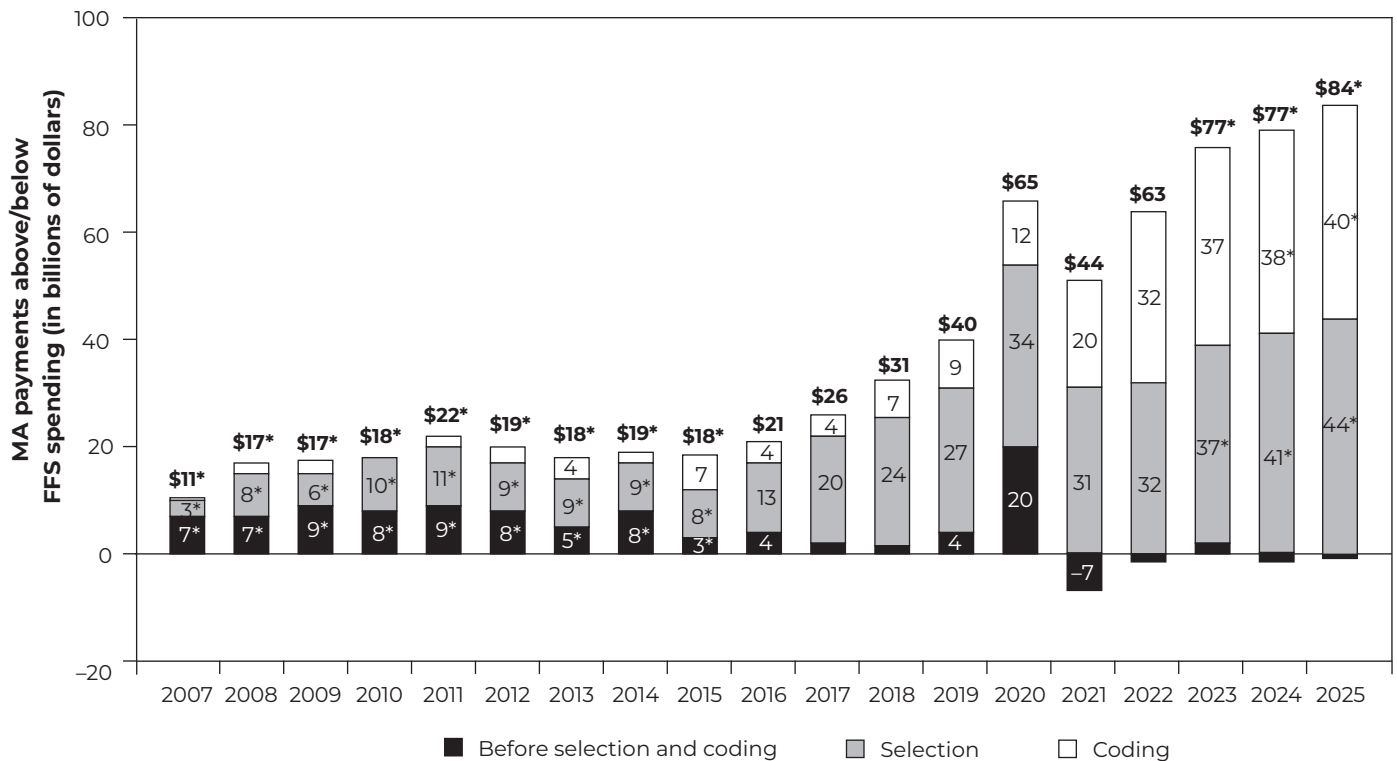
We project that—after accounting for coding intensity and favorable selection—plan bids in 2025 are 100 percent of FFS spending, meaning that under the existing payment system, on average, plans estimate

that their costs to provide the standard Medicare benefit are about the same as FFS Medicare’s costs. On average, 13 percent of plans’ bids are projected to be nonmedical expenses for administration and profit.

Our review of private-plan payments suggests that over a 40-year history, the many iterations of full-risk contracting with private plans have never yielded aggregate savings for the Medicare program. Evaluations of private-plan payment rates under Medicare demonstrations occurring before 1985 found that payment rates were 15 percent to 33 percent higher than FFS Medicare spending (Langwell and Hadley 1990). Between 1985 and 2004, risk adjustment was inadequate, and researchers estimated that

FIGURE 11-4

Estimated coding and selection have increased MA payments above what spending would have been in FFS



Note: MA (Medicare Advantage), FFS (fee-for-service). Estimates of MA payments relative to what spending would have been in FFS before selection and coding are less than \$3 billion for 2017, 2018, 2022, 2023, 2024, and 2025. Estimates of MA payments related to coding are less than \$3 billion for 2007, 2008, 2009, 2010, 2011, 2012, and 2014. We exclude MA payments for beneficiaries with end-stage renal disease. Components may not sum to totals due to rounding.

* Specified values were derived from projected data (for 2023 to 2025) or earlier versions of the methodologies for estimating each component (for 2007 to 2015). Values without an asterisk were estimated using historical data and the current and most comprehensive version of the methodology for estimating each component. See text for details.

Source: MedPAC analysis of Medicare enrollment, Medicare claims spending, and risk-adjustment files.

private-plan payments were 5 percent to 7 percent higher than FFS Medicare spending in the late 1980s and through the mid-1990s (Brown et al. 1993, Medicare Payment Advisory Commission 1998, Newhouse 2002, Riley et al. 1996).

Figure 11-3 shows that since 2007, payments to MA plans have been substantially above the amount FFS Medicare would have spent for the same beneficiaries, primarily due to the effects of favorable selection and coding intensity. Throughout the 19-year period from 2007 through 2025, we estimate that MA payments were at least 8 percent more than FFS spending for comparable beneficiaries in each year. Between 2011 and 2017, relative MA payments decreased from 23

percent above FFS spending to 16 percent above FFS spending. This change is largely explained by declining benchmarks resulting from ACA policies. However, after changes to benchmarks were fully implemented in 2017, MA payments increased relative to FFS spending through 2025—driven by the combined effects of coding intensity and selection.

Figure 11-4 shows the higher payments to MA relative to what spending would have been in dollar terms if enrollees were in FFS. (In estimating the payment amount above FFS spending, we removed MA payments for beneficiaries with end-stage renal disease (ESRD), which we exclude from all of our analyses and estimate

will account for about 6 percent of MA payments in 2025.³⁰) We estimate that Medicare will pay MA plans a total of \$84 billion more in 2025 than the program would have spent if enrollees had been in FFS Medicare.

Our current methodology for estimating MA payment comparisons has three components. These three components are estimated separately and are then combined in a single calculation of MA spending relative to FFS. First, we estimate a base comparison of MA payments relative to an estimate of FFS spending that is standardized for differences in average risk scores and geography but does not account for the effects of coding intensity and favorable selection. Second, we estimate the effect of favorable selection and use that estimate to adjust the base comparison of MA payments with FFS spending. Third, we estimate the effect of coding intensity and use that estimate to make an additional adjustment to the base comparison. We use historical data to estimate the effect of each of the three components on MA payments for the most recent year for which data are available (2022 for the base-comparison and favorable-selection components, 2023 for coding intensity) and earlier years. We then project what we expect each component to be through 2025 in years for which data are not yet available, to provide the Congress with our best estimate for the current year. Those projections are subject to uncertainty. In future reports, we will provide updated payment comparisons for those years using historical data. More details on the methods used for estimating each of the components can be found later in this chapter and in the technical appendixes to this chapter.

Before accounting for the effects of coding intensity and favorable selection, MA payments are generally similar to what FFS spending would have been

The first component of the Commission's payment comparison involves constructing a base comparison of MA payments with FFS spending for beneficiaries with similar risk scores and counties of residence. We begin with that base comparison because it aligns with how CMS constructs its estimates of risk-standardized FFS spending that are used to set county benchmarks. However, that base comparison does not account for how coding intensity and favorable selection cause CMS's estimates of risk-standardized FFS spending to overpredict costs for the average MA enrollee. Those

effects are incorporated as separate components in the Commission's payment comparisons.

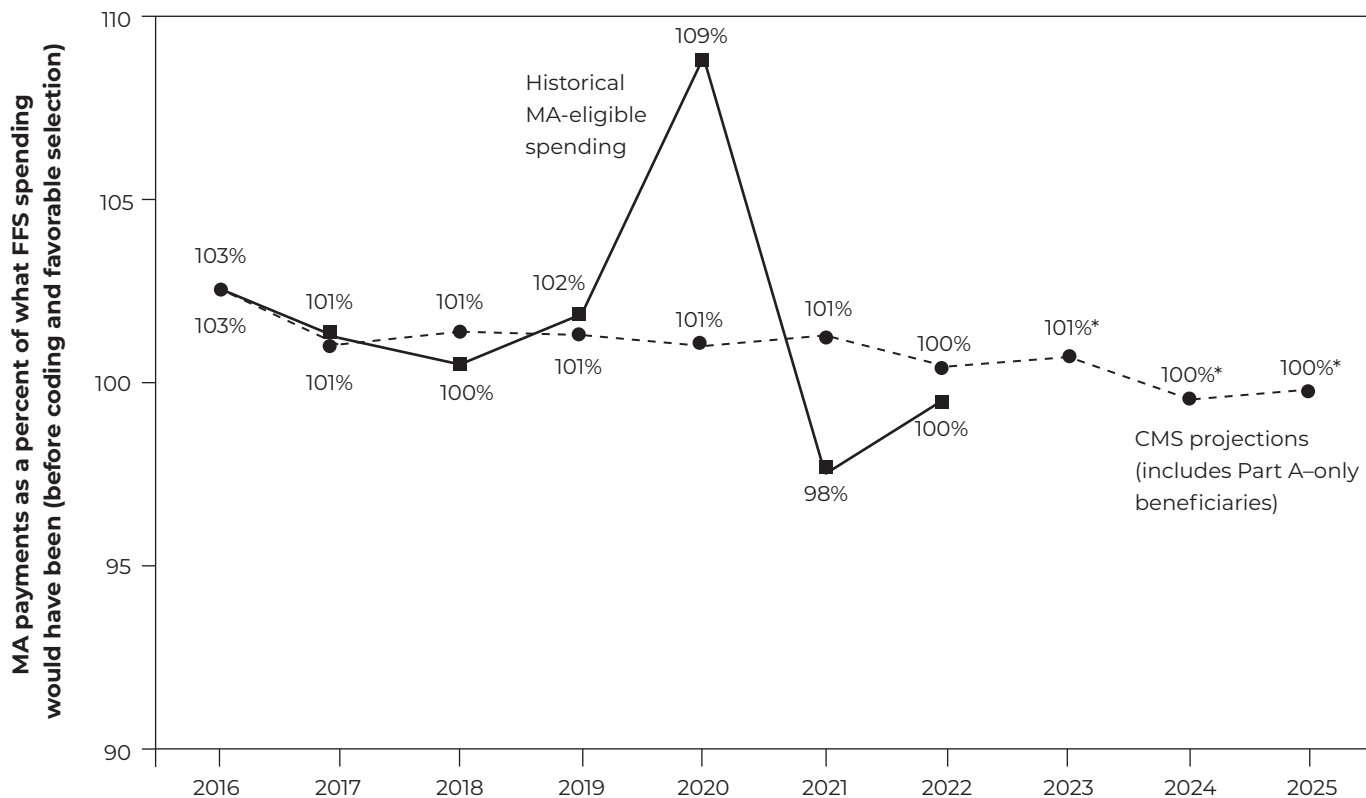
The Commission's estimate that Medicare payments to MA plans in 2025 average 100 percent of projected FFS spending—without any adjustments for coding intensity or favorable selection—reflects several aspects of MA payment policy (Table 11-4, p. 337). First, benchmarks are set above projected FFS spending in some counties and below FFS spending in other counties. Second, benchmarks are increased based on plan quality scores—resulting in quality-bonus payments that are financed with additional program dollars. We estimate that quality bonuses will account for about 3 percent (an estimated \$15 billion) of MA payments in 2025. Combining both of those factors, we project benchmarks to be 108 percent of FFS spending in 2025 before accounting for coding and selection. Third, payments to MA plans are below benchmarks because bids are generally lower than benchmarks, and plans receive a percentage (based on quality score) of the difference between bids and benchmarks in additional payment.

The Commission uses historical data on the actual FFS spending of beneficiaries with both Part A and Part B coverage (that is, people who would be eligible to enroll in MA) to estimate the base payment comparison for the most recent year for which data are available (2022).³¹ Our estimates of the base payment comparison for years in which we do not have historical data (2023 to 2025) rely instead on CMS's projections of FFS spending. Those projections differ from the actual FFS spending of MA-eligible beneficiaries for several reasons, including that the projections include Part A-only enrollees and that CMS's projection of the FFS-spending trend is subject to uncertainty. The method that CMS uses to produce its FFS projections has been criticized because it includes beneficiaries who have Part A but not Part B coverage, while MA enrollees are required to have both Part A and Part B coverage. The Commission has recognized this shortcoming in the CMS methodology and previously recommended that CMS calculate MA benchmarks using FFS-spending data only for beneficiaries with both Part A and Part B coverage (Medicare Payment Advisory Commission 2021a, Medicare Payment Advisory Commission 2017).

Despite the shortcomings in CMS's projections, our analysis of historical data shows that the projections

FIGURE 11-5

Part A-only beneficiaries included in CMS's projections had no systematic effect on the Commission's base comparison of MA payments with FFS spending



Note: MA (Medicare Advantage), FFS (fee-for-service). Estimates have not been adjusted for MA coding intensity and favorable selection of beneficiaries who choose to enroll in MA plans (i.e., underlying differences in risk-adjusted spending between the MA and FFS populations that are not captured by risk scores and would increase MA payments relative to FFS spending). Relative to prior estimates, estimates using historical data have been corrected to reflect no sequestration adjustment on MA payments from CMS in 2021. Estimates include both claims and nonclaims FFS spending. Estimates of actual MA payments in 2020 include remittances related to plans' medical loss ratios. Relative to estimates originally published from 2016 through 2019, 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-adjusted Part A FFS monthly spending for all Part A enrollees and (2) risk-adjusted Part B FFS monthly spending for all Part B enrollees.
* Specified values used projected data.

Source: MedPAC analysis of bid data, Medicare enrollment, Medicare claims spending, and risk-adjustment files.

have not systematically impacted our base comparison of MA spending with FFS payments.³² We estimated the base comparison of MA payments with FFS spending using both CMS's projections and the observed FFS spending of MA-eligible beneficiaries in each year from 2016 to 2022 (Figure 11-5). Both methods produced results that were within 1 percentage point of each other for every year except 2020 and 2021, which were

affected by the coronavirus pandemic. The similarity of the estimates for the two methods indicates that relying on CMS's projections of FFS spending (including adjustments for Medicare as a secondary payer) for estimating differences in MA and FFS spending has not introduced meaningful error in our analysis, and we expect that relying on CMS's projections has a minimal effect on our payment comparisons for 2023 to 2025.³³

We will continue to compare how our estimates differ between using CMS’s projections and using historical data. Should a systematic difference between the two emerge, we will consider incorporating an adjustment to our base payment comparison for the years that rely on projected data.

Prior to coding differences, favorable selection causes risk-based payments to overpredict spending for MA enrollees

The second component of the Commission’s payment comparison adjusts the base comparison of MA payments relative to FFS spending for favorable selection. When setting MA benchmarks and paying plans for each enrollee, CMS implicitly assumes that if MA enrollees were in FFS Medicare, their average Medicare spending would be equal to that of current FFS enrollees in the same county after adjusting for differences in risk scores. However, applying MA risk scores to FFS spending averages may overpredict the actual spending that MA enrollees would have had in FFS for two reasons: coding intensity and favorable selection. The Commission’s estimates of coding intensity are discussed in the next section of this chapter.

“Favorable selection” refers to the tendency for Medicare’s risk-adjustment model to—on average—overpredict the spending that the MA-enrolled population would have had if they were enrolled in the FFS program, even for beneficiaries with similar coding intensity. Favorable selection can occur due to unmeasured differences in health status but can also result from factors such as differences in beneficiaries’ propensities to seek care for reasons that are unrelated to their health (Medicare Payment Advisory Commission 2024).

Risk models are imperfect, and beneficiaries with the same risk score typically have a wide distribution of actual spending relative to the spending predicted by their risk score (Lieberman et al. 2023). Each year, a mix of beneficiaries enroll in MA who either have lower spending than predicted by their risk score or higher spending than predicted by their risk score. The MA program as a whole will experience favorable selection if the average MA enrollee has less spending than predicted by their risk score (prior to any effects from plans’ utilization management and coding efforts).

Because favorable selection occurs when beneficiaries systematically spend less than is predicted by their risk score, higher-risk beneficiaries (including dually eligible beneficiaries) are not necessarily unfavorable to MA plans. Indeed, our estimates show evidence of favorable selection for beneficiaries with both low risk scores and high risk scores.

The effect of favorable selection may vary over time. Our estimates reflect some periods of relatively high favorable selection and some periods with lower favorable selection. Those differences over time reflect a combination of factors, including changes to Medicare’s risk-adjustment model and changes in the composition of beneficiaries who choose MA and FFS. If the share of beneficiaries in MA continues to increase, it is not clear how favorable selection will change. It is possible that as MA grows, the favorability of the MA program will converge with the population remaining in FFS, and favorable selection will decrease. Alternatively, it is possible that as fewer beneficiaries remain in FFS, benchmarks will be set on an increasingly small group that is not representative of the Medicare population. For example, remaining beneficiaries in FFS may have a much higher rate of comprehensive supplemental coverage, which would tend to increase their preference for care and may increase favorable selection in MA. Our analysis finds that favorable selection persists as the share of MA enrollees in a market increases, which is consistent with another study that found that selection was prevalent in counties with high MA penetration (Lieberman et al. 2023).

The Commission has developed and refined its methodology for estimating the effect of favorable selection over several years (Medicare Payment Advisory Commission 2024, Medicare Payment Advisory Commission 2023a, Medicare Payment Advisory Commission 2012a). We use our current methodology to estimate an aggregate selection percentage for the entire population of MA enrollees—except for those with ESRD, who are paid for under a different model—in each year beginning in 2016. That methodology produces a comprehensive estimate that accounts for favorable selection prior to enrolling in MA, the attrition of unfavorable enrollees out of MA, and the change in selection (including regression to the mean) for beneficiaries who remain enrolled in MA.^{34,35}

A substantial body of research has found evidence of favorable selection in MA and provides support for the Commission’s estimates and methodology (Brown et al. 2014, Curto et al. 2021, Curto et al. 2019, Fuglesten Biniek et al. 2024, Goldberg et al. 2017, Government Accountability Office 2021, Jacobs and Kronick 2018, Jacobson et al. 2019, Lieberman et al. 2023, Medicare Payment Advisory Commission 2023a, Medicare Payment Advisory Commission 2012a, Meyers et al. 2019, Newhouse et al. 2015, Rahman et al. 2015, Riley 2012, Ryan et al. 2023, Teigland et al. 2023). The Commission’s method uses data from the portion of the MA population who previously switched (i.e., “switchers”) to MA from the FFS program to estimate selection for the entire population of MA enrollees, including those who enrolled upon their initial eligibility for Medicare. Analyses of switchers have been used in other studies (Jacobson et al. 2019, Lieberman et al. 2023, Newhouse et al. 2015, Teigland et al. 2023). A recent white paper also estimated favorable selection among MA beneficiaries who enrolled upon their initial eligibility for Medicare and found estimates that were even larger than our estimates for switchers in similar years (Teigland et al. 2023).³⁶ That study provides support for our approach that generalizes estimates based on switchers to the newly eligible population.

We made several technical improvements to our methods this year, including updating certain components to more comprehensively account for mortality differences between the MA and FFS populations. More detail on our methodology for estimating favorable selection can be found in Technical Appendix 11-A (p. 377).

Evidence of favorable selection throughout the period from 2007 to 2022

We estimate that favorable selection of the overall MA population resulted in MA payments that were 10 percent above FFS spending in 2022, a slight decrease from 11 percent above FFS spending in 2021 (Figure 11-6, p. 344). The selection percentage was below 100 percent in every year during the 2016 to 2022 period, indicating that the spending that the FFS program would incur for the MA population would be lower than what would be predicted by their risk score. Between 2017 and 2022, the selection percentage

increased from 89 percent to 91 percent. On net, favorable selection persisted throughout the study period even as a larger share of Medicare beneficiaries enrolled in MA, including enrollees who had higher risk scores. The estimates presented in Figure 11-6 use the Commission’s comprehensive method. We discuss that method in greater detail in Technical Appendix 11-A accompanying this chapter.

Below, we present several analyses using a simple version of our favorable-selection method that compares the FFS spending of beneficiaries who switched from FFS to MA in the following year (“recent switchers”) with the spending of beneficiaries who remained in FFS (“stayers”), standardizing for differences in risk score and county of residence. Using this simple method allows us to estimate favorable selection over a longer period and to examine patterns of favorable selection by beneficiary characteristics to provide more information about factors affecting favorable selection.

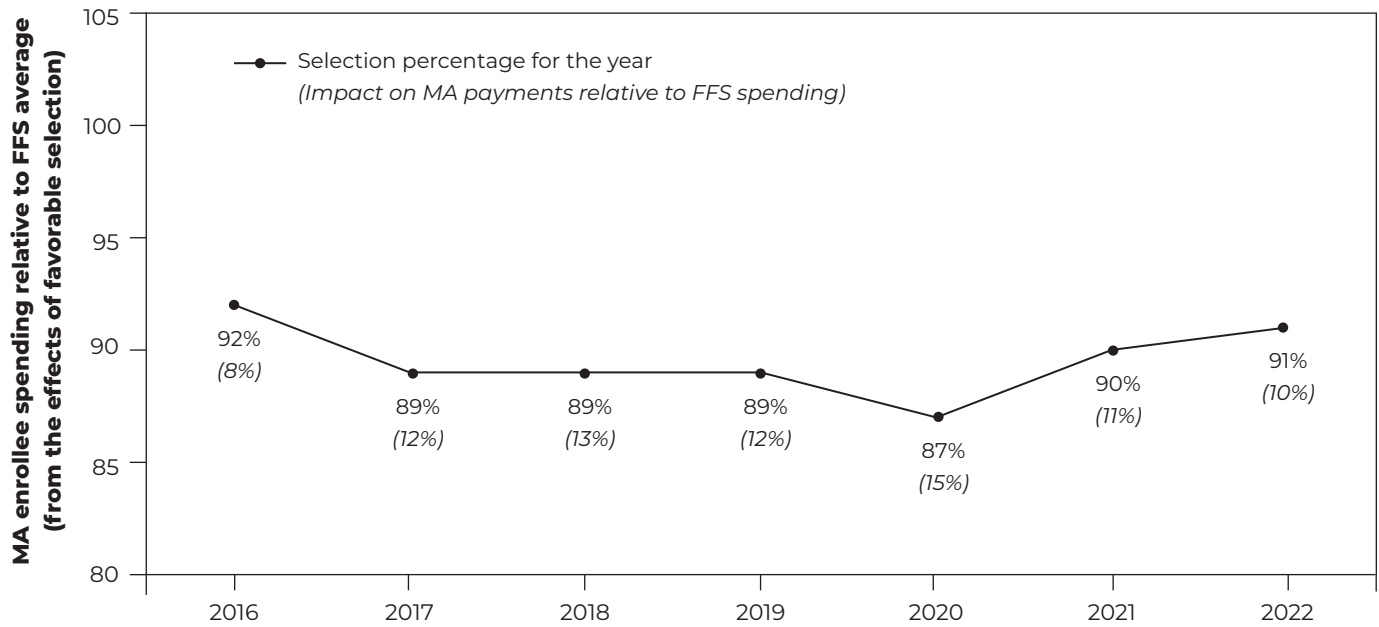
Using the simple method, we found evidence of favorable selection among recent switchers into MA during their last year in FFS throughout the period from 2007 to 2022 (Figure 11-7, p. 345). We estimate that the selection percentage ranged from 87 percent to 96 percent during the period. Favorable selection was highest in 2022 (MA enrollee local-area spending was 12.6 percent less than predicted by their risk score, a selection percentage of 87.4).

Beneficiaries with high risk scores before MA entry had the most favorable selection in 2022 We examined whether the level of risk score that beneficiaries had before entering MA influenced the level of favorable selection in 2022. We grouped beneficiaries into categories based on their risk score in the year prior to enrolling in MA.³⁷ The selection percentage of each category was calculated as the sum of FFS spending for future MA enrollees in their respective risk-score category divided by the sum of their predicted spending (adjusted for their county of residence). We found that beneficiaries with higher risk scores prior to MA enrollment had more pre-entry favorable selection (Figure 11-8, p. 346).

In 2022, MA entrants had higher levels of favorable selection as their risk scores increased. In other words,

**FIGURE
11-6**

Evidence of substantial favorable selection annually from 2016 to 2022



Note: MA (Medicare Advantage), FFS (fee-for-service). Estimates were constructed using the Commission's comprehensive method for estimating favorable selection. Selection percentages are computed as the ratio of the estimated spending that the FFS program would have incurred for MA enrollees relative to the spending predicted by their county benchmark and Medicare's risk-adjustment model. Selection percentage values further below 100 percent indicate greater favorable selection. Estimates are rounded to the nearest percent.

Source: MedPAC analysis of Medicare enrollment (2006–2022), Medicare claims spending (2007–2022), and risk-adjustment files (2007–2022).

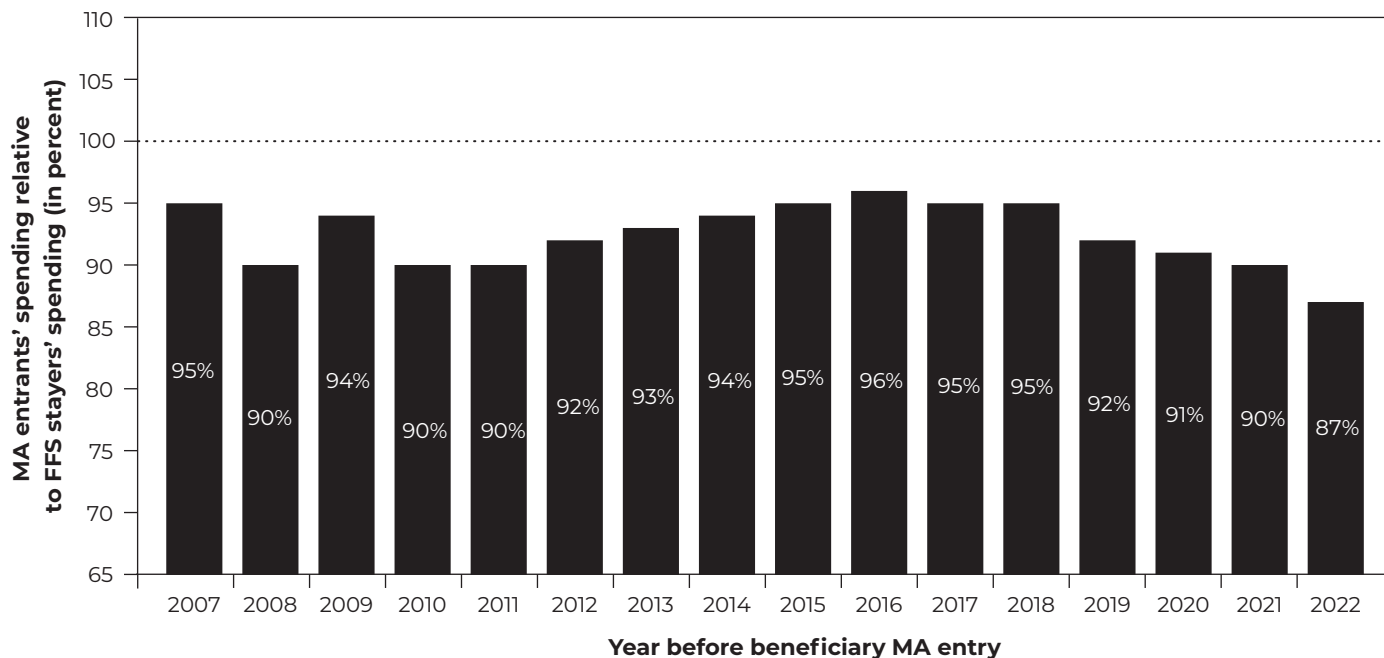
Medicare's payments to MA plans can be too high even for enrollees with expensive health conditions. For example, beneficiaries in the three highest categories of risk scores had the lowest selection percentages (85 percent and below, meaning the highest levels of favorable selection). This finding indicates that those categories (corresponding to beneficiaries with high severity of chronic illness) all had the highest levels of pre-entry favorable selection. In contrast, beneficiaries in the three lowest categories of risk scores before entering MA had the highest selection percentages (98 percent and above), suggesting that beneficiaries with low severity of chronic illness tended to be unfavorable in 2022.

These findings indicate that favorable selection can occur even among those beneficiaries with high

risk scores. In fact, we estimate that in 2022, MA enrollees with high risk scores tended to be the most favorable to MA plans. Several factors could account for favorable selection among future MA entrants with high risk scores. One potential factor is the race and ethnicity of those beneficiaries. Black and Hispanic beneficiaries may have high risk scores due to their incidence of chronic illness and rates of dual enrollment in Medicare and Medicaid. One recent study found that the CMS-HCC model overpredicted the risk-standardized spending for Black and Hispanic beneficiaries, on average, suggesting that these groups have below-average service use relative to their risk scores (McWilliams et al. 2023). That suggests that as MA plans enroll a higher share of Black and Hispanic beneficiaries, the average risk-standardized spending of their enrollees may become more favorable.

**FIGURE
11-7**

Beneficiary FFS spending in the year before MA enrollment indicates favorable selection for recent entrants from 2007 to 2022



Note: FFS (fee-for-service), MA (Medicare Advantage). Estimates were constructed using the Commission's simple method for estimating favorable selection. "MA entrants" are beneficiaries who switched from FFS to MA in the following year. "FFS stayers" are beneficiaries who remained in FFS in the following year. "Spending" reflects the year prior to MA entry and is risk standardized. Values further below 100 percent indicate greater favorable selection. The analysis excludes beneficiaries without at least two full years of enrollment in FFS Part A and Part B prior to the year of MA entry as well as those who joined a non-MA private plan (e.g., cost plan), had end-stage renal disease, had Medicare as a secondary payer, resided in multiple counties during the year, or resided in Puerto Rico (due to the relatively small number of FFS beneficiaries in that territory).

Source: MedPAC analysis of Medicare enrollment (2006–2023), Medicare claims spending (2007–2022), and risk-adjustment files (2007–2022).

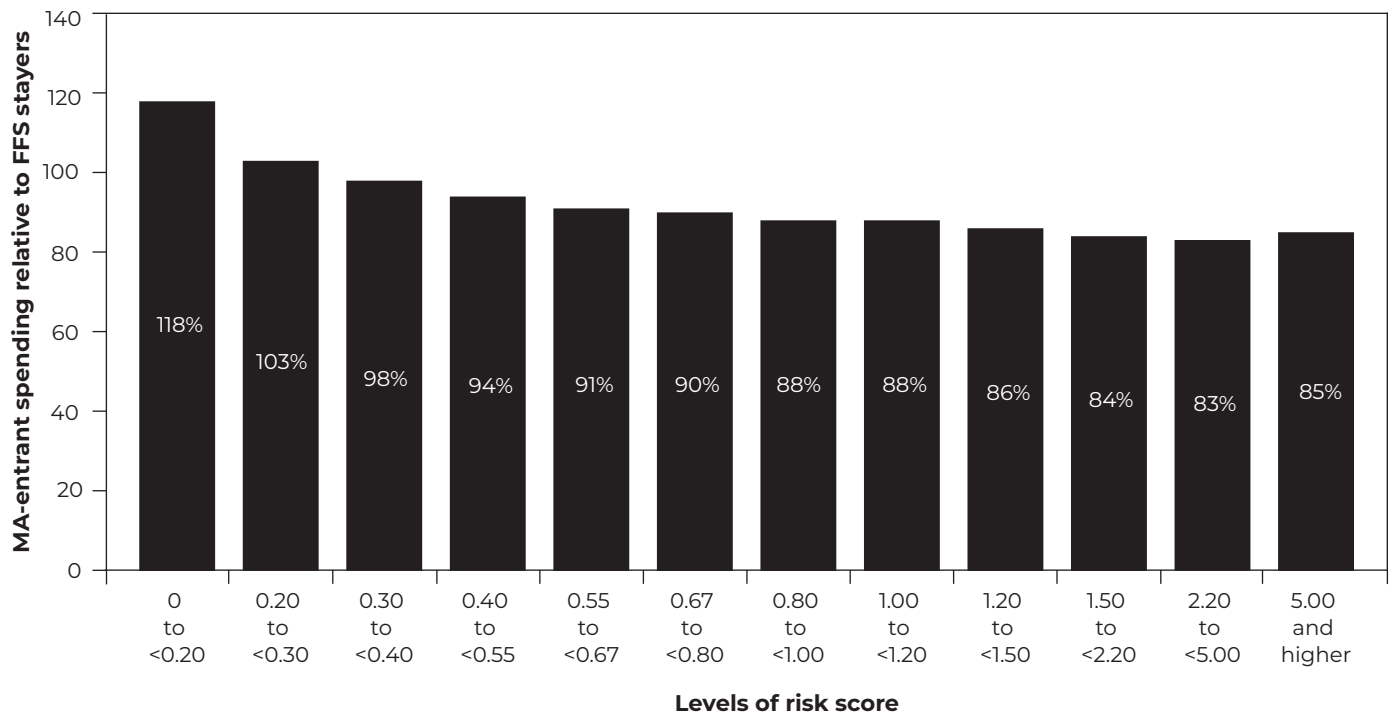
Similarly, as MA plans enroll populations with higher levels of chronic illness, the level of favorable selection may increase rather than decrease. We did not adjust our analyses of favorable selection to control for race and ethnicity or social risk factors beyond the factors included in the CMS–HCC model used for MA risk adjustment and payment. Controlling for additional factors would reduce the accuracy of our estimates and could increase our estimate of favorable selection.³⁸

Favorable selection of recent MA entrants was similar in counties with high and low MA penetration Some observers have posited that favorable selection will decrease as the share of Medicare beneficiaries enrolling in MA continues to increase. To analyze this hypothesis, we examined whether the level of

a county's MA penetration influenced the level of favorable selection in 2022 using our simple method that focuses on recent MA entrants. We found very little difference in selection between markets with low MA penetration and markets with high penetration (Figure 11-9, p. 347). In 2022, MA entrants in markets with high penetration had the same pre-entry selection percentage (89 percent) as MA entrants in markets with low penetration. Thus, we do not find evidence that high MA penetration affects MA favorable selection. In markets where MA penetration increases to very high levels, MA benchmarks will be set based on an increasingly small group of FFS beneficiaries. It is not clear whether the smaller share of FFS beneficiaries will continue to be different in ways that are not

FIGURE 11-8

Beneficiaries with high risk scores before MA entry had the highest estimated favorable selection in 2022



Note: MA (Medicare Advantage), FFS (fee-for-service). Risk-score levels reflect the pre-entry risk scores for MA enrollees. Due to scaling, values for risk scores of less than 0.20 may appear truncated. Estimates were constructed using the Commission’s simple method for estimating favorable selection. “MA entrants” are beneficiaries who switched from FFS to MA in the following year. “FFS stayers” are beneficiaries who remained in FFS in the following year. Spending reflects the year prior to MA entry and is risk standardized. Lower MA-entrant spending relative to FFS stayers’ spending reflects a greater effect of favorable selection. The analysis excludes beneficiaries without at least two full years of enrollment in FFS Part A and Part B prior to the year of MA entry as well as those who joined a non-MA private plan (e.g., cost plan), had end-stage renal disease, had Medicare as a secondary payer, resided in multiple counties during the year, or resided in Puerto Rico (due to the relatively small number of FFS beneficiaries in that territory).

Source: MedPAC analysis of Medicare enrollment (2021–2023), Medicare claims spending (2022), and risk-adjustment files (2022).

captured by risk adjustment and be unfavorable relative to beneficiaries who enter MA.

Coding differences increase payments to MA plans in 2025 by an estimated \$40 billion and continue to generate inequity across plans

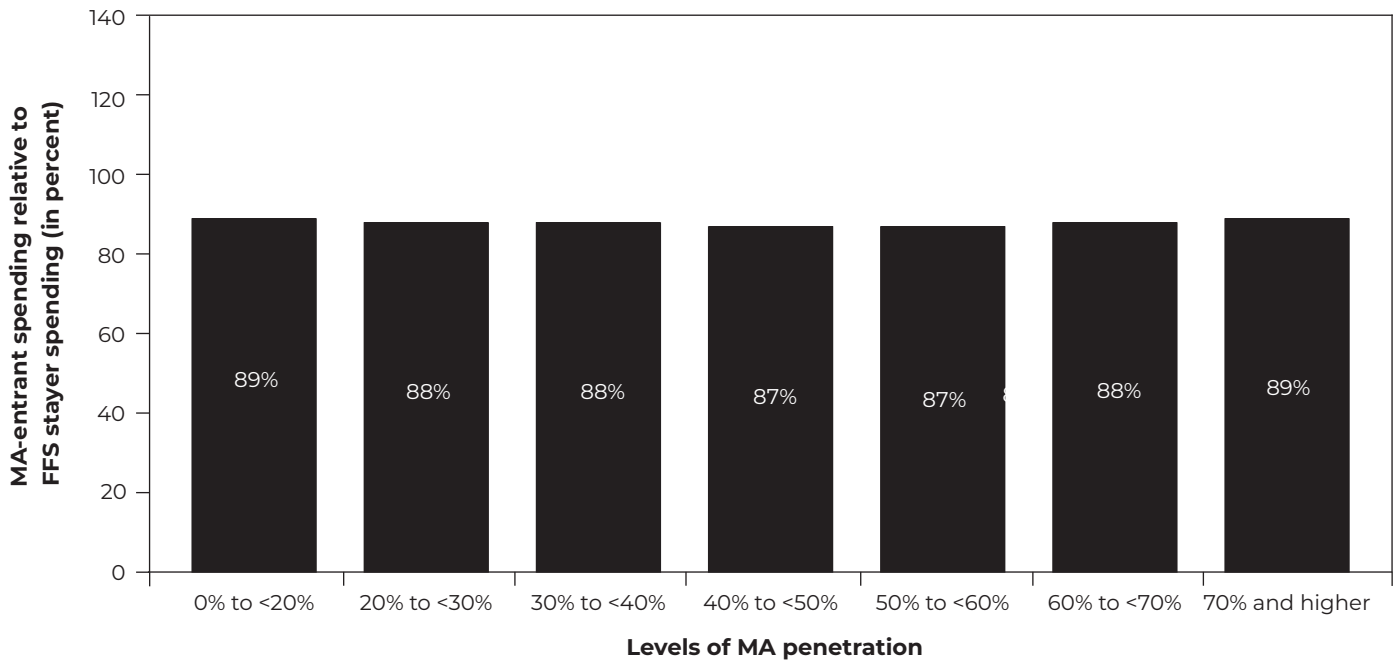
The third component of the Commission’s payment comparison adjusts the base comparison of MA payments relative to FFS spending for coding intensity. Payments to MA plans are risk adjusted to account for differences in health status. Higher risk scores increase payments to plans for enrollees with higher expected Medicare spending. MA enrollees’ risk scores are based

on demographic information and diagnoses that plans submit to CMS. Our estimates of coding intensity are independent of our estimates of the effects of favorable selection because we estimate selection prior to MA enrollment and subsequent changes in selection using FFS data.

Documenting additional diagnosis codes raises plan-enrollees’ risk scores, generating two distinct benefits for MA plans: (1) increasing the monthly payments that MA plans receive from Medicare and (2) increasing the rebates plans use to provide supplemental benefits to enrollees. Plans that document relatively more diagnosis codes have a competitive advantage over other plans.

FIGURE 11-9

Estimated favorable selection before MA enrollment was similar in counties with high and low MA penetration in 2022



Note: MA (Medicare Advantage), FFS (fee-for-service). Estimates were constructed using the Commission's simple method for estimating favorable selection. "MA entrants" are beneficiaries who switched from FFS to MA in the following year. "FFS stayers" are beneficiaries who remained in FFS in the following year. Spending reflects the year prior to MA entry and is risk standardized. Lower MA-entrant spending relative to FFS stayers' reflects a greater effect of favorable selection. The analysis excludes beneficiaries without at least two full years of enrollment in FFS Part A and Part B prior to the year of MA entry as well as those who joined a non-MA private plan (e.g., cost plan), had end-stage renal disease, had Medicare as a secondary payer, resided in multiple counties during the year, or resided in Puerto Rico (due to the relatively small number of FFS beneficiaries in that territory).

Source: MedPAC analysis of Medicare enrollment (2021–2023), Medicare claims spending (2022), and risk-adjustment files (2022).

Documenting an additional HCC for an enrollee can significantly increase Medicare's payment to a plan for that enrollee. Because of the increased financial incentives for MA plans to code more diagnoses and the additional tools, such as health risk assessments and chart reviews, that MA plans use to capture diagnoses—tools that are not features of FFS Medicare—coding intensity is higher in MA than in FFS and payments to MA plans are higher than intended.

For 2025, we project that MA risk scores will be about 16 percent above risk scores for comparable FFS beneficiaries. This difference is only partially offset by CMS's coding-intensity adjustment that reduces MA risk scores by 5.9 percent. The net effect is a 10 percent increase in MA risk scores due to coding intensity,

leading to \$40 billion in higher projected payments to MA plans in 2025. Between 2007 and 2025, we estimate that MA coding intensity will have generated \$224 billion in aggregate higher payments to MA plans.

The Commission's approach to estimating coding intensity compares MA and FFS risk scores, controlling for age, sex, Medicaid eligibility, and institutional status and then identifying differences in risk scores as due to differences in coding intensity. More details on the methodology can be found in Technical Appendix 11-B (p. 388).

Coding intensity varies significantly across MA organizations. As a result, CMS's across-the-board adjustment for coding intensity, which reduces all MA

risk scores by the same amount, generates inequity across organizations by reducing net revenue for plans with lower coding intensity and allowing other plans to retain a significant amount of revenue from higher 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 between MA and FFS, improve the equity of the adjustment across MA contracts, and improve incentives to reduce costs and improve quality. The Commission's approach to reducing MA coding intensity has been to address the mechanisms that generate coding differences first (e.g., remove health risk assessments and reduce year-to-year coding variations by using two years of diagnostic data) 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 would be consistent with the Commission's approach.

Documenting more diagnosis codes increases payments to plans

Among the 20 most common HCCs in MA—which have payment 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's payment to a plan. We can illustrate how coding additional HCCs increases payment to a plan for Medicare-covered services using average FFS Medicare spending.³⁹ For example, in 2022, the annual Medicare payment to an MA organization for a non-Medicaid-eligible 80-year-old 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. This distinction can lead to relative underreporting of diagnoses in FFS. 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 more completely reported. Because Medicare's risk model is based on diagnostic-coding patterns in FFS, 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 more diagnoses and the additional tools that MA plans use to capture diagnoses—tools that 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 continue to see higher coding intensity in MA, and that difference continues to increase. The tools that ACOs and APMs have available result in less coding intensity than those available to MA plans; notably, chart reviews, in-home health risk assessments, and subcapitation to medical groups are used only in MA. Furthermore, CMS limits annual risk-score growth for ACO enrollees when calculating shared savings or losses. Thus, we expect that FFS coding will continue to identify fewer diagnosis codes than MA coding does. (See text box “Congressional request on Medicare Advantage and fee-for-service diagnostic-coding practices,” for more information about how MA and FFS coding practices differ for specific conditions.)

Higher MA payments due to coding differences have been under scrutiny for more than a decade. Research has consistently found that the impact of coding differences on MA risk scores produces higher payments for MA plans (Congressional Budget Office 2017, Geruso and Layton 2015, Government Accountability Office 2013, Hayford and Burns 2018,

Congressional request on Medicare Advantage and fee-for-service diagnostic-coding practices

The House Committee on Appropriations requested that the Commission report on differential coding in Medicare Advantage (MA) and fee-for-service (FFS) Medicare. The Committee requested that MedPAC analyze how different incentives in FFS and MA contribute to different relative rates of diagnostic coding for beneficiaries enrolled in the two parts of the program. The Committee also requested an analysis of associated effects on payment differences.

Committee report language

Differential Coding in Medicare Fee For Service.—The Committee is aware of the dynamic noted in MedPAC’s 2024 Report to the Congress that FFS Medicare claims offer little incentive to record all relevant diagnoses of FFS patients. The Committee directs MedPAC to, within 12 months of enactment of this Act, issue a report estimating the extent to which this incentive results in different relative rates of diagnostic coding for Medicare Advantage and FFS beneficiaries and the extent to which such coding differences may result in payment differentials between Medicare Advantage and FFS.

Evaluating diagnostic-coding differences between MA and FFS Medicare

Diagnostic-coding differences for MA and FFS beneficiaries can arise for several reasons. Coding differences can reflect MA plans’ ability to document more diagnoses than FFS providers, potentially because plans have an incentive to report every diagnosis for an enrollee, whereas

FFS providers may be more likely to focus on more significant diagnoses that are primary reasons for a visit. In some cases, the additional diagnosis codes submitted by plans may reflect fraudulent diagnoses, those for which the patient did not meet clinical criteria. Whistleblowers and the Department of Justice allege that some MA plans have submitted fraudulent diagnoses for risk adjustment (Department of Justice 2022, United States of America ex rel. Benjamin Poehling v. UnitedHealth Group Inc. et al. 2016, United States of America ex rel. James M. Swoben v. Secure Horizons 2017). Lawsuits and risk-adjustment data-validation audits seek to address higher MA coding due to fraud or insufficient documentation, but even if fraudulent diagnoses were eliminated, other sources of differential diagnostic coding would remain.

Applying diagnostic criteria to individual patients can involve judgment, and diagnostic criteria may be interpreted differently by MA plans compared with providers treating FFS patients. CMS developed a set of diagnostic-coding principles to ensure that diagnostic codes were applied appropriately in risk adjustment (Pope et al. 2004). Principle 10 addresses the varying specificity in diagnostic criteria, which could allow for different diagnostic criteria to be applied in MA compared with FFS Medicare, especially for diagnoses with more clinical discretion. Principle 10 states, “Discretionary diagnostic categories should be excluded from payment models. Diagnoses that are particularly subject to intentional or unintentional discretionary

(continued next page)

Jacobs and Kronick 2018, Kronick and Chua 2021, Kronick and Welch 2014). One study found that when controlling for differences in health status using Part D prescription drug data, from 2008 to 2015, MA risk scores grew by about 1 percent more per year than FFS risk scores (Jacobs and Kronick 2018). A second

study used a difference-in-difference approach on risk-adjustment data for 2008 to 2013 to estimate that risk scores for enrollees remaining in MA grew about 1.2 percent faster per year than for beneficiaries in FFS Medicare (Hayford and Burns 2018). A third study, using county-level data, found that in the first year

Congressional request on Medicare Advantage and fee-for-service diagnostic-coding practices (cont.)

coding variation or inappropriate coding by health plans/providers . . . should not increase cost predictions. Excluding these diagnoses reduces the sensitivity of the model to coding variation and coding proliferation.” CMS excluded some codes that exhibited the greatest differences in MA- and FFS-coding rates from the most recent risk-adjustment model (V28), introduced in 2024, but other diagnostic codes included in the model are likely to have some degree of discretion.

Providers generally have fewer incentives to submit diagnosis codes for their FFS patients compared with the incentives that MA plans have to submit codes for their enrollees. In MA, plans receive higher payments when additional diagnosis codes are recorded on inpatient, outpatient, and professional claims, or when additional diagnoses are submitted through health risk assessments and chart reviews. In FFS, providers generally do not receive higher payments when additional diagnoses are recorded on outpatient and professional claims or on health risk assessments, and chart reviews are not submitted through FFS Medicare. That difference in incentives suggests that at least some of the relatively higher coding intensity in MA that the Commission and others have estimated is because fewer FFS patients are coded with diagnoses that would be applicable to them, which is sometimes referred to as “incomplete coding.”

While the difference in incentives to submit diagnosis codes in the two programs is clear, it is challenging to estimate how much of the difference in coding intensity between the two programs arises because of differing incentives. Without analyzing data from medical records, it is impossible to know whether beneficiaries would have met the criteria for all diagnosis codes that were not recorded.

Parsing the reasons for diagnostic-coding differences is challenging, and in some cases data do not exist. In responding to the Committee’s

request, we assessed the available measure of coding completeness that we think is most related to different incentives to document diagnoses: the rates of follow-up coding for chronic conditions that are expected to persist from year to year. For the chronic conditions that we analyze, nearly all patients who are diagnosed with a condition in one year are expected to meet the clinical criteria for the condition in the following year. Therefore, we can reasonably classify diagnoses that were not recorded in the following year as instances of incomplete coding. This analysis, however, is not able to estimate all instances of incomplete coding in MA and FFS, such as the coding of chronic conditions that are never diagnosed for a beneficiary and the coding of conditions that are not expected to persist from year to year.

We find evidence of incomplete coding for nearly all of the 52 chronic conditions that we analyzed for both FFS and MA beneficiaries, with substantial variation in the rates of follow-up diagnoses across the different conditions. The rates of follow-up coding were lower (that is, coding was less complete) for FFS beneficiaries for 35 out of the 52 conditions we analyzed, and 12 of the conditions had follow-up rates that were more than 5 percentage points lower in FFS than MA. However, two conditions had follow-up rates that were more than 5 percentage points higher in FFS than MA. This analysis suggests that while diagnoses are coded incompletely in both MA and FFS, incomplete coding is somewhat more common in FFS than in MA.

Because the Commission’s analysis of follow-up coding focuses on only one mechanism whereby coding completeness may influence payments to MA plans, we are unable to estimate specifically how much payments to plans are affected by differences in coding completeness or accuracy. The Commission estimates that, in 2025, payments to MA plans will be \$40 billion (10 percent) higher due to differences in coding intensity that arise

(continued next page)

Congressional request on Medicare Advantage and fee-for-service diagnostic-coding practices (cont.)

for any reason. That estimate is discussed in more detail in the main text. Regardless of the reasons, higher coding intensity in MA relative to FFS causes payments to MA plans to be higher than they would be if coding practices were comparable.

Analysis of follow-up coding in the MA and FFS programs

To evaluate the completeness of follow-up coding in FFS and in MA, our staff physician reviewed the diagnosis codes associated with each hierarchical condition category (HCC) and identified 52 HCCs (of 86 HCCs in the V24 CMS-HCC model) that represent chronic conditions for which we would expect the condition, if coded in one year, to persist in the following year for nearly all beneficiaries. First, we looked at beneficiaries in FFS with Part A and Part B for 2022 and 2023 and analyzed how often beneficiaries who had those chronic-condition HCCs coded in 2022 were coded with the same HCC or a related, higher-severity HCC in 2023. (Related HCCs are ranked into hierarchies based on severity, and only the highest-severity HCC counts toward a risk score when more than one HCC in the hierarchy is identified for a beneficiary.) Next, we performed the same analysis for beneficiaries in MA for 2022 and 2023. Figure 11-10 (p. 352) shows the estimates from that analysis.

We found wide variation in the rates of follow-up coding within both the MA and FFS populations. In FFS Medicare, seven chronic-condition HCCs had follow-up rates above 90 percent and seven had follow-up rates below 50 percent. In MA, five chronic-condition HCCs had follow-up rates above 90 percent and five had follow-up rates below 50 percent. HCCs contain a large variety of conditions, both symptoms and diseases, some of which may resolve over time or may become so chronic or stable that practitioners no longer need to actively treat the condition and therefore do not code the condition according to coding guidelines.⁴⁰ These results are similar to those found by other researchers assessing chronic

conditions in the V22 risk model for 2017 to 2019 (Ghoshal-Datta et al. 2024).

In addition, we find that most of the chronic-condition HCCs have similar rates of follow-up coding in MA and FFS Medicare. Of the 52 chronic-condition HCCs, 38 had MA follow-up coding rates within 5 percentage points of FFS. Among these HCCs, the rates of follow-up coding were more often higher in MA, with 23 HCCs having higher MA follow-up rates and 11 having higher FFS follow-up rates (and 4 showing no difference in follow-up coding rates).

To help assess why some chronic-condition HCCs had larger differences in MA and FFS follow-up coding rates, we consider whether an HCC is part of a hierarchy and the relative MA and FFS coding rates in a single year when accounting for differences in age, sex, and Medicaid eligibility (Figure 11-11, p. 353).

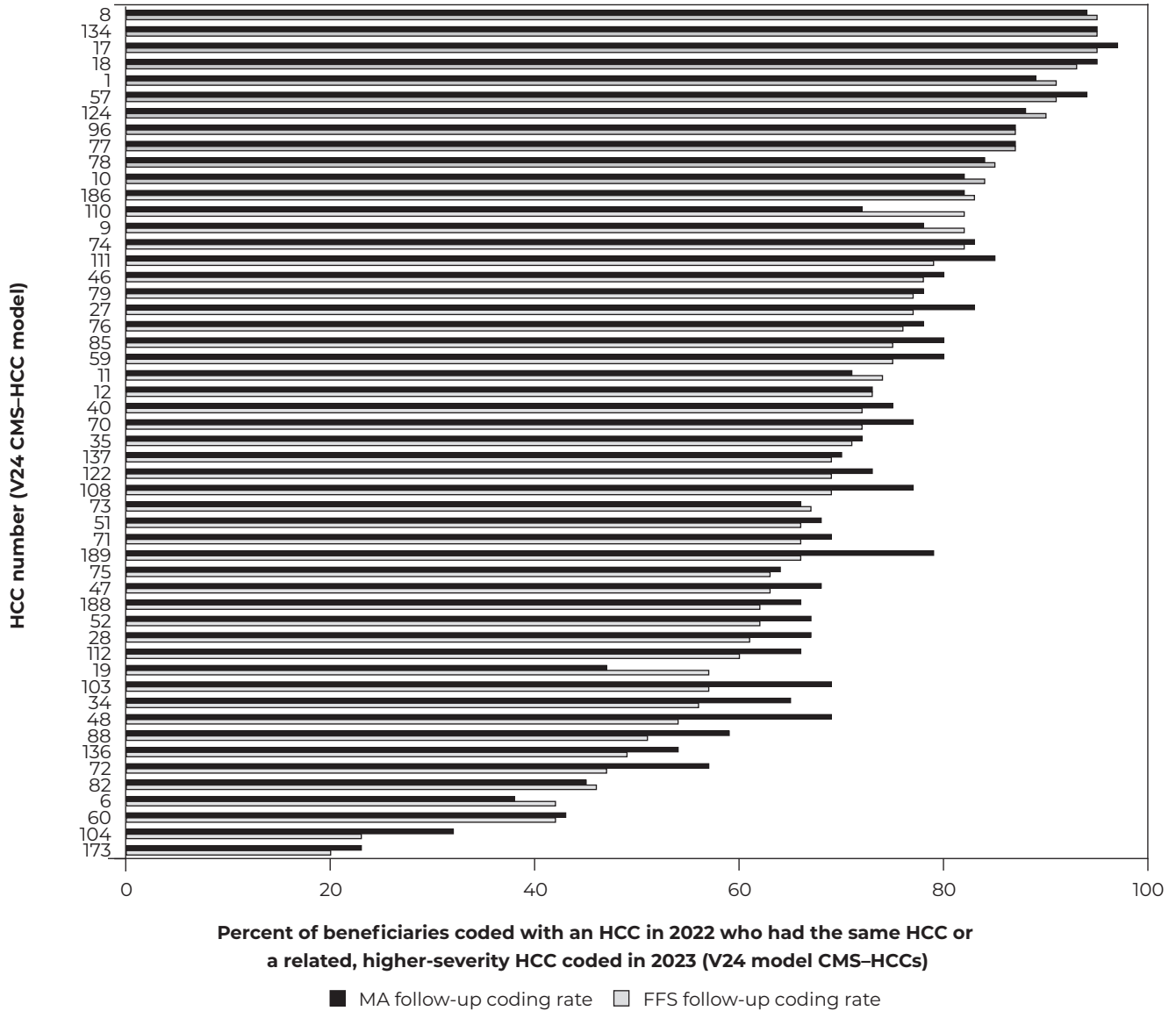
We first consider the two HCCs that had follow-up rates that were 10 percentage points higher in FFS than in MA: diabetes without complication (HCC 19) and cystic fibrosis (HCC 110). Diabetes without complication is the lowest-severity HCC in a hierarchy that includes diabetes with chronic complications (HCC 18) and diabetes with acute complications (HCC 17).⁴¹ Comparing MA and FFS coding rates for a single year, we find that the three diabetes HCCs collectively are coded 38 percent more often in MA than in FFS (accounting for differences in age, sex, and Medicaid eligibility), demonstrating higher overall coding of diabetes in MA. However, we find that coding rates for diabetes with chronic complications are 52 percent higher in MA than in FFS, and coding rates for diabetes with acute complications are 12 percent higher, while coding rates for diabetes without complications are 19 percent lower (see Figure 11-11). MA had a 10 percentage point lower rate of follow-up coding for diabetes without complication (47 percent compared with 57 percent).

(continued next page)

Congressional request on Medicare Advantage and fee-for-service diagnostic-coding practices (cont.)

FIGURE 11-10

Wide variation in the persistence of coding chronic-condition HCCs for MA and FFS, but more conditions had higher persistence in MA, 2022–2023



Note: HCC (hierarchical condition category), MA (Medicare Advantage), FFS (fee-for-service). Beneficiaries were either enrolled in FFS Medicare for all of 2022 and 2023 or MA for all of 2022 and 2023. Follow-up rates of diagnostic coding were calculated as the share of beneficiaries with an HCC coded in 2022 who were also coded with the same HCC or a related, higher-severity HCC in 2023. For V24 HCC descriptions and coefficients, see Table VI-1 of CMS’s announcement of MA payment rates for calendar year 2020.

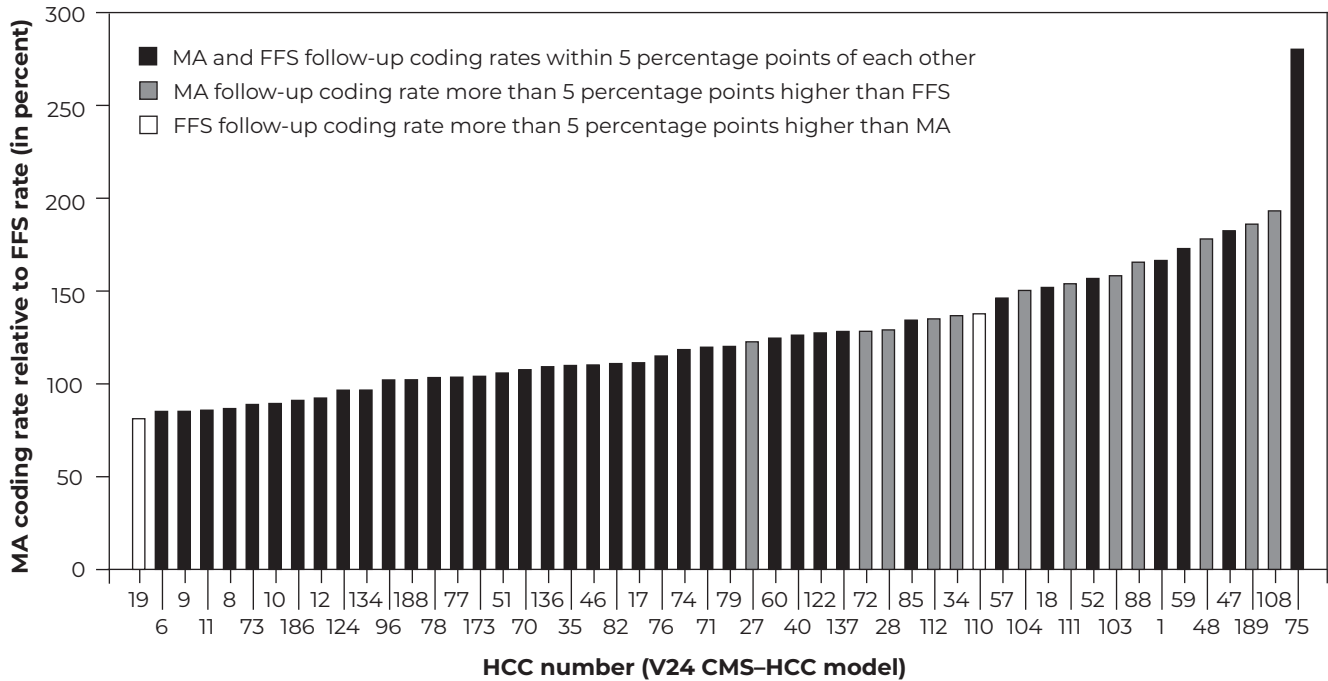
Source: MedPAC analysis of Medicare enrollment and risk-score files for 2022 and 2023.

(continued next page)

Congressional request on Medicare Advantage and fee-for-service diagnostic-coding practices (cont.)

FIGURE 11-11

Chronic conditions with higher MA follow-up coding rates compared with FFS also have higher demographic-adjusted MA coding rates, 2023



Note: MA (Medicare Advantage), FFS (fee-for-service). Beneficiaries were either enrolled in FFS Medicare for all of 2022 and January of 2023 or in MA for all of 2022 and January of 2023. Differences in MA and FFS HCC-coding rates account for differences in age, sex, and Medicaid eligibility. For V24 HCC descriptions and coefficients, see Table VI-1 of CMS's announcement of MA payment rates for calendar year 2020. For each HCC, the figure shows the ratio of the MA coding rate over the FFS coding rate, where 100 percent indicates similar rates of coding.

Source: MedPAC analysis of Medicare risk score and enrollment files for 2022 and 2023.

Cystic fibrosis is the highest-severity HCC in a hierarchy along with chronic obstructive pulmonary disease (HCC 111) and fibrosis of lung and other chronic disorders (HCC 112). Beneficiaries with cystic fibrosis account for only 0.1 percent of all beneficiaries with one of the HCCs in this hierarchy. For a single year, we find that MA rates of coding cystic fibrosis are 38 percent higher than in FFS Medicare, and MA rates of coding for any of these three HCCs are 53 percent higher than in FFS Medicare. However, MA had a 10 percentage point

lower rate of follow-up coding for cystic fibrosis, 72 percent versus 82 percent in FFS.

Next, we consider the 12 HCCs that had follow-up rates that were more than 5 percentage points higher in MA than in FFS. These HCCs tended to have lower follow-up rates for all beneficiaries (these HCCs tend to be on the left side of Figure 11-11), and all have higher single-year coding rates in MA than in FFS, ranging from 23 percent higher to 94 percent higher (accounting for differences in age,

(continued next page)

Congressional request on Medicare Advantage and fee-for-service diagnostic-coding practices (cont.)

sex, and Medicaid eligibility), shown in medium gray in Figure 11-11. Higher single-year MA coding rates appear to be associated with higher MA follow-up rates. One possible reason for this association is that higher MA coding may be caused by plans using a simple diagnostic tool in a way that lacks clinical consensus. For example, if a diagnosis is based on a noninvasive test that can be conducted in a beneficiary's home, MA plans may incorporate this test into an in-home health risk assessment, leading to higher overall MA coding for that condition. At least one MA insurer has been using a noninvasive device to test for vascular disease during in-home visits. The manufacturer of the test states that it is a stand-alone device for diagnosing vascular disease, but some doctors disagree. Noninvasive testing for this disease more than doubled in MA between 2018 and 2021 while remaining relatively stable in FFS Medicare (Ross et al. 2024). We find that vascular disease (HCC 108) is documented almost twice as often in MA than in FFS when accounting for differences in age, sex, and Medicaid eligibility (Figure 11-11).

Conclusion

Because the risk-adjustment model is calibrated on FFS spending and diagnoses, when MA coding intensity is higher than in FFS Medicare—regardless of the reason—it increases payments to MA plans above FFS spending. Estimating the share of diagnostic-coding differences associated with any one reason is difficult. In our analysis, we attempt to assess the impact of different incentives to document diagnosis codes in MA and FFS Medicare by estimating rates of follow-up coding in MA and FFS Medicare. We found that follow-up coding rates were somewhat lower for FFS beneficiaries for most, but not all, chronic conditions. Our analysis suggests that while diagnoses are coded incompletely in both MA and FFS, “incomplete coding” is somewhat more common in FFS than in MA. Finally, we caution that neither MA nor FFS coding practices are likely to produce “accurate” diagnostic coding given the incompleteness in diagnosis codes that we found in both FFS and MA and the allegations of fraudulent diagnostic-coding practices in MA made by the Department of Justice and a number of industry whistleblowers. ■

after MA enrollment, risk scores increased about 6 percent faster than FFS and about 2 percent faster in the second year (Geruso and Layton 2020). The Government Accountability Office used a risk-score-prediction model to estimate coding intensity for 2010 through 2012, and those estimates align very closely to the Commission's estimates over that same time period (Government Accountability Office 2013). A new study focusing on diagnoses submitted on hospital claims has found higher levels of MA coding intensity for beneficiaries who subsequently had a health assessment in a skilled nursing facility (Kosar et al. 2024).

Starting in 2010, a series of congressional mandates require 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 (which is generally thought to mean a risk model that has coefficients estimated using MA encounter data, rather than FFS claims 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 2025.⁴²

The Commission's method for estimating coding intensity compares MA and FFS risk scores, controlling for age, sex, Medicaid eligibility, and institutional status, and identifies differences in risk scores as due to differences in coding intensity. We introduced that method in 2024. After revising our method of estimating coding intensity, the Commission found that the new method and the older method the Commission had been using, despite different methodological approaches, produced substantially similar estimates of plan coding intensity over the period 2007 through 2021. A detailed description of those methods can be found in Chapter 13 of our March 2024 report to the Congress, along with the research leading to the revisions. This year, we made additional revisions to exclude Puerto Rico from our coding-intensity estimate because accurate data on Medicaid eligibility are not available.⁴³ This revision reduced our coding-intensity estimates by about 1 percentage point from what we previously reported. We also modified how we weight new enrollees so that the estimate more accurately reflects the share of payments associated with new and continuing (those with risk scores based on diagnosis codes) enrollees. More details on our methodology for estimating MA coding intensity can be found in Technical Appendix 11-B.

Figure 11-12 (p. 356) shows the impact, for 2007 through 2023, 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). MA coding intensity has been above FFS levels since 2007 and has increased steadily, with a few exceptional years, to about 17 percent in 2023. CMS's coding-intensity adjustment began in 2010 and has been lower than overall MA coding intensity since 2011.

We estimate that MA coding intensity increased, on average, by 1.1 percentage points per year from 2007 through 2013 and by 1.4 percentage points per year for 2017 through 2021. Deviations from the typical trend of growing MA coding intensity occurred in 2014, 2016, and 2017, which we attribute to two factors: (1) A new version of the risk-adjustment model was phased in for 2014, 2016, and 2017 that reduced the gap in MA

and FFS diagnostic-coding differences; and (2) FFS risk scores grew faster (matching or nearly matching MA risk-score growth rates) in 2016 and 2017 than in the previous or subsequent years, 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 report's MA chapter for a more detailed explanation of these factors (Medicare Payment Advisory Commission 2021b).

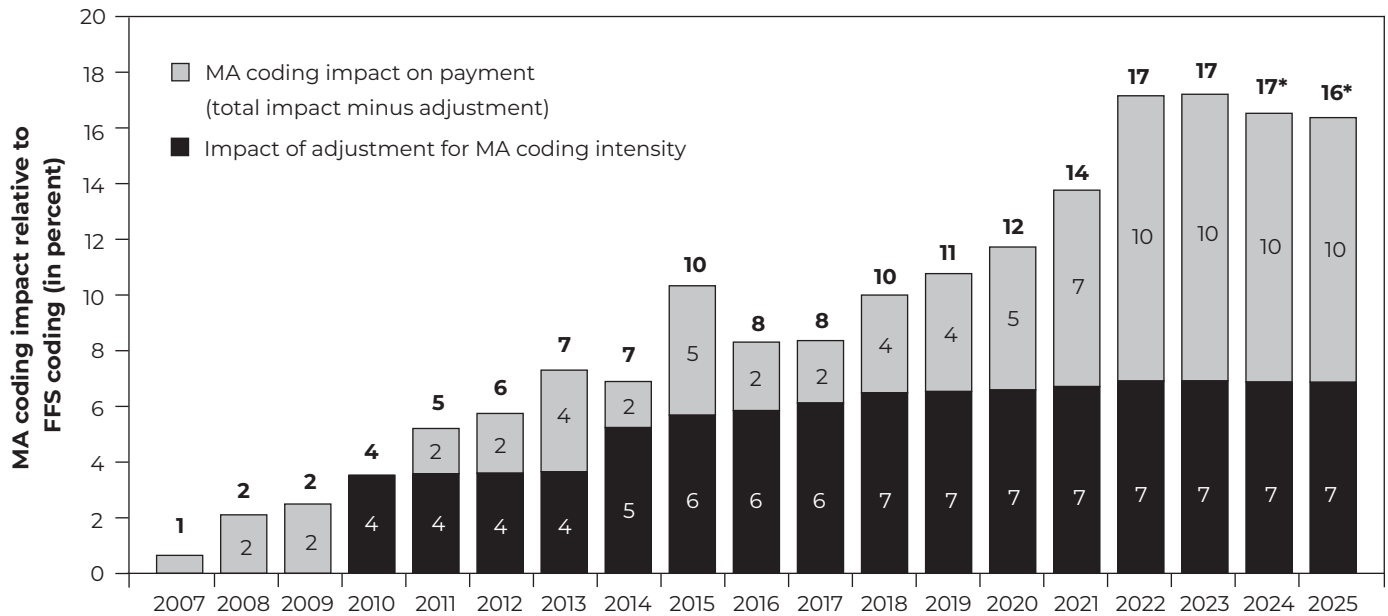
Average MA risk scores in 2021 (which were based on diagnoses on claims for services provided in 2020) were lower than 2020 risk scores, reflecting the reduction in service use in the first year of the pandemic. However, because the reduction in MA risk scores in 2021 was less than the reduction in risk scores for comparable FFS beneficiaries, estimated MA coding intensity continued to increase in 2021. We estimate a 3.4 percentage point increase in coding intensity from 2021 to 2022, which may have reflected efforts by plans to raise MA risk scores, in part through the use of health risk assessments and chart reviews as described below, after MA risk scores had fallen in the prior year.

Between 2022 and 2023, we estimate that overall MA coding intensity remained steady at 17 percent. Over this period, FFS risk scores grew much faster than in prior years (more than three times faster than from 2021 to 2022) and slightly outpaced the rate of MA risk-score growth. It is possible that postpandemic risk-score trends returned to normal rates a year earlier for MA than FFS due to MA plans' coding efforts in 2021 (affecting 2022 risk scores). Coding intensity increased by about 1.7 percentage points on average between 2021 and 2023, which is similar to the trend from 2017 through 2021.

Because the data required to estimate coding intensity are not yet available for 2024 and 2025, we project coding intensity for those years based on the annual trend from 2019 through 2023, an increase of 1.6 percentage points per year. We estimate that phasing in the V28 risk-adjustment model effectively reduced the coding-intensity estimate for 2024 by -2.3 percentage points and by -1.8 percentage points in 2025 for a net change in coding intensity of -0.7 percentage points from 2023 to 2024 and of -0.2 percentage points from 2024 to 2025. (See Technical Appendix 11-B, section titled "Impact of phasing in the V28 risk-adjustment model" (p. 390), for more details.) There is uncertainty

FIGURE 11-12

Estimated impact of coding intensity on MA risk scores was larger than the coding adjustment, 2007-2025



Note: MA (Medicare Advantage), FFS (fee-for-service). All estimates account for any differences in age, sex, Medicaid eligibility, and institutional status between MA and FFS populations. New enrollees are constrained to have no coding intensity because their risk scores are not based on diagnostic coding. Beneficiaries residing in Puerto Rico are excluded. The annual adjustment for MA coding began in 2010. MA coding intensity has increased MA risk scores annually, but increases were offset by new versions of the risk-adjustment model in 2014, 2016, and 2017 and by increased FFS coding in 2016 and 2017. The impact of the coding adjustment is calculated as the MA coding-intensity estimate relative to FFS, multiplied by the coding adjustment. For 2025, we calculate 1.16×5.9 percent = 0.069 or about 7 percent. Components may not sum to totals due to rounding.

* For 2024 and 2025, we project coding intensity based on the annual trend from 2019 through 2023, an increase of 1.6 percentage points per year. Then we reduced the annual trend by our estimate of the effect of the phase-in of the V28 risk-adjustment model, which is -2.3 percentage points in 2024 and -1.8 percentage points in 2025. See Technical Appendix 11-B section titled, "Impact of phasing in the V28 risk-adjustment model" (p. 390) for more details.

Source: MedPAC analysis of CMS enrollment and risk-score files.

about the impact of moving to the V28 model for MA coding intensity. We will continue to monitor those effects and will update our analysis as we are able. We expect to have risk-score data for 2024, the first year of the V28 implementation, for our March 2026 report.

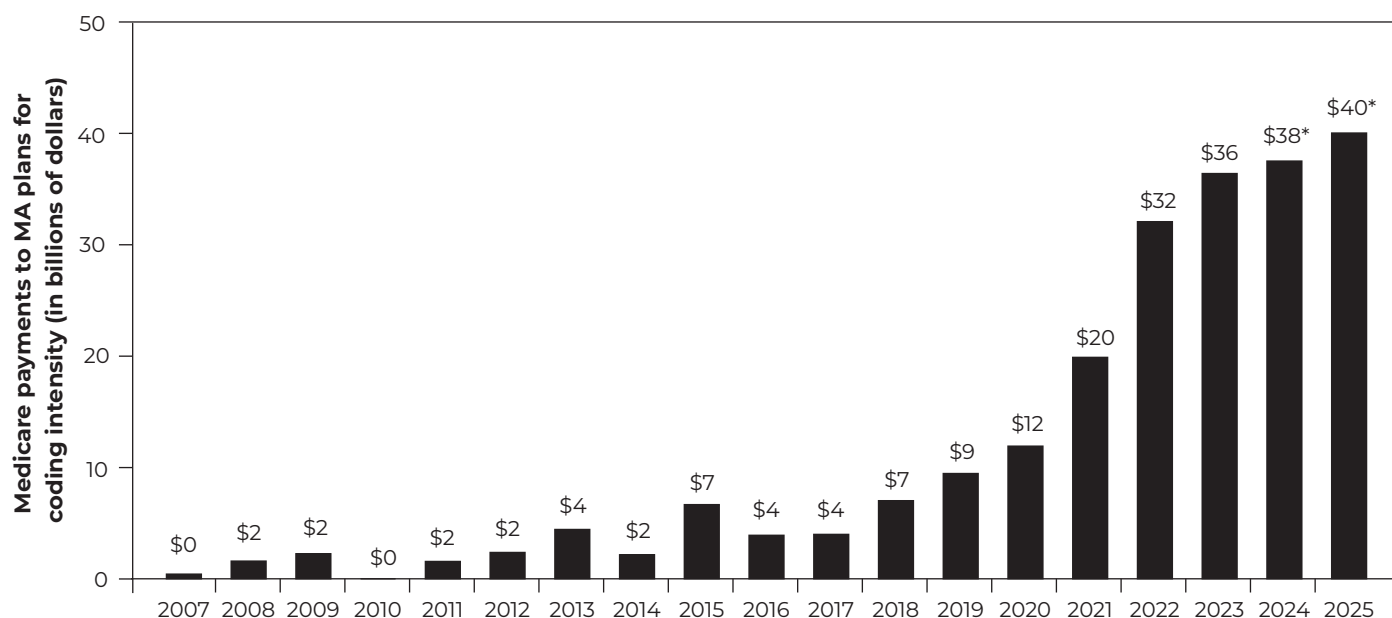
For 2025, we project that MA risk scores will be about 16 percent above risk scores for comparable FFS beneficiaries. This difference is only partially offset by CMS's coding-intensity adjustment, which reduced MA risk scores by 5.9 percent. The net effect is a 10 percent increase in MA risk scores due to coding intensity,

leading to \$40 billion in higher projected payments to MA plans.

Between 2007 and 2023, MA coding intensity resulted in \$146 billion in increased payments to MA plans (Figure 11-13). Using our projection, we estimate that MA coding intensity in 2024 and 2025 will increase program spending by another \$38 billion and \$40 billion, respectively. In total, we estimate that between 2007 and 2025, MA coding intensity will have generated \$224 billion in higher aggregate payments to MA plans.

**FIGURE
11-13**

MA coding intensity has increased payments to plans by an estimated \$146 billion through 2023 and is projected to generate nearly \$78 billion more in 2024 and 2025



Note: MA (Medicare Advantage). Estimates for 2007 through 2023 are based on the Commission's estimate of coding intensity after accounting for CMS's coding adjustment. In all years, Medicare spending for MA plans is based on the Medicare Trustees' reports and excludes spending for beneficiaries with end-stage renal disease.

* For 2024 and 2025, we project coding intensity based on the annual trend from 2019 through 2023, an increase of 1.5 percentage points per year. Then we reduced the annual trend by our estimate of the effect of the phase-in of the V28 risk-adjustment model, which is -2.3 percentage points in 2024 and -1.8 percentage points in 2025. See Technical Appendix 11-B, section titled "Impact of phasing in the V28 risk-adjustment model" (p. 390), for more details.

Source: MedPAC analysis of CMS enrollment and risk-score files and the Medicare Trustees' reports.

Documenting additional diagnosis codes increases plan rebates and can distort competition among plans

Documenting additional diagnostic codes increases the size of MA plans' rebates, which in turn allows plans to offer their enrollees more supplemental benefits than plans that document fewer additional diagnoses. For a plan submitting a bid below its benchmark (nearly all plans in 2025), the plan's rebate is based on the difference between the plan's bid for its expected enrollee population and the plan's risk-adjusted 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 the risk-adjusted benchmark, thereby increasing the plan's rebate amount and ability to offer more supplemental benefits. In sum, plans can translate greater coding intensity into the ability to offer more supplemental benefits, giving them a competitive advantage over their competitors in attracting enrollees.

MA payment policies aim to give plans an incentive to lower spending and improve quality by allowing them to offer more supplemental benefits. By reducing health care costs, plans can reduce their

**TABLE
11-5**

Illustrative example: A plan that codes more diagnoses can offer its enrollees more supplemental benefits

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 supplemental 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). 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.

* Plan A and Plan B at 3.5 stars have a rebate percentage of 65 percent. Plan Z at 5 stars has a rebate percentage of 70 percent.

bids, increasing their rebate and supplemental 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).⁴⁴ These policies are intended to benefit beneficiaries through improved quality, more supplemental benefits, and reduced premiums, as well as lower taxpayer funding for the Medicare program. Greater MA coding intensity, however, distorts these incentives by allowing plans to offer more supplemental benefits regardless of whether they reduce costs or improve quality.

Table 11-5 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. Plan A and Plan Z have an expected risk score of 0.97, while Plan B has an expected risk score of 1.03 due to coding more diagnoses. All three plans have bids below the risk-adjusted benchmark and provide supplemental benefits funded by rebates. However, because Plan B has a higher risk score, its rebate is larger than Plan A's

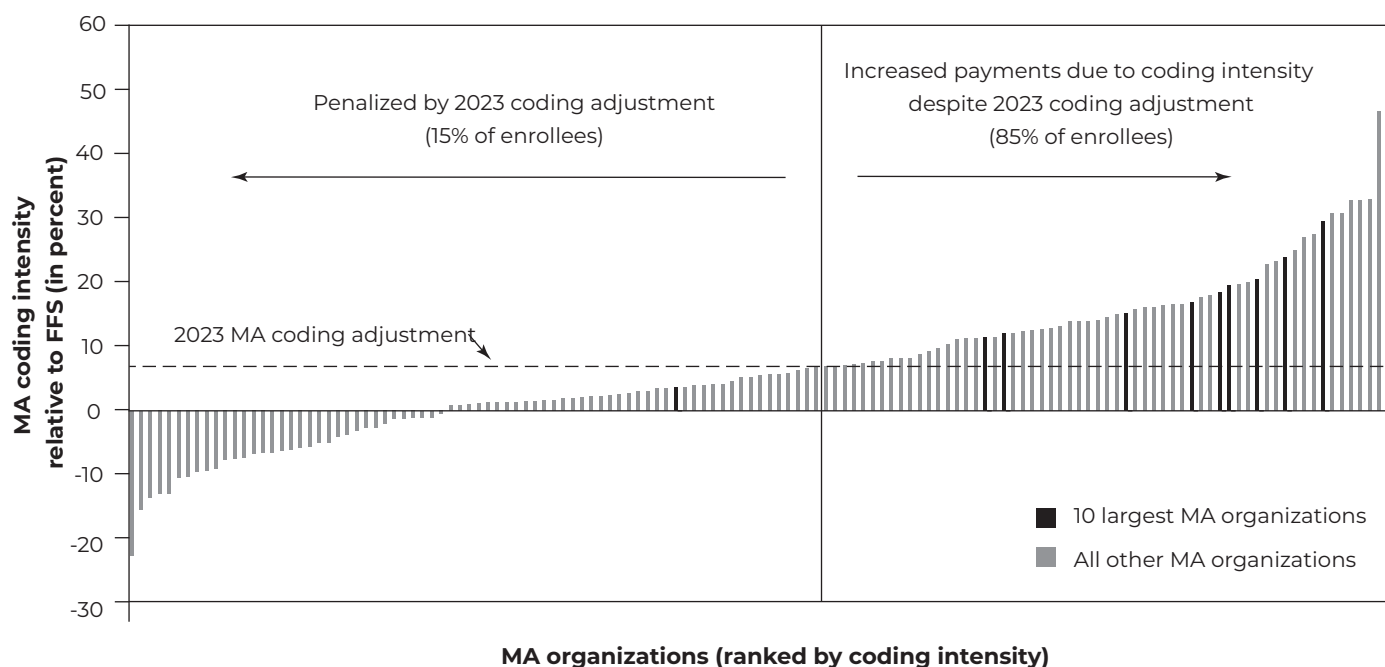
rebate (\$52 per month vs. \$15 per month), so it can offer enrollees more supplemental benefits. Plan B's coding efforts have therefore given it an unfair competitive advantage over Plan A.

In addition, increased coding intensity can influence the size of the rebate more than MA quality bonuses can. 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 supplemental benefits than are provided through quality bonuses.

The plans illustrated in Table 11-5 have a risk-score difference of 6 percentage points, reflecting different coding practices. We estimated coding intensity for MA organizations and found much greater variation in coding for 2023.⁴⁵ Figure 11-14 shows MA coding intensity relative to FFS coding, broken out by MA parent organization, excluding beneficiaries who reside in Puerto Rico or are enrolled in chronic-condition special-needs plans and organizations with fewer than 2,500 enrollees in the analysis.

**FIGURE
11-14**

Coding intensity relative to FFS varied widely across MA organizations, 2023



Note: MA (Medicare Advantage), FFS (fee-for-service). All estimates account for any differences in age, sex, Medicaid eligibility, and institutional status between MA and FFS populations. New enrollees are constrained to have no coding intensity because their risk scores are not based on diagnostic coding. Beneficiaries residing in Puerto Rico or enrolled in a chronic-condition special-needs plan are excluded from the analysis, as well as organizations with fewer than 2,500 enrollees.

Source: MedPAC analysis of CMS enrollment and risk-score files.

Consistent with prior years, we find that about half of organizations (covering 15 percent of MA enrollees) have coding intensity below CMS’s 2023 coding adjustment and are thereby penalized by the adjustment, while the other half of organizations (covering 85 percent of MA enrollees) have coding intensity that increases their payment even after accounting for the 2023 coding adjustment. These differences demonstrate that CMS’s across-the-board adjustment for coding intensity, which reduces all MA risk scores by the same amount, generates further inequity across contracts by reducing net revenue for plans with lower coding intensity and allowing other plans to retain a significant amount of revenue from higher coding intensity.

We also find significant variation in coding intensity across the 10 largest MA organizations (covering 81 percent of MA enrollees), from about 4 percent to 29

percent above FFS levels. Nine of the 10 largest MA organizations had greater coding intensity than the 2023 coding adjustment and therefore received a net increase in payment due to their coding practices. These differences are large enough to give MA organizations with higher coding intensity a significant competitive advantage by increasing the size of plan rebates and helping them to attract more enrollees. Our finding that coding intensity varies across MA organizations is consistent with other research (Geruso and Layton 2020, Kronick and Chua 2021, Kronick and Welch 2014).

MA plans have several tools that are unavailable in FFS to code more diagnoses

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 plan-identified 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.⁴⁶

Capitated arrangements in California and Florida may exacerbate coding intensity In the course of reviewing our coding-intensity estimates by MA organization, we found that several organizations with the highest levels of diagnostic coding are located in California and Florida. Of the 24 MA organizations offering plans primarily in California and Florida (i.e., organizations with a majority of their enrollment in California or Florida), 7 were among the 17 organizations with the highest estimated coding intensity across the nation, including 4 of the 8 organizations with the highest levels of estimated coding intensity (Figure 11-15). These four organizations had MA risk scores that ranged from 29 percent higher to 56 percent higher than scores for comparable FFS beneficiaries.

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," which may explain why these California- and Florida-focused organizations account for so many of the highest-coding organizations. Under the delegated model, the responsibility for health care delivery and the 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,

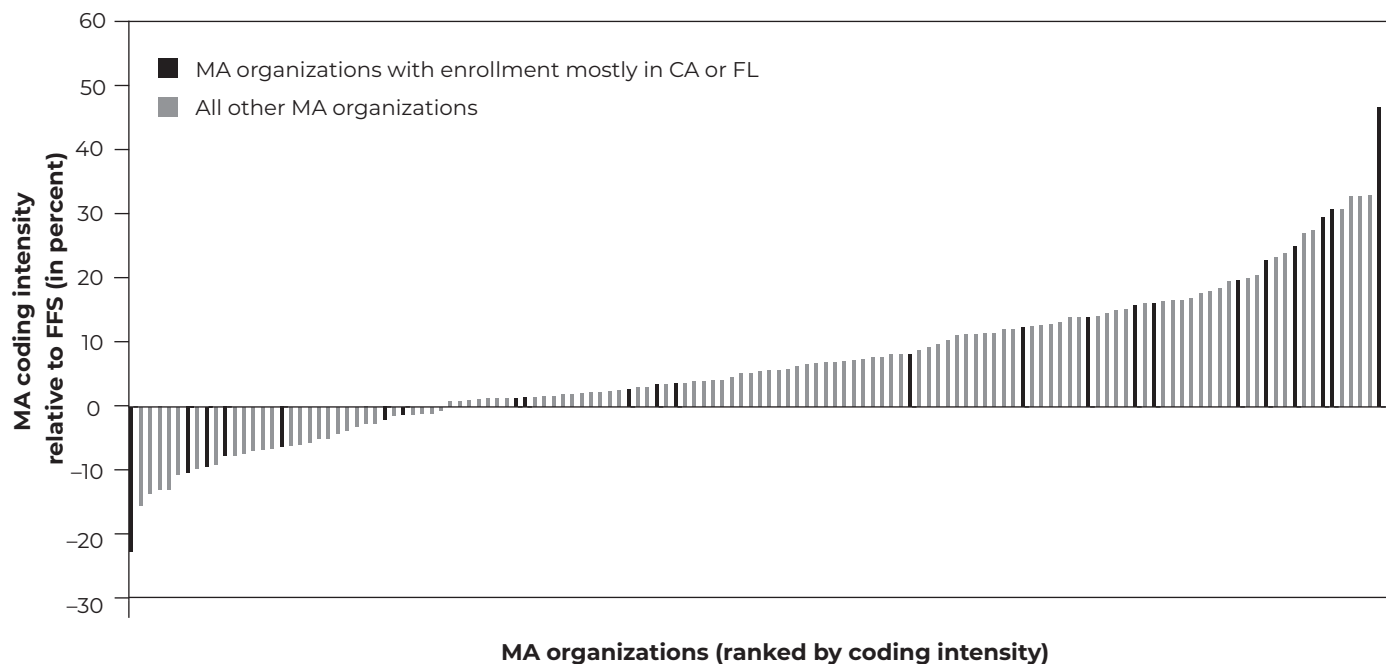
which is often calculated as a share of a plan's total Medicare revenue. Because a plan's revenue increases when more diagnoses are documented, the capitated payments to providers (determined as a percentage of the plan's revenue) increase proportionately. In these arrangements, the financial incentive 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 do not have data that would allow us to confirm that the plans offered by the highest-coding California and Florida organizations use the delegated model, we reviewed the share of 2022 provider payments that were capitated for the top seven such organizations. Of these seven organizations, four organizations had a greater share of provider payments that were capitated than the national average (36 percent in 2022), including three organizations for which more than half of provider payments were capitated. We note that the alignment of clinical and financial accountability under the delegated model may provide a number of beneficial incentives to constrain costs, avoid low-value care, and coordinate care. However, these potential benefits do not justify increased 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 diagnostic coding Health risk assessments are provided to Medicare beneficiaries as part of an annual wellness visit, and, for MA enrollees, health risk assessments are often provided during a plan-initiated home visit.⁴⁷ Health risk assessments may be part of a plan's care-management approach and should continue to be used for that purpose when they are used to improve patient care. However, when health risk assessments identify diagnosis codes that are not documented on subsequent encounters with providers, which would demonstrate that the condition was under active management, those codes should not be used for risk adjustment and for making payments to plans. Health risk assessments sometimes rely on patient self-reporting of medical conditions, which may result in HCCs based on inaccurate diagnoses, diagnoses that are no longer active (and therefore not eligible for risk adjustment), or diagnoses without sufficient evidence to conform to ICD coding guidelines (Department of

**FIGURE
11-15**

MA organizations offering plans primarily in California or Florida account for many of the organizations with the highest estimated coding intensity



Note: MA (Medicare Advantage), FFS (fee-for-service). All estimates account for any differences in age, sex, Medicaid eligibility, and institutional status between MA and FFS populations. New enrollees are constrained to have no coding intensity because their risk scores are not based on diagnostic coding. Beneficiaries residing in Puerto Rico or enrolled in a chronic-condition special-needs plan are excluded from the analysis, as well as organizations with fewer than 2,500 enrollees.

Source: MedPAC analysis of CMS enrollment and risk-score files.

Justice 2022). (More information about these concerns is in the chapter on MA in our March 2023 report.)

We analyzed 2022 encounter records to identify HCCs that were supported only by a health risk assessment, meaning that there was no physician or hospital service provided to treat a beneficiary for a specific health condition during the same calendar year.⁴⁸ In 2022, about 7.7 million MA enrollees had a health risk assessment that identified at least one HCC, and a total of 17.1 million unique HCCs were identified through health risk assessments. Of those, 3.5 million beneficiaries had a health risk assessment that was the only source for at least one of the HCCs identified, and a total of 5.7 million HCCs (one-third of all HCCs identified on health risk assessments) were identified only on a health risk assessment. Six HCCs each

generated more than \$900 million in payments from these assessments, accounting for about half of all payments generated by health risk assessments.⁴⁹ We found that diagnostic coding that was associated with only health risk assessments accounted for \$15 billion in payments to MA plans in 2023, or a little more than 3 percent of all payments to MA plans. About 80 percent of these payments were from health risk assessments conducted as part of an annual wellness visit or initial preventive physical examination, while the rest of these payments were from in-home health risk assessments. Other researchers found similar estimates of the impact of health risk assessments, contributing about \$12 billion in payments to MA plans in 2020 (James et al. 2024). That research also found differences in the use of health risk assessments across parent organizations.

MA plans' use of chart reviews to increase diagnosis coding Some MA plans devote significant effort to conducting chart reviews to increase MA payments. 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 increased payments to MA plans. Chart reviews allowable for risk adjustment 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); diagnoses that are not reported on the provider's claim sent to the MA plan, diagnoses made during an encounter in which the MA plan does not submit a record of the encounter to CMS, or diagnoses made during an encounter in which the total number of diagnoses from that encounter exceeds the number of diagnosis fields on the encounter record. Because Medicare requires each HCC to be supported by diagnostic evidence in a patient's medical record (chart), chart reviews are one way for plans to identify diagnoses not captured through provider claims or in plan encounter data.

Like health risk assessments, some MA plans treat chart-review programs as an independent revenue stream that yields a positive return on investment because the additional Medicare payments from newly documented diagnoses far exceed the costs of paying nurses and medical assistants to review medical charts.⁵⁰ Several lawsuits allege that MA plans use chart reviews to identify new diagnosis codes but not to verify the accuracy of already submitted codes. Some lawsuits allege that an MA organization is aware that diagnoses submitted to CMS are not supported by the medical chart and therefore violate Medicare's rules governing the reporting of diagnoses (United States of America ex rel. Benjamin Poehling v. UnitedHealth Group Inc. et al. 2016, United States of America ex rel. James M. Swoben v. Secure Horizons 2017, United States of America v. Anthem Inc. 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 (Blue Health Intelligence 2020, Optum 2020). While the financial return is worth plan sponsors' effort and financial investment, chart-

review programs increase the financial burden for the taxpayers and beneficiaries who fund the Medicare program.

We analyzed 2022 encounter records to identify HCCs that were supported by a chart review but not through any other record of a physician or hospital encounter during the same calendar year. In 2022, about 12.0 million MA enrollees had a chart review that identified at least one HCC, and a total of 33.2 million unique HCCs were identified on chart reviews. Of enrollees with a chart review, 5.8 million beneficiaries had a chart review that was the only source of an HCC, and a total of 9.0 million HCCs (about 27 percent of all HCCs identified on chart reviews) were identified only through a chart review. Eight HCCs each generated more than \$1 billion in Medicare payments from chart reviews, accounting for more than half of all chart review-based payments.⁵¹ We found that in 2023, chart reviews alone accounted for about \$24 billion in payments to MA plans, or about 6 percent of all payments to MA plans.

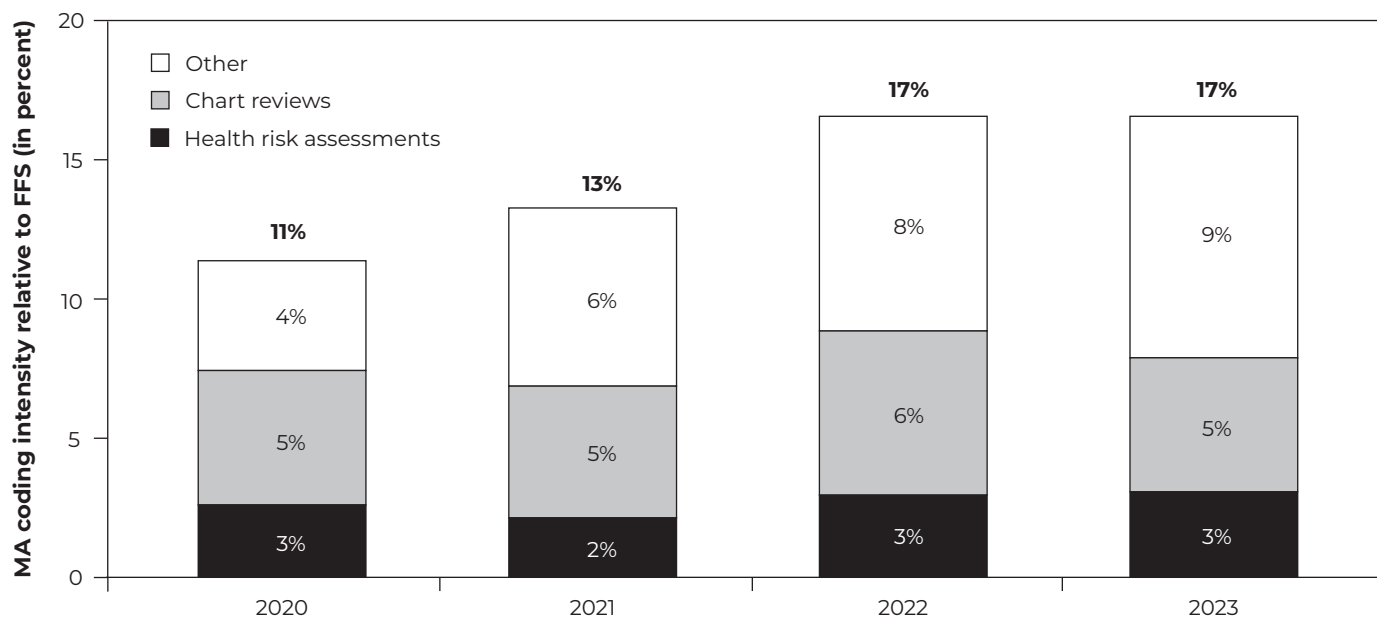
We estimate that chart reviews and health-risk assessments together accounted for about \$34 billion in payments to MA plans, or about 8 percent of all payments to MA plans in 2023.⁵² Combined with our finding that all sources of coding intensity resulted in MA risk scores that were about 17 percent higher than risk scores for comparable FFS beneficiaries in 2023, we conclude that health risk assessments and chart reviews together accounted for about half of all MA coding intensity (Figure 11-16). Our estimates are similar to the results of another researcher's analysis in terms of the overall magnitude of the impact and of the trend in the growing impact of health risk assessments and chart reviews on payments to MA plans from 2016 to 2021 (Jacobs 2024).

The Commission's 2016 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 reduce MA coding intensity has been to address the mechanisms that generate coding differences first (e.g.,

FIGURE 11-16

Chart reviews and health risk assessments accounted for about half of overall MA coding intensity, 2020–2023



Note: MA (Medicare Advantage), FFS (fee-for-service). Figure shows the impact of coding intensity on payments to MA plans for the years 2020 through 2023. The underlying diagnoses were reported during health care encounters in the previous year, 2019 through 2022, respectively. “Other” sources of coding intensity can result from pay-for-coding programs, patient-assessment forms, transferring coding incentives from plans to providers via subcapitation, and other mechanisms. Components may not sum to totals due to rounding.

Source: MedPAC analysis of CMS enrollment and risk-score files and the Medicare Trustees’ reports.

remove health risk assessments and reduce year-to-year coding variations by using two years of diagnostic data) 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 has reduced MA risk scores by 5.9 percent since 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.

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 roughly half of MA coding intensity. The Commission carefully considered

Update on risk-adjustment data-validation audits

Medicare payments to Medicare Advantage (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 organization leadership signs an attestation stating that the submitted diagnostic 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. These overpayments for diagnoses that do not

meet program requirements are not the same as payments for higher MA coding intensity; however, there is an unknown amount of overlap between them.

For RADV audits through 2017, CMS has been using a protocol that audits roughly 5 percent of MA contracts per year, uses a sample of 201 enrollees in each contract across three strata of beneficiaries with low, medium, and high risk scores, calculates an error rate for the sample population, and then calculates the overpayment amount for the sample of audited beneficiaries. 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

(continued next page)

options for addressing coding intensity and supports this approach because it balances implementation feasibility, administrative burden, and effectiveness.

Part of the cause of coding intensity is that providers do not report all possible diagnosis codes for their FFS beneficiaries. We note that using two years of diagnostic data would help address the underreporting of chronic conditions for FFS beneficiaries by helping to capture conditions that are not reported consistently year to year. Theoretically, conducting chart reviews for FFS beneficiaries could also reduce differences in MA and FFS coding; however, such a strategy would need to carefully consider the number of chart reviews necessary to have a meaningful impact, the administrative burden to providers if they were required to assist with the collection of medical charts for FFS beneficiaries, and the resources required for the Medicare program to review those charts

to identify diagnoses allowable for risk adjustment. Alternatively, chart reviews could be eliminated from risk adjustment altogether, thereby aligning the data sources used as sources of diagnoses for risk adjustment.

Adjusting for any remaining coding-intensity differences could also improve equity across MA contracts. Under one illustrative 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 (Medicare Payment Advisory Commission 2016a). CMS has used a similar approach to select MA contracts for RADV audits.⁵³ This policy would improve the overall equity of the coding-intensity adjustment relative to the single, across-the-board adjustment used today. Finally, we note that in 2016, when the Commission voted

Update on risk-adjustment data-validation audits (cont.)

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 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).

For audits of 2018 and subsequent years, CMS finalized an audit method that would allow CMS to recover overpayments by extrapolating the error rate of the sampled enrollees to a larger population of audit-eligible enrollees in the contract. The majority of MA enrollees would be eligible for audit, as nearly 70 percent of MA enrollees had at least one hierarchical condition category (HCC) in

2022, and only a small fraction of these enrollees would be excluded from the audit sample for other reasons.⁵⁴ However, in November 2024, CMS released a guidance document restricting the audit-eligible population to a much narrower set of enrollees in a given contract. Audits of 2018 data will focus only on two sets of beneficiaries: beneficiaries in the top decile of a contract's enrollees based on the greatest expected reduction in their risk score as a result of a RADV audit (based on CMS's improper-payment prediction model) or contract enrollees who had all of their HCCs supported only by chart reviews (Centers for Medicare & Medicaid Services 2024c). The first group of beneficiaries is roughly one-tenth of the beneficiaries who would have been audit eligible under pre-2018 methods. For the second group, we estimate that between 2 percent and 3 percent of all MA enrollees (or between 3 percent and 4 percent of MA enrollees with at least one HCC) had all of their HCCs supported by only chart reviews, and those enrollees had an average of 1.5 HCCs. ■

on this recommendation, estimates of MA coding intensity net of CMS's coding adjustment were much smaller than they are for 2025. Given that the impact of the Commission's recommendation, which would fully account for the effects of higher MA coding intensity, has grown substantially, policymakers could contemplate phasing in the Commission's recommendation.

Industry concentration, integration, and financial condition

In 2024, the MA program included 5,678 plan options offered by 175 organizations. However, enrollment is highly concentrated at the local level and increasingly concentrated at the national level: The largest organization in a county typically enrolls between 40 percent and 50 percent of the market,

and just three organizations enrolled more than half of all MA enrollees nationally in 2024. The continued growth in MA enrollment, the substantial number of plans offered by several organizations, and plans' ability to provide generous supplemental benefits point to continued strong financial health in the MA sector. The Commission has historically analyzed the margins that MA plans report in their bids. However, we have become increasingly concerned about the appropriateness of focusing on plan margins (instead of other metrics of financial health), given that the margins reported in plan bids may provide an incomplete picture of insurers' financial condition. Given our declining confidence in the salience and accuracy of plan-reported margins, we focus on more reliable indicators of the financial health of the MA program, such as plan availability and enrollment. As noted above, substantial growth in MA plan availability and enrollment indicates a robust MA program.

MA market was heavily concentrated locally and nationally in 2024

Enrollment in MA is highly concentrated at the local level and increasingly concentrated at the national level. High enrollment concentration—particularly at the local level—can be a cause for concern if it dampens the competitive pressures that might otherwise drive insurers to maintain or improve quality, make care delivery more efficient, lower premiums, or provide supplemental benefits. Researchers have shown that markets with more competition are associated with increased MA-benefit generosity and lower MA premiums (Cabral et al. 2018, Pelech 2018, Pizer and Frakt 2002, Song et al. 2013). In extreme cases, dominance by a single firm (or small set of firms) may make it difficult for competitors to enter or remain active in a market (Frakt et al. 2012, Pelech 2017).⁵⁵

Over the last decade, enrollment in MA has become increasingly concentrated at the national level in plans owned by a small set of large insurers that serve a majority of markets in the country. Between 2008 and 2024, the share of total MA enrollment in the three largest firms (UnitedHealth Group, Humana, and CVS Health) rose from 32 percent to 59 percent. Much of the growth of these firms—particularly UnitedHealth Group and Humana—has been driven by enrollment increases in counties in which the insurers have offered plans for many years (Hnath et al. 2024). However, all three have also significantly expanded the number of counties in which they offer plans. For example, UnitedHealth Group expanded from offering coordinated-care plans (i.e., HMO or PPO plans) in 41 percent of counties (a service area covering 68 percent of MA-eligible beneficiaries) in 2013, to 54 percent of counties (covering 81 percent of eligible enrollees) in 2020, to 85 percent of counties (covering 95 percent of eligible enrollees) in 2024 (Table 11-6).⁵⁶ Humana and CVS Health have also expanded their service areas, and all three organizations now offer plans in counties that are home to more than 85 percent of MA-eligible beneficiaries. A recent study found that some of the service-area expansions for these three insurers were due to the companies acquiring existing MA contracts from another insurer (Hnath et al. 2024).⁵⁷ For example, acquisitions accounted for 30 percent of new county participation for UnitedHealth Group between 2012 and 2023 (acquisitions accounted for 16 percent and 5 percent of new county participation for CVS Health and

Humana, respectively) (Hnath et al. 2024). However, the study found that nationally, for all MA insurers, only 15 percent of total market-entry events were attributable to acquisitions. These findings suggest that the service-area expansions of large national insurers have (at the time of market entry) generally served to introduce new competition into local markets and are not simply an artifact of changes in ownership of existing competitors.

Between 2023 and 2024, the share of enrollees covered by these top three organizations rose by 1 percentage point to 59 percent (4 percentage points higher than in 2020) (Table 11-6).⁵⁸ Among conventional plans (i.e., plans available to all Medicare beneficiaries, excluding SNPs and employer group plans), the top three organizations nationwide had 57 percent of enrollment in 2024—an increase from 56 percent in 2023.⁵⁹

Given the relevance of local competition for MA enrollees, we place greater importance on examining competition at the county level (Table 11-6). Measures of local market concentration were mixed in 2024. Excluding employer plans and SNPs, in 2024, enrollment in the largest organization in each county (regardless of the insurers' national enrollment) accounted for 42 percent, on average, of all MA enrollment in the county. Enrollment in the top three organizations in each county accounted for 81 percent, on average, of all MA enrollment (unchanged from 2023 but less than the 83 percent observed in 2020). However, the share of MA enrollees living in counties with highly concentrated markets (as measured using the Herfindahl–Hirschman Index (HHI), a common measure of market concentration) increased from 94 percent in 2023 to 95 percent in 2024 (data not shown).⁶⁰ The geographic expansion of large national insurers has contributed to the changing concentration in local markets. When measured using the HHI, average county-level enrollment concentration has fallen over the last decade, despite the rising share of enrollees covered by the three largest firms nationally (data not shown).

Overall, local MA markets tend to be highly concentrated, although the level of concentration has trended downward in recent years. This trend coincides with insurers entering new markets and steadily gaining market share in areas that have historically been very concentrated. Estimates for 2025 indicate that the average beneficiary will have access

**TABLE
11-6**

Medicare Advantage enrollment became increasingly concentrated nationally but slightly less concentrated at the county level, July 2020–July 2024

Plan type	Share of MA-eligible beneficiaries living in counties in which insurer offers an MA plan*			Percentage point change in share	
	2020	2023	2024	2020–2024	2023–2024
Conventional plans					
Top 3 nationwide					
UnitedHealth Group Inc.	81%	94%	95%	+14%	+1%
Humana Inc.	87	92	93	+5	+1
CVS Health Corporation	78	84	88	+10	+4
Share of enrollment					
	2020	2023	2024	2020–2024	2023–2024
All MA plans					
Top 3 nationwide					
UnitedHealth Group Inc.	55%	58%	59%	+4%	+1%
Humana Inc.	26	29	28	+2	–1
CVS Health Corporation	18	18	18	0	0
CVS Health Corporation	11	11	13	+2	+2
Conventional plans					
Top 3 nationwide					
UnitedHealth Group Inc.	54	56	57	+3	+1
Humana Inc.	23	25	24	+1	–1
CVS Health Corporation	22	22	21	–1	–1
CVS Health Corporation	9	9	12	+3	+3
County level (weighted average)**					
Top organization	45	43	42	–3	–1
Top 2 organizations	69	67	66	–3	–1
Top 3 organizations	83	81	81	–2	0

Note: MA (Medicare Advantage). Includes only MA plans (coordinated-care plans, private-fee-for-service plans, and Medical Savings Account plans). Excluded are cost-reimbursed plans and Medicare–Medicaid demonstration plans. “Conventional plans” excludes special-needs plans and employer group plans, which have restricted availability. Components may not sum to totals, differences, and market shares due to rounding.

* Counties in Connecticut are excluded due to changes over time in how the state’s counties are tabulated.

** County-level shares of MA enrollment reflect the beneficiary-weighted average of the top organizations in each county.

Source: MedPAC analysis of July 2020–2024 enrollment data and CMS Landscape files.

to many MA plans offered by a substantial number of organizations, as illustrated earlier in this chapter. However, large national insurers, and some regional or local insurers, frequently enroll a large fraction of MA

enrollees in an area. Such concentration may dampen competition, a topic the Commission will continue to explore and monitor.

Vertical integration of Medicare Advantage plans and providers

MA organizations are increasingly integrating vertically, with provider and insurer lines of business having common ownership (or other financially aligned arrangements). The Commission has previously found that vertical integration is highest in organizations in which a provider-based organization owns and operates a health plan, although the share of enrollees in such vertically integrated plans has eroded over time (Chartis Group 2024, Johnson et al. 2017, Medicare Payment Advisory Commission 2024).

However, insurer-led integration has accelerated in recent years, and several of the largest MA organizations (MAOs) have invested significantly in the acquisition of provider businesses, suggesting that insurers see advantages to owning a greater share of the health care supply chain (CVS Health 2023, Humana 2022, Humana 2021, Humana 2020, Signify Health 2023, UnitedHealth Group 2023, UnitedHealth Group 2022).

MA payment policy—though not the only factor influencing firms' decisions to integrate—likely promotes such arrangements by incentivizing efficient care delivery, rewarding plans that record diagnoses more thoroughly, and providing bonuses to plans that perform well on quality measures (Medicare Payment Advisory Commission 2024). Although the evidence regarding the relationship between plan-provider integration and efficiency, coding intensity, and quality is limited, MAOs may view integration as a way to influence providers' activities more directly to achieve the outcomes incentivized under MA's capitated payment structure. Researchers have also suggested that payments to plan-owned providers may offer an opportunity for MAOs to retain a higher share of profits within the parent organization while meeting medical loss ratio requirements (Frank and Milhaupt 2023, Frank and Milhaupt 2022).

No public data provide a systematic accounting of ownership relationships between MA plans and health care providers, which poses a significant barrier to studying the effects of vertical integration. However, CMS requires MAOs to submit limited information about the extent of their financial relationships with providers and other entities as part of the bidding process. Specifically, plans submitting bids are required to report the amount (including medical costs and

nonbenefit expenses) per member per month that they expect their members to receive from a related party.⁶¹ While the submitted data are projections and not a report of actual utilization in a completed year, they provide insight as to the MAO's own assessment of its integration with other entities. Figure 11-17 illustrates that the degree of vertical integration in MA varies widely across parent organizations and is highest in provider-owned plans. Among these plans, the share is highest in plans owned by health systems (data not shown).⁶²

The data show that large national insurers, on average, remain significantly less vertically integrated than their provider-owned competitors. However, at least one large national insurer is now significantly more vertically integrated than many provider-owned plans. This finding is particularly noteworthy given that large national organizations insure a significant share of MA enrollees nationwide, so trends in the organization of the businesses can affect millions of beneficiaries. While the information presented here is reported at the parent-organization level, health care markets operate primarily at a local level, and national statistics do not necessarily describe the markets in which most beneficiaries live.

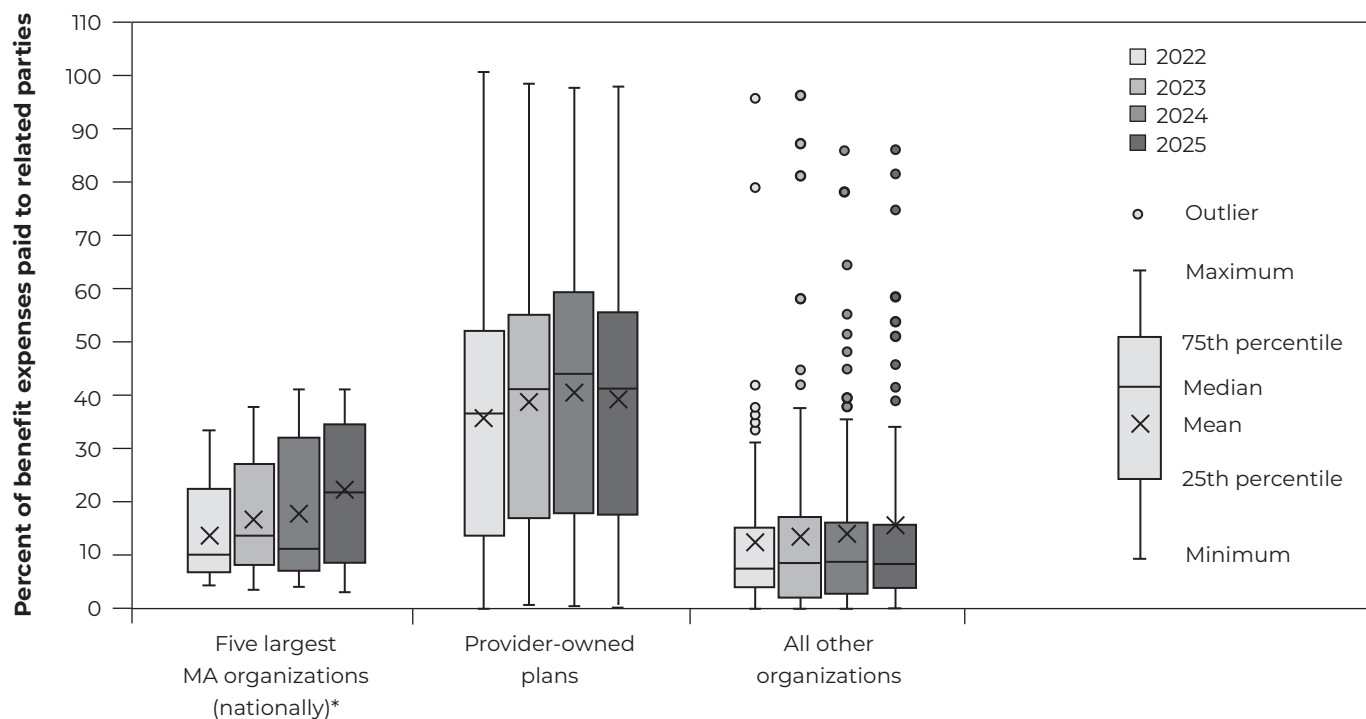
Altogether, we find that the MA industry is increasingly vertically integrated and that such integration may enable MAOs to achieve higher profitability under current MA payment policy. The Commission plans to continue monitoring trends in integration in MA and evaluating its effects on enrollees and the function of the program.

MA margins

The continued growth in MA enrollment, the substantial number of plans offered by several organizations, and plans' ability to provide generous supplemental benefits point to continued strong financial health in the MA sector. We have historically analyzed the margins that MA plans report in their bids. We have consistently reported that 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 (17 percent of MA enrollment in 2024). However, we have become increasingly concerned about the appropriateness of focusing on plan margins (instead of other metrics

**FIGURE
11-17**

Vertical integration is increasing and is highest in plans owned by provider organizations



Note: MA (Medicare Advantage). Excluded are cost-reimbursed plans, Medicare–Medicaid demonstration plans, and employer group plans.
 * The five largest non–provider-owned plans are UnitedHealth Group, Humana, CVS Health, Elevance Health, and Centene. Kaiser Foundation Health Plan enrolls more beneficiaries than Centene but is categorized as a provider-owned plan in the figure. “Outliers” are values greater than 1.5 times the difference between the values at the 75th and 25th percentile. “Maximum” and “minimum” are the values for the category when outliers are excluded.

Source: MedPAC analysis of data from CMS on plan bids, MMIT Directory of Health Plans.

of financial health) and about whether the margins reported in bids are sufficient for characterizing insurers’ financial condition.

One concern is that MA margins may not be comparable with the margins of other health insurance lines of business. For example, MA gross profits (measured in total MA revenue dollars per enrollee after subtracting MA expenses) tend to be much higher than other lines of health insurance business (Ortaliza et al. 2024, Ortaliza et al. 2023). Because Medicare beneficiaries have higher costs than other populations, an organization that has the same profit margin (measured as the share of remaining revenue after subtracting medical expenses) across its various

insurance lines of business will likely have higher gross profits (measured in dollars per enrollee) in MA, particularly if the organization’s fixed costs (e.g., rent, utilities, information technology infrastructure, and base salaries and benefits) are similar across lines of business. Thus, the per enrollee revenues that remain after covering medical costs may tend to be higher in MA relative to individuals covered under other lines of business. Gross profits per MA enrollee may be a more salient indicator than margin because high gross profits would enable a plan to increase the amount of revenue allocated to employee and broker compensation, investments, advertising, lobbying, infrastructure, and returns to shareholders (in for-profit plans).

A second concern with the margins reported in MA bids is whether the margin data collected through the bidding process appropriately characterize insurers' profits. This concern is particularly acute for vertically integrated firms—those in which plans and providers are owned by the same organization. For a vertically integrated organization, the margin for the insurance line of business might not reflect the margin for the parent organization. For example, payments from a plan to a provider owned by the same parent organization would count as medical expenses for the plan (putting downward pressure on plan margin) but contribute positively to the margin of the parent organization. Because plan bids include margin information only for the plan, they may understate insurers' financial health. The degree to which provider revenues are shared with plans under these arrangements is unclear, but limited financial data suggest a substantial shifting of revenues and expenses for at least one large health plan (Frank and Milhaupt 2022, Milhaupt 2023). In addition, we have observed some provider-sponsored plans that consistently report negative MA margins despite consistent growth in MA enrollment. These reported margins have become difficult for us to reconcile with CMS's requirement that MA plans with negative margins must submit a business plan to achieve profitability and CMS's stated expectation that MA plans meet or exceed the year-by-year margin targets in the business plan. Because plan bid data do not necessarily reflect the expenses and margins of their affiliated providers, we have diminishing confidence in the margins reported in plan bids. This problem is likely to grow as vertical integration between insurers and providers increases. The Commission stated in its March 2024 report to the Congress that it would consider not reporting plan margin data in future years. Given our declining confidence in the salience and accuracy of plan-reported margins, we omit these data and focus on more reliable indicators of the financial health of the MA program, such as plan availability and enrollment (Medicare Payment Advisory Commission 2024).

Quality in MA

The Commission has long held that MA presents opportunities for innovation to achieve higher-quality

care at lower cost. It is important for the Medicare program to monitor MA plan performance and quality to ensure that beneficiaries have access to high-quality health care. Beneficiaries also need good information about the quality of and access to care provided by MA plans in their local market. However, the Commission has determined that the current system for MA quality reporting and measurement is flawed and does not provide a reliable basis for evaluating quality across MA plans (Medicare Payment Advisory Commission 2020a, Medicare Payment Advisory Commission 2019). Nonetheless, these measures are the basis for the MA quality-bonus program (QBP), which increases MA payments by about \$15 billion annually. However, because it is important to understand beneficiaries' experience with their coverage in the MA and FFS programs, this year we report patient-experience scores, which are less subject to the challenges of current Medicare quality reporting for MA and FFS beneficiaries. Here we provide a brief overview of the current MA QBP and indicators of patient experience in MA compared with FFS from the annual Consumer Assessment of Healthcare Providers and Systems (CAHPS) surveys of these groups.

CMS assessment of MA quality

It is important for Medicare to ensure that MA plans provide good quality care to their enrollees. Quality measurement and rewards can promote better plan quality and support beneficiary choice of plans. In 2006, CMS introduced the MA star-rating system composed of measures tied to clinical quality, administrative capability, and patient experience.⁶³ Medicare currently collects close to 100 MA quality measures, over 40 of which are used to determine a star rating from 1 to 5 for each MA contract.^{64,65} These ratings are made available through the Medicare Plan Finder website to enable beneficiaries to compare across plans. As required by the ACA, since 2012 the MA star-rating system has been the basis of the QBP, which increases benchmarks for MA contracts rated 4 stars or higher.⁶⁶ The star rating also contributes to the level of rebate payments. Plans with higher star ratings retain a higher share of the difference between a plan bid and the benchmark when bids are below the benchmark. Beneficiaries enrolled in an MA plan with less than 5 stars can use a once-a-year special enrollment period to switch to a 5-star plan outside of the open enrollment period.

The share of MA contracts receiving quality bonuses has been declining in recent years but remains consistently high. Forty-one percent of rated MA contracts are in bonus status for 2025, a decrease from 44 percent in 2024 and 51 percent in 2023 (Centers for Medicare & Medicaid Services 2024a).⁶⁷ Sixty-nine percent of MA enrollees are enrolled in bonus-status contracts in 2025, compared with 75 percent in 2024 and 72 percent in 2023. Under the coronavirus public health emergency (PHE), CMS relaxed quality-reporting rules, boosting the average star rating from 4.06 in 2021 (before the PHE rule change) to 4.37 in 2022. The rules reverted for the 2023 plan year, and the average star rating has declined to 3.95 in 2025. The share of enrollees in plans achieving 5 stars has also returned to levels more similar to the prepandemic norm—from 27 percent in 2022 to 3 percent in 2025.

Patient-experience scores in MA and FFS Medicare

Good information on the quality and experience of care that MA enrollees receive—and how it compares with FFS Medicare—is necessary for beneficiaries and policymakers to properly evaluate program and plan options. However, several data and methodological challenges affect the ability to compare performance across MA and FFS:

- data completeness and comparability (e.g., lack of clinical data),
- differences in coding intensity across plans and between MA and FFS, and
- favorable selection in MA.

The Commission has discussed its concerns with these limitations in previous reports (Medicare Payment Advisory Commission 2024, Medicare Payment Advisory Commission 2023b, Medicare Payment Advisory Commission 2020a, Medicare Payment Advisory Commission 2020b, Medicare Payment Advisory Commission 2016b). Despite these challenges, the Commission has expressed a strong interest in assessing the quality of care that Medicare beneficiaries receive. To that end, this year we include a summary of MA- and FFS-CAHPS patient-experience measures.

Patient-experience measures are an important indicator of quality of care because they assess

whether something that should happen (such as getting needed care quickly) actually happened and how often it happened, from the patient's perspective. 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. Although not free from the challenges of measuring MA and FFS quality, patient-experience measures are less subject to some of the challenges in comparing MA and FFS outcomes that we have discussed in previous reports.

The Agency for Healthcare Research and Quality's CAHPS surveys generate standardized and validated measures of patient experience. CMS annually fields a CAHPS survey among a sample of FFS beneficiaries to measure beneficiaries' experience of care with Medicare and their FFS providers.⁶⁸ MA organizations are required to contract with a third-party survey vendor to collect CAHPS survey responses from a random sample of each MA contract's enrollees. No FFS administrative claims data or MA plan-submitted encounter data are used in calculating the CAHPS scores, so issues of MA encounter-data completeness and differences in coding intensity do not pose the same degree of challenge as other quality measures when comparing MA and FFS results.

FFS-CAHPS are sampled at the state level, and MA-CAHPS are sampled from contracts. To calculate national FFS and MA scores, CAHPS measures are case-mix adjusted for beneficiary characteristics and weighted at the state and contract level, respectively.⁶⁹ Case-mix adjustment can help control for some differences in beneficiary characteristics among those surveyed, but it does not standardize for all potential differences between the two populations. For instance, differences in the geographic composition of the MA and FFS populations are not included in the adjustment.⁷⁰ Table 11-7 (p. 372) presents CAHPS measure scores for the most recent year available, 2023.

Beneficiaries in both the MA and FFS programs rated their coverage and experience favorably overall in 2023. Many CAHPS measure results were similar for the MA and FFS populations; a few showed small differences (Table 11-7, p. 372). The 2023 MA-CAHPS measure score for "getting needed care and seeing specialists" was 81 (scored on a scale of 0 to 100), which is similar to

**TABLE
11-7**

Differences between MA-CAHPS and FFS-CAHPS scores are small, 2023

CAHPS measure	MA	FFS
Getting needed care and seeing specialists	81	80
Getting appointments and care quickly	83	82
Care coordination (e.g., personal doctor always or usually discusses medication, has relevant medical record, helps with managing care)	86	86
Customer support	90	87
Rating of health plan	88	83
Rating of health care quality	87	85
Annual flu vaccine	71	73

Note: MA (Medicare Advantage), CAHPS (Consumer Assessment of Healthcare Providers and Systems), FFS (fee-for-service). The first four measures are composite measures of multiple survey questions which have responses of “never,” “sometimes,” “usually,” and “always.” CMS converts these to a linear mean score on a 0 to 100 scale. The fifth and sixth measures are global rating measures in which survey questions have responses of 1 to 10, which CMS also converts to a linear mean score on a 0 to 100 scale. The annual flu vaccine measure has a yes/no response. “Plan” in “rating of health plan” refers to the Medicare FFS program or MA, respectively. The FFS-CAHPS response rate was 28 percent, and the MA-CAHPS response rate was 33 percent. In 2023, CMS revised which CAHPS survey items are scored in the “getting appointments and care quickly” composite measure, which may cause fluctuation in scores compared with prior years.

Source: MA-CAHPS and FFS-CAHPS national mean scores published by CMS, 2023.

the FFS-CAHPS measure score of 80. The FFS- and MA-CAHPS scores for the “care coordination” measure were both 86. MA-CAHPS scores were slightly higher than FFS-CAHPS scores for the “customer support,” “rating of health plan,” and “rating of health care quality” measures; however, the FFS-CAHPS score for “annual flu vaccine” was slightly higher than the MA-CAHPS score.

The 2023 results were in keeping with previous years; beneficiaries in both programs generally rated their coverage and experience highly, and differences in the experiences of MA and FFS beneficiaries on these measures were small. For example, the MA- and FFS-CAHPS scores for the “care coordination” measure were about the same and virtually unchanged from 2018 to 2023 (Figure 11-18). Beneficiaries reported “get[ting] needed care and see[ing] specialists” at nearly identical rates across programs and over time.

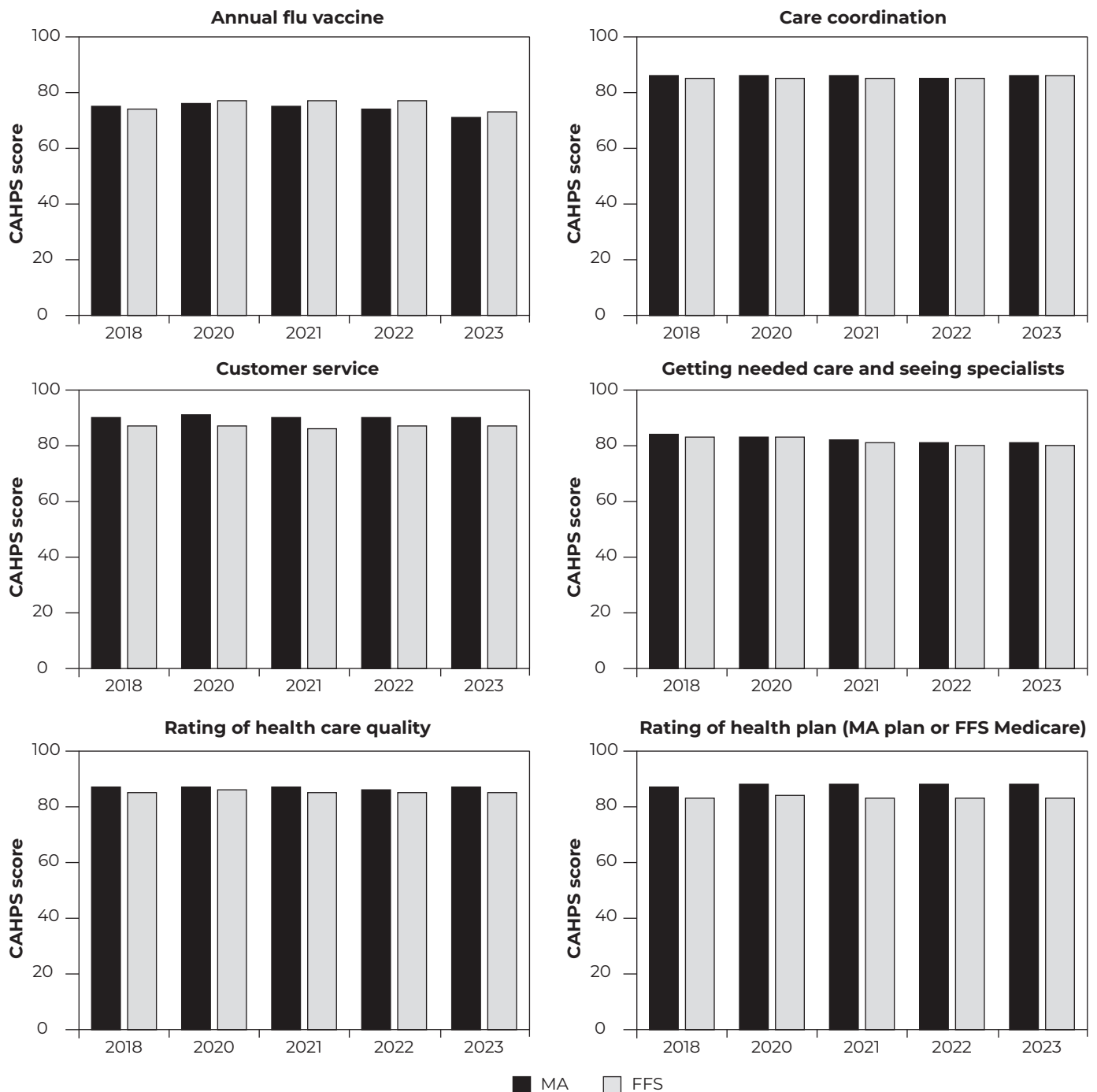
The Commission recognizes that these relatively high and consistent scores do not imply perfect access to care in either MA or FFS Medicare. CAHPS surveys target a random sample of all enrollees, not just those who have sought care during the survey period. The

pattern of responses among subsets of this population (for instance, those with serious health needs) may be quite different. Certain other subsets of enrollees, such as those residing in institutional settings, are also excluded from participation. Further, CAHPS survey items focus on breadth of access to care, not the specifics of cases in which problems have been experienced. While the Commission has expressed concern that the small share of beneficiaries with the greatest health needs may disproportionately experience access problems, the CAHPS survey is not designed to capture the depth of those problems. For this reason, the Commission aims to contextualize the results of these broad, population-level surveys with findings from our annual focus groups, and we are beginning to explore other potential indicators of access and quality in MA, such as prior authorization, provider networks, and reasons for disenrollment from MA plans.

There are other ways of measuring quality outside of patient experience; however, the Commission previously reviewed the literature on studies using other measures and found the literature to be inconclusive.⁷¹ We found wide heterogeneity in

FIGURE 11-18

MA-CAHPS and FFS-CAHPS measure scores are consistently high, 2018-2023



Note: MA (Medicare Advantage), CAHPS (Consumer Assessment of Healthcare Providers and Systems), FFS (fee-for-service). The annual flu vaccine measure has a yes/no response. "Care coordination," "customer service," and "getting needed care and seeing specialists" are composite measures in which survey questions have responses of "never," "sometimes," "usually," and "always." CMS converts these to a linear mean score on a 0 to 100 scale. The ratings of health care quality and health plan are global rating measures in which survey questions have responses of 1 to 10, which CMS also converts to a linear mean score on a 0 to 100 scale. "Plan" in "rating of health plan" can refer to either an MA plan or the FFS Medicare program. The FFS-CAHPS response rate was 28 percent, and the MA-CAHPS response rate was 33 percent. CMS revised which CAHPS survey items are scored in the "getting appointments and care quickly" composite measure, which may cause fluctuation in scores compared with prior years. For this reason, we did not include this measure in the time series. The 2019 CAHPS surveys were halted due to the coronavirus pandemic. We report values for 2018 to include a prepandemic comparison year.

Source: MA-CAHPS and FFS-CAHPS national mean scores published by CMS, 2023.

terms of study populations, metrics evaluated, and data sources used. Some studies found that MA outperformed FFS, some found that FFS outperformed MA, and some were unable to conclude that one program was better than the other. In studies reporting multiple outcomes, results did not consistently point to higher performance in one program than the other. Three major challenges—data completeness and comparability, differences in coding intensity across plans and between MA and FFS, and favorable selection in MA—impacted all included studies to varying extents, limiting our ability to draw conclusions.

Earlier reviews found similarly wide heterogeneity in study design and quality and came to similar conclusions (Agarwal et al. 2021, Ochieng and Fuglesten Biniek 2022). With respect to CAHPS scores specifically, Agarwal and colleagues’ review included six studies, conducted between 2009 and 2019; they concluded that the evidence on experience of care did not show meaningful differences between the aggregate performance of MA plans and FFS Medicare (Agarwal et al. 2021). Overall, MA enrollees and FFS Medicare beneficiaries reported similar levels of satisfaction with care, across these studies and the survey data we have analyzed. Despite these challenges, it is necessary to understand the quality of care that Medicare beneficiaries receive, for both beneficiary decision-making and program-monitoring purposes. The Commission will continue to explore available data sources to better understand beneficiary experiences with the MA program.

Commission recommendations to improve MA payment policies

The Commission is concerned that current Medicare policy to pay MA plans and incentivize high-quality care does not serve beneficiaries or taxpayers. The Commission has found that CMS’s coding-intensity adjustment is inadequate to address the higher level of MA diagnostic coding we estimate for 2025 and the resulting higher payments to MA plans and generates inequity across MA parent organizations. At the same time, the quality-bonus program boosts plan payments for 69 percent of MA enrollees but does not effectively promote high-quality care. Further, when we account for the effects of higher coding intensity and of favorable selection in MA, we estimate that MA

plan bids in 2025 are, on average, roughly equal to the costs of covering the Medicare benefit under FFS. For some enrollees, the supplemental benefits fill gaps in the Medicare benefit by adding coverage for services that are not included in traditional Medicare.⁷² The generosity of the additional benefits is appealing to beneficiaries, particularly for those who are unable to afford a Medigap policy that would reduce cost sharing in FFS Medicare. But MA payment policies distort the goal of plans competing to improve quality and reduce health care costs; instead, these policies increase program spending and Part B beneficiaries’ premiums. 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 so that beneficiaries can choose among Medicare coverage options. But the rapid growth of MA enrollment and spending elevates the urgent need for important reform of Medicare’s policies of paying and overseeing MA plans. As MA enrollment continues to grow, higher payments to plans will worsen Medicare’s fiscal sustainability.

Overall, we estimate in 2025 that Medicare is paying MA plans 20 percent, or \$84 billion, more than it would spend if those enrollees were covered under FFS Medicare, which increases financial burden on the taxpayers and beneficiaries who fund the MA program. Paying MA plans more than FFS spending for beneficiary care also creates inequities among beneficiaries since beneficiaries in FFS Medicare help finance the higher payments that MA plans use to provide supplemental benefits for their enrollees (benefits that FFS beneficiaries generally must pay for out of pocket or through supplemental insurance). We estimate that aggregate Part B premiums will be about \$13 billion (10 percent) higher in 2025 because of payments above FFS spending (equivalent to about \$198 per beneficiary per year).⁷³ Further, incentives for efficient delivery of care are undermined by paying MA plans more than the program pays for FFS beneficiaries. To encourage efficiency and promote value for taxpayers and beneficiaries, an overhaul of MA payment policy should include reducing the level of Medicare payments to MA plans. Past experience

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*

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 2021**

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 recommendations—using 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.

Note: MA (Medicare Advantage), FFS (fee-for-service).

* The June 2020 quality recommendation incorporates the Commission’s prior recommendations to eliminate the doubling of the quality increases in specified counties (recommended in March 2016) and to establish a geographic basis for MA quality reporting that reflects health care market areas (June 2005, March 2010, and March 2018).

** The June 2021 benchmark recommendation incorporates the Commission’s prior recommendations to eliminate the cap on benchmark amounts implemented by the Affordable Care Act of 2010 (recommended in March 2016), base benchmarks on FFS spending data only for beneficiaries with both Part A and Part B (recommended in March 2017), and establish a geographic basis for MA payments that reflects health care market areas (recommended in June 2005, March 2010, and March 2018).

Source: Medicare Payment Advisory Commission 2021a, Medicare Payment Advisory Commission 2020a, Medicare Payment Advisory Commission 2019, Medicare Payment Advisory Commission 2016c.

with reductions in MA payments under the ACA has demonstrated that plans can adjust their bidding behavior and lessen the effects 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 improve the MA program for both beneficiaries and taxpayers.

Table 11-8 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 2016c); (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

2019); (3) replace the QBP with a market area–based, plan–financed reward program (Medicare Payment Advisory Commission 2020a); and (4) establish more equitable MA benchmarks for the Medicare program (Medicare Payment Advisory Commission 2021a). 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.

If payments to MA plans were lowered, plans might reduce the supplemental benefits they offer. However, because plans use these benefits to attract enrollees, they might respond instead by modifying other aspects of their bids (Cabral et al. 2018, Chernew et al. 2023, Congressional Budget Office 2022, Song et al. 2013).

The inability of the MA–QBP to meaningfully characterize the quality of care that MA enrollees receive makes it difficult for beneficiaries to make informed choices and for policymakers to assess the value that private plans bring to the Medicare program. In the June 2020 report to the Congress, the Commission recommended replacing the QBP with a value–incentive program that addresses the flaws of the QBP. First, focusing on a small set of population–based outcome– and patient/enrollee–experience measures would facilitate comparisons across MA plans, enabling beneficiaries to choose based on factors that are most meaningful to their experience. A continuous scale

of performance, rather than one with “cliff” effects, would provide MA plans with the incentive to improve quality at every level. Performance evaluation at the local market level, rather than the contract level as is currently done, would similarly improve the information that beneficiaries can use for decision–making and the incentives for MA plans to improve quality in every geographic area.

The Commission also recommended that the value–incentive program address the variation in the demographics of MA enrollees across plans. By accounting for differences in enrollees’ social risk factors by stratifying plan enrollment into groups of beneficiaries with similar social risk profiles, plans with higher shares of these enrollees would not be disadvantaged in their ability to receive quality–based payments, while actual differences in the quality of care would not be masked. Finally, the Commission contends that MA quality–bonus payments should not be financed with additional program dollars, especially given that Medicare pays MA plans more than would have been spent on FFS for the same beneficiaries. Application of budget–neutral financing would ensure 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 2020a). ■

11-**A**
TECHNICAL APPENDIX

.....
Favorable selection
.....

The Commission’s methodology for estimating favorable selection in MA

The risk-adjustment model that CMS uses to adjust payments to Medicare Advantage (MA) plans predicts Medicare spending using beneficiary characteristics, including demographics and medical conditions. The model is estimated using data from beneficiaries enrolled in the fee-for-service (FFS) program. For any set of characteristics, some FFS beneficiaries with those characteristics will have actual spending that is more than predicted and others will have actual spending that is less than predicted by the risk-adjustment model.

“Favorable selection” refers to the tendency for Medicare’s risk-adjustment model to—on average—overpredict the spending that the MA-enrolled population would have had if they were enrolled in the FFS program, even if medical conditions were recorded with similar coding intensity. Favorable selection can occur due to unmeasured differences in health status but can also result from factors such as differences in beneficiaries’ propensities to seek, or receive, care for reasons that are unrelated to their health.

Chapter 11 presents estimates from two methods of estimating the effect of favorable selection in the MA population. The first is a comprehensive method that we apply to estimate a selection effect for the entire MA-enrolled population—except for those with end-stage renal disease (ESRD)—in each year from 2016 to 2022. We also use estimates from that method to project the effect of favorable selection for 2023 to 2025, years in which we do not yet have data available. The second is a simple method that estimates favorable selection for the portion of MA enrollees in each year who were enrolled in the FFS program in the previous year, referred to as “recent switchers.” We use that simple method, which is described in the main chapter, to estimate selection for the years before 2016 (going back to 2007). We also apply that method to more recent years of data in order to compare estimates for the two methods in similar years and conduct other analyses that examine how favorable selection varies by beneficiary characteristics and geography.

Comprehensive methodology for estimating favorable selection of the MA population

We use our comprehensive method to estimate an aggregate selection percentage for the entire population of non-ESRD MA enrollees in each year, beginning in 2016. That aggregate selection percentage represents the amount by which the predicted spending used for payment for the entire MA population (estimated using the FFS population in Medicare’s risk-adjustment model) underpredicted (or overpredicted) the actual spending that population would have had if those beneficiaries had been enrolled in the FFS program in that year. It is computed as a ratio of (1) the estimated spending that the FFS program would have incurred for the MA-enrolled population had they been enrolled in the FFS program (the numerator) and (2) the estimated FFS spending that the Medicare payment system predicted for that population (the denominator). We label that ratio the “selection percentage.” We cannot directly observe the selection percentage of beneficiaries during their enrollment in MA because we cannot observe what their spending would have been had they instead been enrolled in FFS in that year. We can directly estimate the selection percentage of MA enrollees who were previously enrolled in the FFS program in the year before they switched to MA. Thus, we use data from MA enrollees who were previously enrolled in the FFS program as our study population and model how their selection percentage changed between the year before they enrolled in MA and their most recent year of MA enrollment.

Our study population consists of beneficiaries who had at least two years of prior enrollment in the FFS program before switching to MA (“previous switchers”), approximately 38 percent of non-ESRD MA enrollees in 2021.⁷⁴ For those enrollees, we have complete data on their spending and risk scores while in FFS that we can use as the basis for estimating a selection effect. The remaining non-ESRD MA population either enrolled in MA upon their initial eligibility for Medicare (33 percent in 2021) or had less than two years of prior FFS enrollment (29 percent in 2021).⁷⁵ For those enrollees, we assign a selection percentage using data from switchers who joined MA in the same year and had the same mortality status in the following two years. MA enrollees with ESRD, who accounted for 1 percent of

the MA population in 2023, are assigned a selection effect equal to zero.⁷⁶

We estimate selection for the study population of MA enrollees who were previous switchers using two main components: the selection percentage before each beneficiary was enrolled in MA (“base-year selection”) and the estimated change in selection between the base year and the most recent year of MA enrollment. We describe below how we measure base-year selection and the change in selection for that population.

Study and comparison populations

We include beneficiaries in our study population if they (1) were enrolled in MA for at least one month of the year we are estimating selection for (referred to as the “target year,” which is 2022 for the most recent estimate); (2) had joined MA between 2008 and 2022; and (3) had been enrolled in FFS and had both Part A and Part B coverage for at least two full calendar years prior to enrolling in MA. Because hospice enrollees receive their Medicare Part A and Part B coverage only from FFS and not from MA plans, we remove MA enrollment months while the beneficiary is in hospice (unless they were participants in CMS’s value-based insurance design hospice demonstration).⁷⁷ We address the issue of decedents separately (discussed below).

Consistent with our comparisons of MA payments and coding relative to FFS spending, we include beneficiaries enrolled in conventional MA plans (available to all beneficiaries), special-needs plans, and employer plans because the Medicare program makes payments to plans for all of these populations, and they all can experience favorable selection. We require beneficiaries to have at least two full calendar years of FFS enrollment because the CMS hierarchical condition category (HCC) risk-adjustment model calculates risk scores using diagnoses from the prior year’s claims. Thus, we require data on MA beneficiaries with two years of prior FFS enrollment to calculate risk scores for their last year of FFS enrollment.⁷⁸ We divide the study population for each target year into 14 annual cohorts based on the year they previously enrolled in MA (2009 through 2022). The study population of MA enrollees is used to construct the numerator of the selection percentages we estimate.

For the comparison population used to construct the denominator for the selection percentages, we

include nearly all FFS beneficiaries who would have been part of CMS’s MA benchmark calculation and had the necessary data to construct risk scores. We also apply an additional exclusion to the FFS population used for benchmark calculations by requiring the comparison population to have had both Part A and Part B coverage for at least one full calendar year by the end of the base year (the study population’s last year of FFS enrollment). That exclusion is applied to enhance similarity to the MA-enrolled population and to align with the population used to construct the base spending component of the Commission’s comparison of MA to FFS spending. In addition, we exclude beneficiaries with any Part A-only, Part B-only, or MA months during the base year.

We exclude beneficiaries from both the study and comparison populations if they had ESRD, Part A-only coverage, Part B-only coverage, or if they had another source of health coverage for which Medicare acted as a secondary payer during the reference year. CMS excludes beneficiaries with ESRD from benchmark calculations, pays MA plans state-based FFS rates for ESRD beneficiaries and adjusts benchmarks and payments for those with Medicare as a secondary payer to remove the secondary-payer effect. In addition, we exclude beneficiaries who did not reside in the 50 states and the District of Columbia.

Base-year selection percentage

Each beneficiary has a selection percentage that represents by how much their predicted spending estimated using Medicare’s risk-adjustment model (“predicted spending”) in year t underpredicts or overpredicts the actual spending they would have had if they were enrolled in the FFS program in that year. That individual-year-level selection percentage is denoted as $S_{i,g,t}$, for individual i , residing in county g , in time t . Time t indexes the time since individuals in each cohort of MA switchers switched from FFS to MA, with $t = 0$ representing the year before the switch occurred and $t = 1$ representing the first year the cohort was enrolled in MA. We use year $t = T$ to denote the “target year” in which we are measuring selection of the MA population. For example, consider a group of MA enrollees in 2022 who previously switched from the FFS program to MA in 2019 (and stayed in MA through at least one month in 2022). For those enrollees, $t = 0$ is 2018, $t = 1$ is 2019, and $t = T$ is 2022.

We refer to a beneficiary's selection percentage in the year before switching to MA as the base-year selection percentage and denote the base year as $t = 0$. Because MA switchers were enrolled in FFS in year $t = 0$, we can use their actual FFS spending to estimate their selection percentage in that year.

We estimate their base-year selection percentage as the ratio of each individual's actual spending relative to an estimate of their predicted spending (which is specific to their county g):

(1)

$$S_{i,g,t=0} = \frac{y_{i,g,t=0}}{\bar{y}_{g,t=0} \times r_{i,g,t=0}}$$

Where $y_{i,g,t=0}$ is the individual's actual FFS spending in year $t = 0$, $\bar{y}_{g,t=0}$ is the average risk-standardized spending of FFS enrollees in the same county g (standardized to a 1.0 risk score), and $r_{i,g,t=0}$ is the individual's risk score in year $t = 0$.⁷⁹ That initial selection percentage represents by how much Medicare's risk-adjustment model underpredicted or overpredicted the actual spending that the MA switchers had during their last year in FFS.

Selection in the base year is measured with a very high degree of accuracy for the population of MA switchers with the requisite two prior years of enrollment in FFS. However, our primary objective is to measure the degree of selection for the population of MA enrollees during the target year in which they were enrolled in MA in time $t = T$.

An individual's selection percentage at time $t = T$ could differ from their selection in the base year for several reasons, which can be seen from considering the terms in the formula above. First, the spending an individual would have had in FFS (the numerator) could get closer to their predicted spending over time, holding constant the risk model and the composition of the FFS population used to calibrate risk scores and calculate average spending. That phenomenon is known as "mean reversion."⁸⁰ Second, an individual's predicted spending in the denominator could get closer to or further from the numerator, holding the numerator constant. That could occur if changes to the risk model between $t = 0$ and $t = T$ improve the accuracy of

predicted spending, or if changes in the composition of the FFS population used to calibrate the risk model and compute predicted spending change over time. The composition of the FFS population can change due to the net effect of inflows of people who newly enroll in FFS and outflows of beneficiaries who die or switch to MA. Our approach to estimating the change in selection accounts for all of those reasons.

Change in selection

We are interested in measuring the selection percentage in year $t = T$, when beneficiaries are enrolled in MA and we cannot directly estimate their selection percentage. To estimate their selection percentage in that year, we note that selection in later years can be expressed as the sum of an individual's base-year selection percentage (which we can directly estimate) and the change in their selection percentage:

(2)

$$S_{i,g,t=T} = \underbrace{S_{i,g,t=0}}_{\text{selection in base year}} + \underbrace{(S_{i,g,t=T} - S_{i,g,t=0})}_{\text{change in selection}}$$

We can estimate the change in selection for each MA enrollee as the average change in selection percentage calculated for a proxy group of similar enrollees who were enrolled in the FFS program between $t = 0$ and $t = T$. We define $P_{b,d}^{c,T}$ as the set of beneficiaries that serve as the proxy group for any given cohort, c , of MA enrollees in year T (defined by the year they first enrolled in MA) who have the same base year ($t = 0$), selection percentage b , and year of death d relative to the target year ($t = T$). The average change in selection for the proxy group is calculated as

(3)

$$\Delta S_T^p = \sum_{i \in P_{b,d}^{c,T}} (S_{i,g,t=T} - S_{i,g,t=0}) \times \alpha_i$$

Each individual's weight in the calculation is represented by α_i .⁸¹ The term $S_{i,g,t=0}$ is defined in equation (1), and $S_{i,g,t=T}$ is defined similarly as the ratio of each individual's actual spending in the target year relative to an estimate of their predicted spending in that same year:

(4)

$$S_{i,g,t=T} = \frac{y_{i,g,t=T}}{\bar{y}_{g,t=T} \times r_{i,g,t=T}}$$

Proxy groups are constructed by segmenting the population of beneficiaries who were enrolled in FFS from $t = -1$ through at least one month of $t = T$ into 50 mutually exclusive groups.^{82,83} Those FFS enrollees are assigned to groups according to two key characteristics. First, they are assigned to one of three mortality groups based on their mortality in year $t = T$, $t = T + 1$, and $t > T + 1$. Second, they are assigned to a group based on their base-year selection percentage at $t = 0$. Each MA enrollee is matched to the proxy group that has the same mortality status and level of base-year selection, and the enrollee is then attributed the average change in selection for their matched proxy group.

For example, consider the set of MA enrollees in 2022 who were last enrolled in FFS in 2017 (including all of 2016), died in 2023, and had a selection percentage of 92 percent in 2017. The proxy group for those enrollees consists of beneficiaries who were enrolled in FFS in 2017 (including all of 2016) through 2022, died in 2023, and had a selection percentage between 90 percent and 100 percent in 2017.⁸⁴ The average change in selection percentage for that proxy group between 2017 and 2022 is used as the estimate for the change in selection percentage for the MA enrollees who match to that proxy group.

Matching on base-year selection percentage is important for capturing the potential for mean reversion because people who begin the period with a large degree of favorable (or unfavorable) selection may be more likely to experience larger changes that bring them closer to the mean. Matching on mortality is important because people closer to death tend to have higher spending on average, both in absolute terms and relative to their predicted spending. The average change in selection for the proxy group also accounts for changes to the Medicare risk-adjustment model, changes in the composition of the FFS population, and secular trends in FFS spending over the period. For example, changes to Medicare's risk-adjustment model are reflected in the calculation through changes in risk scores for the proxy group.

Cohort-level estimates of MA switchers

We construct aggregate selection percentages at the mortality-cohort-group level by aggregating the estimates of individual-level selection effects, weighting by predicted spending and number of months enrolled in MA during year $t = T$.

(5)

$$S_{c,d,T} = \sum_{i \in C^{d,T}} (S_{i,g,t=0} + \Delta S_T^p) \times w_{i,T}$$

Because the risk scores of MA enrollees at year $t = T$ are influenced by the coding practices of their plans, in constructing the weights for this calculation we estimate what each individual's risk score would have been in year $t = T$ had they been enrolled in FFS.⁸⁵ To do this estimate, we take the beneficiary's FFS risk score from the base year before they switched to MA and trend it forward based on the change in risk score for members of their proxy group.

Assigning cohort-level estimates to remaining MA population

About 38 percent of the MA-enrolled population in each year are in our study population and have their selection percentage estimated using the method outlined above. The bulk of the remaining MA population either enrolled in MA upon their initial eligibility for Medicare (33 percent) or had less than two years of prior FFS enrollment (29 percent). For those enrollees, we assign a selection percentage as the estimated selection percentage of switchers who joined MA in the same year and had the same mortality status in the following two years. That is, selection percentages are assigned to MA enrollees outside the study population at the mortality-cohort-group level. (We also assign selection percentages to beneficiaries who enrolled in MA prior to 2008 using the estimated selection percentages for the 2008 cohort of our study population.) The decision to generalize estimates of selection from our study population to those other groups is supported by our own analysis and external studies.

Our analysis suggests that MA enrollees who switched from FFS but had less than two years of prior FFS

coverage had favorable-selection effects that were at least as large as the MA enrollees in our study population with at least two years of prior FFS coverage. In our March 2024 report to the Congress, we used risk scores constructed from concurrent diagnoses to examine the effect of favorable selection for beneficiaries who had only one full year of prior FFS enrollment (before switching to MA). We estimated favorable-selection effects that were consistently larger for these beneficiaries than for our study population of MA switchers (i.e., beneficiaries who had at least two years of FFS enrollment before joining MA) (Medicare Payment Advisory Commission 2024).

For beneficiaries who enroll in MA upon initial Medicare eligibility, the available evidence is also consistent with favorable selection. One study used mortality as a rough proxy for MA favorable selection and found substantially lower mortality rates among enrollees who elected MA during their first year of Medicare eligibility (Newhouse et al. 2019). Further, another group of researchers examined pre-Medicare spending for a sample of about 11,000 beneficiaries who enrolled in MA at age 65 between 2015 and 2019. When comparing the risk-adjusted pre-Medicare spending of these MA enrollees with the pre-Medicare spending of a sample of beneficiaries who elected FFS at age 65, these researchers found about 12 percent to 13 percent lower risk-adjusted spending in the MA sample relative to the sample of FFS beneficiaries (Teigland et al. 2023). That estimate of favorable selection exceeds our estimate of favorable selection for MA switchers throughout the 2015 to 2019 period, which we estimate to be 4 percent to 9 percent using the Commission's simple method, which is most comparable with that study's methods. Our analyses combined with the results of other research suggest that the effect of favorable selection for MA entrants who have less than two years of prior FFS coverage, or none at all, may be even larger than what we observed in our study population.

Final aggregate selection percentage of MA population

The final aggregate selection percentage of the entire MA enrolled population in year $t = T$ is a dollar-weighted average of the individual selection percentages. Each enrollee is weighted by the number of months they were enrolled in MA in year $t = T$ and their projected FFS risk score (using the change in risk

score of the proxy group during MA enrollment). This weighting reflects each individual's predicted spending in year $t = T$ as a share of the MA population's predicted spending in year $t = T$.

Our approach to estimating selection for the MA population in the target year using data from people who were enrolled in MA in that year implicitly accounts for the role of selective attrition out of the MA program. "Selective attrition" refers to the tendency for the beneficiaries who either die or disenroll from the MA program to FFS to have risk scores that underpredict their spending. Analyses by the Commission and other researchers have found evidence of selective attrition, suggesting that the size of favorable selection in the MA population could be higher than estimates using data from all people who initially enrolled in MA. By defining our study population as beneficiaries who are enrolled in MA during the target year, we exclude beneficiaries who disenrolled from MA in earlier years. Those beneficiaries are not relevant for estimating selection in the target year because they are no longer part of the MA population. This approach to accounting for selective attrition implicitly through the construction of the study population remains the same in the current version of the methodology and the methods used in the March 2024 report to the Congress.

Technical changes relative to the methods used for the March 2024 report to the Congress

The methodology outlined above reflects several technical updates to our methods from last year. The Commission's March 2024 report to the Congress used the same analytic framework of using cohorts of people who had previously switched from FFS to MA and were still enrolled in MA in the target year and using the FFS experience of cohorts with the same level of base-year favorable selection to estimate changes in favorable selection during MA enrollment (Medicare Payment Advisory Commission 2024). The analysis described in this chapter continues to use the analytic framework from our March 2024 report but makes several technical improvements to improve the accuracy of the estimated changes in favorable selection during MA enrollment and to improve the ways in which we incorporate decedents and near-decedents into our analysis. We made two sets of changes to address those aims.

First, we now use the broadest population of FFS enrollees possible to construct our proxy groups that are used to estimate changes in selection during MA enrollment (including changes due to mean reversion). Choosing a proxy-group population is challenging because it is unknown how the selection percentage of the actual MA population would have changed if they were enrolled in FFS. Our previous method used the portion of FFS enrollees that were future MA entrants as the proxy-group population, which was motivated by a desire to construct a proxy group that was as similar as possible to the MA-enrolled population. However, there was some concern that using future MA entrants could understate mean reversion if beneficiaries with less mean reversion were more likely to later switch to MA but exhibited a more typical mean reversion tendency once they were enrolled in MA. Although our previous approach may have understated mean reversion, a critique of our new, broader proxy group is that it might overstate mean reversion for the MA-enrolled population (and thus understate selection). As a result, we view our updated proxy group as a more conservative methodological choice. Our additional update to the proxy-group construction to include matching by mortality status (described below) mitigates this concern somewhat by making the FFS proxy populations more similar to the MA population with respect to their mortality.

Second, we made several changes to more thoroughly incorporate decedents and near-decedents into our analysis. Our previous method excluded decedents from the populations used to construct the numerator and the denominator of the selection percentages in many parts of the analysis, for tractability. However, we identified several concerns about the exclusion of decedents, some of which would tend to increase the selection effect and others that would tend to decrease it. Our goal with this set of methodological updates is to more accurately reflect selection and the change in selection for decedents and near-decedents in our estimates.

The first concern was that we were understating the mean reversion for decedents and near-decedents in the MA population (that is, overstating their favorable selection) because decedents were not included in the previous proxy groups used to estimate changes in selection. The second concern arose as we considered the first methodological update to use the broader FFS population for our proxy-group population. Because

there are more decedents and near-decedents in the FFS population than the MA population, we were concerned that the broader FFS population might overstate mean reversion for MA enrollees not close to death. (Our analysis shows that, on average, decedents and near-decedents are highly unfavorable and have large changes in their selection percentages.) Third, we were concerned that decedents were not included in the FFS denominator used to construct our base and change in selection percentages, whereas decedents are included in the population that CMS uses to construct MA benchmarks.

We address the first and second concern jointly by including decedents in the new proxy-group population and by matching the proxy-group populations to the MA-enrolled population by mortality status. We address the third concern by including decedents in the populations used to estimate predicted spending in the denominators for the base- and target-year selection percentages. That is, the populations used to estimate the terms $\bar{y}_{g,t=0}$ in equation (1) and $\bar{y}_{g,t=T}$ in equation (4) now includes people who died in $t = 0$ and $t = T$, respectively. Including decedents in the denominators is also a necessary change to make if we want to include decedents in the proxy-group population (which serves as the numerator for the change in selection estimate). Including decedents in both the numerator and the denominator of all relevant steps of the calculations is necessary for consistency and improves the accuracy of our estimates.

We now describe each of the technical updates more thoroughly:

- Changes to the comparison group (denominator) populations for all components of the estimate: We made two changes to the populations used to estimate predicted spending in the denominators of our selection percentages (that is, the populations used to estimate $\bar{y}_{g,t=0}$ in equation (1) and $\bar{y}_{g,t=T}$ in equation (4)). Previously, the populations used for those calculations included FFS enrollees who were both alive for the entire year and did not switch to MA in the following year. The denominator population now includes FFS enrollees who died during the year and enrollees who switched to MA in the following year. Both those changes are consistent with the populations that CMS uses to calculate benchmarks, and

making those changes allows us to better account for differences in mortality between MA and FFS.

- Changes to the proxy-group populations used for the change in selection component of the estimate: Proxy cohorts now consist of all beneficiaries who remained in FFS during the period of MA enrollment, including beneficiaries who died in the target year $t = T$. Previously, we included only the subset of FFS beneficiaries who switched into MA in the year following the target year in our proxy groups. This update to our method allows our estimate to better account for the change in selection percentage for MA enrollees who die within the target year.⁸⁶
- Matching the MA-enrolled population to proxy groups using mortality status: When modeling changes in selection during MA enrollment, we now match MA cohorts and their proxy cohorts by both mortality (using the number of years to death relative to the target year $t = T$) and the initial selection percentage in year $t = 0$. This modification allows our estimate to better account for larger changes in selection for decedents (MA enrollees who died in the target year, year $t = T$) and near-decedents (who died in year $t = T + 1$). Previously, we assumed that decedents and near-decedents had the same change in selection percentage as MA enrollees who were not near death. That earlier approach likely overestimated the level of favorable selection (that is, understated the selection percentage) for MA enrollees who were close to death because decedents and near-decedents disproportionately have high risk-standardized spending.
- Assigning selection percentages to the rest of the MA population using mortality status: We use estimates of favorable selection for MA enrollees in our study population to assign selection percentages to MA enrollees outside of our study population. Under the previous version of our method, we matched MA enrollees who were outside our study group to those in our study group based on their year of entering MA. For example, individuals who entered MA in 2018 but did not have the required number of years in FFS to be in our sample were assigned the average selection percentage of members of our

study cohort who entered MA in 2018. Under our updated method, we now also match MA enrollees outside our study population to those in our study population by mortality status (using the number of years to death relative to the target year $t = T$) when assigning them a selection percentage. In addition, we trend forward the initial average risk score of each mortality group in each study population cohort by the increase in risk score of their proxy cohort-mortality group. We apply this trended risk score to the broader MA cohort-mortality group. Thus, each MA enrollee receives a selection percentage and expected risk score based on their MA entry year and mortality status in year $t = T$ and $T + 1$. We previously implicitly assumed that the share of decedents and near-decedents was the same between the MA study population and the rest of MA enrollees outside the study population. However, MA enrollees outside our study population have a smaller share of decedents relative to our study population (who were previous switchers and tend to be older). Thus, this update to our method more accurately accounts for mortality differences between MA enrollees included and not included in our study populations.

We compared the estimates that we published in the March 2024 report to the Congress for the MA population in 2021 to our estimates for the 2021 population under the updated methodology. The updates to our method decreased our overall estimate of favorable selection by about 2 percentage points in 2021, from 12.8 percent to 10.9 percent (Table 11-A1).

During the base year $t = 0$, adding decedent spending in the denominator decreases the selection percentage (thereby increasing the base-year effect of favorable selection) for each MA-entry cohort (in year $t = 0$) by 8 percentage points to 13 percentage points. This result is consistent with the expectation of adding decedent spending to average spending for the entire FFS population with Part A and Part B coverage. We compare average risk-standardized spending with and without decedents. We find that including decedents increased average FFS risk-standardized spending by 10 percent in 2021. Between base year $t = 0$ and target year $t = T$, we find that adding decedent spending to the numerator similarly increases the selection percentage (thereby decreasing the effect of favorable selection) by the target year for each MA-entry cohort

**TABLE
11-A1**

Estimated favorable selection in 2021 is similar under the previous and updated methodologies

*(Consecutive years in MA)
MA entrant year*

MA entrant	(14) 2008	(13) 2009	(12) 2010	(11) 2011	(10) 2012	(9) 2013	(8) 2014	(7) 2015	(6) 2016	(5) 2017	(4) 2018	(3) 2019	(2) 2020	(1) 2021
March 2024 method (survivor-based restrictions and a narrow FFS proxy group of future MA entrants)														
Base spending relative to FFS	77%	74%	79%	74%	74%	80%	83%	81%	83%	87%	87%	90%	88%	91%
Change in selection percentage while in MA	10%	13%	9%	14%	14%	8%	6%	8%	6%	2%	3%	0%	2%	-2%
Selection percentage trended forward to 2021	87%	87%	88%	88%	88%	88%	89%	89%	89%	89%	89%	90%	89%	88%
Overall plan spending relative to 2021 average across 14 cohorts (enrollment weighted)														88.6%
Overall impact on MA payments relative to FFS spending (100% / 88.6% - 1)														12.8%
March 2025 method (incorporating decedents and a broad FFS proxy group)														
Base spending relative to FFS	64%	66%	67%	64%	65%	68%	72%	71%	73%	76%	76%	79%	79%	79%
Change in selection percentage while in MA	28%	22%	22%	24%	23%	21%	18%	18%	17%	15%	16%	13%	10%	9%
Selection percentage trended forward to 2021	92%	88%	89%	88%	88%	89%	90%	89%	90%	91%	92%	92%	89%	88%
Overall plan spending relative to 2021 average across 14 cohorts (enrollment, risk, and mortality weighted)														90.2%
Overall impact on MA payments relative to FFS spending (100% / 90.2% - 1)														10.9%

Note: MA (Medicare Advantage), FFS (fee-for-service). "MA entrants" are beneficiaries who switched from FFS to MA and who stayed in MA for at least one month of MA enrollment in 2021. "Spending" reflects the year prior to MA entry and is risk adjusted and trended forward using a FFS population that matched the same enrollment criteria, had the same initial level of favorable selection, and had the same mortality status in 2021. Lower MA-entrant spending relative to FFS spending reflects a greater effect of favorable selection. The analysis excludes MA enrollees without at least two full years of enrollment in FFS Part A and Part B prior to the year of MA entry as well as those who joined a non-MA private plan (e.g., cost plan), had end-stage renal disease, had Medicare as a secondary payer, resided in multiple counties during the year, or resided in Puerto Rico (due to the relatively small number of FFS beneficiaries in that territory). Estimates for 2008 are used for enrollees who entered MA prior to 2008. Components may not sum to totals due to rounding.

Source: MedPAC analysis of Medicare enrollment, Medicare claims spending, and risk-adjustment files, 2006-2022.

(in year $t = T$ where $T = 2021$) by 8 percentage points to 18 percentage points. Thus, on net, the updates to our method do not produce markedly different

results for most of the MA cohorts in 2021. Ten of the 14 cohorts that comprise the 2021 estimate of favorable selection have selection percentages that

changed by 1 percentage point or less; 2 of the 14 cohorts have selection percentages that changed by 2 percentage points; 1 of the 14 cohorts has a selection percentage that changed by 3 percentage points; 1 of the 14 cohorts has a selection percentage that changed by 5 percentage points. The 2008 MA-entry cohort experienced the largest increase in selection percentage (5 percentage points). This finding likely results from our applying the selection percentage for 2008 to all MA enrollees who enrolled in MA before 2008, and these enrollees have a larger share of decedents, which we now account for in our analysis. Conversely, the 2021 MA-entry cohort does not experience any change in its estimated selection percentage—even though we now account for the relatively smaller share of decedents among this group.

While it is difficult to separately identify the effect of each of our technical changes on our estimate of favorable selection, we estimate the impact of all our mortality-related changes separately from the impact of constructing proxy groups using a broad population of FFS enrollees (instead of the earlier approach of using a narrower population of FFS enrollees who later enrolled in MA) for our estimate of mean reversion. We compare our prior estimate of favorable selection for 2021 (the most recent estimate reported in the March 2024 report) with our current estimate for 2021.

- First, we estimate the impact from all our mortality-related changes by applying all our technical updates with the exception of using the general FFS population as our proxy-group population for the change in favorable selection during MA enrollment (i.e., mean reversion). Instead, we largely maintain the definition of our previous proxy groups by using the population of FFS beneficiaries who entered MA in the year after target year $t = T + 1$. (Because there are no decedents among the population of FFS beneficiaries who switch to MA in $T + 1$, we used the general population of FFS beneficiaries who died in year T when constructing proxy groups for decedents.) We find that applying our mortality-related changes, while largely holding constant the proxy-group population used in the previous version of the method, results in an overall selection percentage of 86.2 percent in 2021, 3 percentage points lower than our previous estimate (meaning greater favorable selection).

- Second, we estimate the impact of using the general FFS population as our proxy-group population (i.e., the group that we use to estimate mean reversion during MA enrollment). Applying all of our mortality adjustments, we compare our favorable selection estimates when using a general FFS proxy group relative to using a narrower proxy group of FFS beneficiaries who switched to MA in $T + 1$. We find that using a general FFS proxy group results in an overall selection percentage of 90.2 percent in 2021, 4 percentage points higher than the 86.2 percent selection percentage estimated when applying the mortality-related changes alone.

Taken together, our technical updates increased the overall selection percentage by 2 percentage points in 2021 (thereby decreasing the overall estimate of favorable selection by 2 percentage points). The updates have a larger effect on our overall estimates of favorable selection from 2016 to 2020, the other years for which both sets of estimates are available (data not shown). Whereas we had previously estimated that the effect of favorable selection on MA payments increased from 5 percent in 2016 to 13 percent in 2021, we now estimate that the effect of favorable selection was more stable during that period, increasing more slowly from 8 percent in 2016 to 11 percent in 2021. We will continue working to understand the drivers of favorable selection during this period.

Sources of uncertainty in the Commission's estimate of favorable selection

There are four main sources of uncertainty in the Commission's estimate of favorable selection. Below, we discuss those sources. We have tried to make reasonable modeling assumptions where there is uncertainty; however, our estimate of favorable selection could be higher or lower if actual trends differ from those assumptions.

- We have a high degree of confidence in our estimate of favorable selection for beneficiaries in our study population before they enter MA (“base-year selection”). However, there is uncertainty in our estimate of the change in selection while our study population was enrolled in MA because that change cannot be observed directly with available data and must be estimated using a different population of beneficiaries who are enrolled in FFS. We make the best use we can of available data to

estimate the change in selection by matching our study population to FFS “proxy groups” using their base selection before entering MA and mortality status during the year of MA enrollment. Our analysis suggests that this portion of the estimate is conservative because using narrower proxy groups of FFS beneficiaries who later enrolled in MA produces larger selection effects. However, the actual change in selection could be higher or lower than we estimate.

- There is also uncertainty regarding the selection effect for MA enrollees outside our study population. Due to a lack of data, we assign a selection percentage to those beneficiaries using data from MA beneficiaries in our study population. Our analysis, described earlier in the appendix, indicates that assigning selection percentages that we estimate by using our study population to the remaining MA population is appropriate and may be conservative.
- Another source of uncertainty stems from data limitations that require us to exclude beneficiaries who lack a full prior year of FFS enrollment from the FFS comparison population used for the denominators. That method excludes some beneficiaries from the denominator whom studies

have demonstrated to have unfavorable (that is, higher) risk-standardized spending—beneficiaries who have recently disenrolled from MA to FFS (Fuglesten Biniek et al. 2024)—which suggests that our estimated selection effects would be larger if those beneficiaries were included. It also excludes FFS beneficiaries who recently became eligible for Medicare. Their risk-standardized spending may be higher or lower than the population of FFS beneficiaries with complete data who are in our comparison group, so omitting those beneficiaries may cause our estimate of favorable selection to be either higher or lower.

- Finally, there is uncertainty in our assignment of a zero selection effect to MA enrollees with ESRD. We assign this effect because plans are paid for those enrollees using a different payment system, so estimating their selection would require a separate method. Payments to MA plans for ESRD enrollees account for about 6 percent of total payments to MA plans in 2025. Therefore, the exclusion of ESRD enrollees is not expected to have a large effect on our overall estimate. We will consider conducting a separate analysis of the degree of selection among the ESRD population in the future. ■

11-**B**

TECHNICAL APPENDIX

Coding intensity

The Commission’s method for estimating MA coding intensity

The Commission’s method for estimating coding intensity is based on the demographic estimate of coding intensity (DECI) method, originally developed by Kronick and Chua (2021). The DECI method implicitly assumes that Medicare Advantage (MA) enrollees are no less healthy than fee-for-service (FFS) Medicare beneficiaries with similar demographic characteristics. Therefore, the DECI method attributes higher demographic-adjusted MA risk scores relative to FFS to higher MA coding intensity rather than worse health acuity or complexity among MA enrollees than FFS beneficiaries. Figure 11-B1 (p. 390) shows how the DECI method estimates coding intensity.

National average CMS hierarchical condition category risk scores

We identify monthly MA or FFS enrollment using the plan identifier in the Medicare common enrollment file, and we require all MA and FFS beneficiaries to have both Part A and Part B using the “Medicare enrollment code” data field. Then we use monthly indicators in risk-score data to exclude beneficiary months in which an end-stage renal disease (ESRD) risk score would be applied and to assign “new-enrollee” and institutional risk scores as appropriate. For all remaining months, we assign the appropriate community-model risk score using the monthly Medicare–Medicaid dual status code from the enrollment file to adjust for full, partial, or no Medicaid benefits, and we use the beneficiary’s age from risk-score data to determine aged or disabled status. In each year, we use the version of the risk model or blend of versions that was used for payment to MA plans. Finally, we aggregate the monthly risk scores to calculate national average MA and FFS CMS hierarchical condition category (HCC) scores for the four groups identified below.

When developing this method, we benchmarked our estimate of the national average risk score for all FFS beneficiaries in 2019 (including those with Part A only) of 1.0682 against the national average published by CMS of 1.0685. Our estimate of the average risk score for all FFS beneficiaries was similarly close to CMS’s published results for 2017 and 2018.

National average demographic risk scores

We calibrate an annual risk model based only on demographic characteristics for FFS beneficiaries with both Part A and Part B (excluding beneficiaries with ESRD) by including age category (CMS–HCC model categories), sex, Medicaid eligibility (full benefits, partial benefits, or no benefits), and institutional status. We use the same enrollment and risk-score indicator variables as in the CMS–HCC risk-score analysis described above.

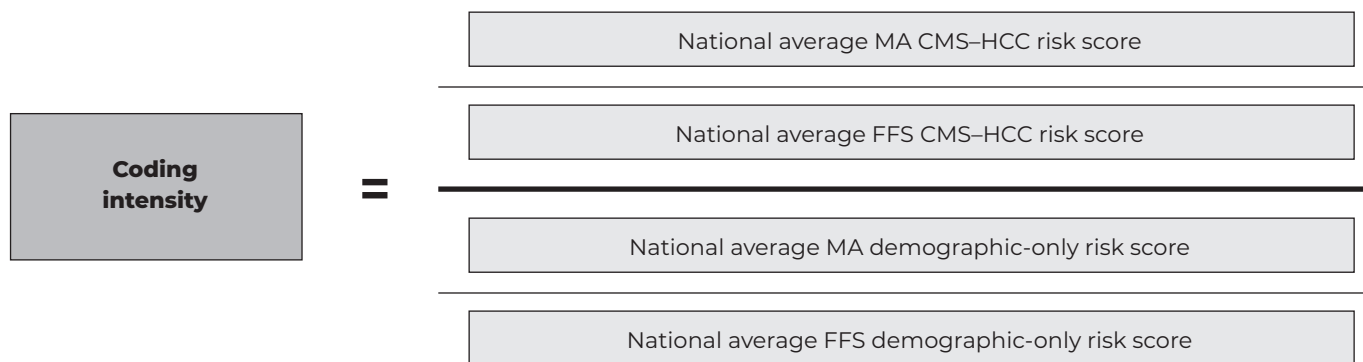
We calculate monthly Medicare spending by summing the annual spending amounts in the Medicare beneficiary summary file (excluding beneficiaries with any hospice use) and dividing by the months of Part A and Part B enrollment in the year. We calculate separate risk models (with dollar-value age and sex coefficients) for beneficiaries with institutional status, full Medicaid benefits, partial Medicaid benefits, and no Medicaid benefits, and then divide each model’s coefficients by the average spending for that group to convert the dollar coefficients to risk scores. The average risk score in each model is 1.0. Finally, we apply those demographic risk scores to MA and FFS beneficiaries with both Part A and Part B and aggregate them to national averages for each of the four groups identified below.

Calculation of coding intensity that accounts for Medicaid eligibility and institutional status

For MA and FFS, we calculate average CMS–HCC and demographic risk scores separately for continuing (not new-enrollee) beneficiaries with institutional status, full Medicaid benefits, partial Medicaid benefits, and no Medicaid benefits. We then calculate average CMS–HCC and demographic risk scores for continuing enrollees using the share of MA enrollees in each of the four groups as weights for both the MA and FFS averages. Then we calculate a DECI estimate for continuing enrollees using the formula in Figure 11-B1 (p. 390). Finally, we calculate a DECI estimate for all enrollees, adding together the continuing-enrollee DECI estimate multiplied by the risk-score-weighted share of continuing MA enrollees and the new-enrollee DECI estimate multiplied by the risk-score-weighted share of new enrollees in the analysis. This final step constrains risk scores for new enrollees to

**FIGURE
11-B1**

DECI method estimates coding intensity as the ratio of two ratios



Note: DECI (demographic estimate of coding intensity), MA (Medicare Advantage), CMS-HCC (CMS hierarchical condition category), FFS (fee-for-service).

Source: Kronick and Chua 2021.

have no coding intensity because their risk scores are not based on diagnostic coding. We use a risk-score-weighted new and continuing enrollment share to combine new and continuing enrollee DECI estimates because those weights reflect the share of MA payment associated with each group. Table 11-B1 shows an example of DECI calculation for 2023 which accounts for Medicaid-eligibility and institution-status differences in MA and FFS.

Impact of phasing in the V28 risk-adjustment model

The new risk-adjustment model introduced in 2024 (V28) is expected to reduce MA risk scores, coding intensity, and payments to MA plans. The V28 risk model makes several changes. First, the new model excludes some HCCs with much higher rates of coding in MA relative to FFS Medicare. Second, the new model constrains the coefficients of some HCCs with the same group of related conditions where there are differential rates of MA and FFS coding among the HCCs in the group. Third, the new model implements an entirely new mapping of International Classification of Diseases (ICD)-10 diagnosis codes to HCCs, which

had the effect of removing several diagnoses from the HCCs included in the payment model. The prior mapping was developed from a mapping of ICD-9 diagnoses to HCCs and a diagnosis-code mapping from ICD-9 to ICD-10. (CMS switched from requiring the submission of ICD-9 to ICD-10 diagnosis codes in 2015.)

There are three factors to consider when estimating the impact of a new risk model: the direct impact on MA risk scores, the impact on the normalization factor used to scale risk scores for the model, and changes in MA-plan coding practices.

1. Relative to the prior risk model (V24), the V28 model removes many diagnoses that CMS identified as having high rates of coding in MA relative to FFS. The removal of diagnoses with high rates of MA coding—holding coding practices constant—means that fewer HCCs are identified for MA enrollees, which reduces MA risk scores.
2. A normalization factor is designed to keep the average FFS risk score at 1.0 and is specific to each risk model. Generally, the normalization factor for a given risk model starts at 1.0 in the model calibration year and increases in each subsequent year based on the projected cumulative increase

**TABLE
11-B1**

Calculation of MedPAC’s coding-intensity estimate, 2023

Beneficiary group	CMS-HCC risk-score average		Demographic risk-score average		MA share of continuing enrollees
	MA	FFS	MA	FFS	
Continuing enrollees					
No Medicaid	1.063	0.928	0.998	1.006	75.8%
Partial Medicaid	1.373	1.050	1.008	1.003	8.4
Full Medicaid	1.638	1.305	1.044	1.005	14.8
Institutional	2.411	2.136	2.181	2.177	1.0
MA weighted average risk scores	1.187	1.006	1.017	1.017	
Beneficiary group	CMS-HCC MA/FFS risk-score ratio		Demographic MA/FFS risk-score ratio		
Continuing enrollees	1.187 / 1.006 = 1.180		1.017 / 1.017 = 1.000		
Beneficiary group	DECI estimate	MA share of enrollees	MA average HCC risk score	Group weight	
Continuing enrollees	1.180 / 1.000 = 1.181 (18.1%)	91.6%	1.187	95.5%	
New enrollees	1.000 (0.0%)	8.4	0.605	4.5	
All enrollees	1.173 (17.3%)				

Note: CMS-HCC (CMS-hierarchical condition category), MA (Medicare Advantage), FFS (fee-for-service), DECI (demographic estimate of coding intensity). Analysis excludes beneficiaries with end-stage renal disease and beneficiaries residing in Puerto Rico. Risk scores reflect the V24 risk model that was used for payment in 2023. The DECI estimate is the ratio of the MA/FFS CMS-HCC risk score ratio and the MA/FFS demographic risk score ratio. New enrollees are constrained to have no coding intensity because their risk scores are not based on diagnostic coding. For 2023, we use the most recently available (2022) master beneficiary summary file for the FFS spending used to calculate the demographic risk-score models.

Source: MedPAC analysis of 2023 Medicare enrollment and risk score files and 2022 Medicare enrollment and Master Beneficiary Summary Files.

in average FFS risk scores since calibration. MA risk scores are divided by the normalization factor, so larger factors reduce risk scores by more than smaller factors. Because the V28 model is calibrated using more recent data, the cumulative increase in FFS risk scores since model calibration is smaller, and the V28 normalization factor is smaller than the V24 model. Transitioning from the larger V24 factor to the smaller V28 factor increases MA risk scores.

- Current estimates of the effect of transitioning from V24 to V28 are based on MA risk scores using data from years in which the V24 risk model was

used for payment and the V28 risk model had not yet been announced. Many MA organizations and providers contracting with MA plans identify the diagnostic codes that affect payment and adapt their diagnostic-coding processes to maximize risk scores for a specific risk model (these strategies are sometimes called “diagnostic-code capture” or “HCC-gap closure”). Therefore, current estimates of the impact of the V28 model compare optimized V24 risk scores with nonoptimized V28 risk scores. If MA plans adapt their coding practices in response to the incentives created by the new model, initial comparisons of V24 and V28 risk

scores would overestimate the impact of V28 on MA risk scores and payment to MA plans.

In 2024, payments to MA plans were based on a blend of two-thirds V24 and one-third V28 risk scores. In 2025, payments will be based on a blend of one-third V24 and two-thirds V28 risk scores, and for 2026, CMS has proposed that payments will be based entirely on V28 risk scores. The normalization factor applied to risk scores mirrors the blend of V24 and V28 models used for risk scores.

Comparing V24 and V28 risk scores

In the Advance Notice for 2025, CMS reported that between 2024 and 2025 (reflecting one-third of the V28 phase-in) the V28 model will reduce (non-normalized) MA risk scores by an estimated 4.44 percent due to the removal of diagnosis codes and the constraint on certain HCC coefficients. This reduction will be offset by a 1.99 percent increase in MA risk scores due to a smaller normalization factor, for an estimated net reduction of 2.45 percent. Assuming that this annual effect is the same across the three-year phase-in period implies an estimated net effect on MA risk scores of about 7.5 percent due to the V28 model's exclusion of diagnosis codes and constraint on coefficients, and to the normalization factor.⁸⁷

We conducted our own analysis of the impact of V28 using MA encounter data and FFS claims to identify diagnoses that are eligible for risk adjustment and to calculate V24 and V28 risk scores for 2021, 2022, and 2023.⁸⁸ We first estimated the effect of V28 on MA risk scores if plan coding practices did not respond to the incentives created by the new model. Across all three years, we found that average MA V28 risk scores were about 13.7 percent lower than average MA V24 risk scores, and average FFS V28 risk scores were about 7.3 percent lower than average FFS V24 risk scores (for FFS beneficiaries with both Part A and Part B). (The effect of the V28 model on FFS risk scores is a proxy for the effect on the normalization factor.) By combining those two effects, we estimated a net reduction of MA risk scores of about 6.5 percent if plan coding practices did not respond to the incentives under the new model.

Estimating the impact of V28 on MA coding intensity

To more directly assess the impact of the V28 risk model on differential MA and FFS coding intensity, we

applied MedPAC's DECI method to the V24 and V28 risk scores that we calculated for 2021, 2022, and 2023. Across all three years, we found that the average MA coding-intensity estimate was 7.7 percentage points lower for V28 risk scores than for V24 risk scores. That difference of 7.7 percentage points represents the effect of the V28 risk model on overall MA coding intensity if coding practices were held constant, but it does not reflect MA plans' efforts to optimize coding practices for the V28 model in 2024 and 2025. This coding-intensity estimate incorporates the net effect of the first two factors we consider when estimating the effect of the V28 model: the removal of diagnosis codes and the constraint on certain HCC coefficients in the V28 model, as well as the offsetting effect of the smaller V28 normalization factor. We note that all three ways of estimating the net effect of the first two factors—CMS's analysis of risk-score differences, our analysis of risk-score differences, and our estimates of coding-intensity difference for the two risk models—produce similar results, giving us some confidence in the estimate of the effect of the V28 model from the first two factors.

To estimate the effect of changes in plans' coding behavior (the third factor described above), we began by analyzing how coding changed in the years after CMS transitioned from the V12 risk model to the V22 model in 2014. (We recognize that there are differences between this risk-model transition and the transition from V24 to V28, but this transition is the most recent experience to estimate plans' coding behavior). Similar to the V28 model, the V22 risk model excluded some diagnoses that have much higher rates of coding in MA relative to FFS. Unfortunately, we lack the necessary data to estimate the effect on plans' coding behavior in the first year that the model was introduced. Instead, we estimate how much faster V22 coding intensity grew relative to V12 coding intensity between the first and second years that the V22 model was in effect. To do so, we applied MedPAC's DECI method to the V12 and V22 risk scores for 2014 and 2015 (the only two years of data available during the transition from V12 to V22) to estimate the relative growth in coding intensity between the two models. Coding intensity was lower under the V22 model, but it grew faster between 2014 and 2015 relative to growth under the V12 model, indicating that plans were able to offset some of the reductions in risk scores under the new model by adjusting their coding practices to account for different

incentives under the newer model. We incorporate the faster coding-intensity growth rate from the first and second years of the V22 model into our assessment of coding-intensity growth in the first couple years under the V28 model.

The growth in coding intensity under V28 might be even larger than the growth we estimated during the first two years of the transition from V12 to V22. First, the V22/V12 difference in coding-intensity growth in the first year in which the model was introduced could be larger than the growth in coding intensity we estimated between the first and second years of V22 implementation. Second, compared with 2015 and 2016, when V22 was implemented, we have observed an increased focus on risk adjustment and the potential financial gains from greater diagnostic-coding intensity. There has been a dramatic increase in the number of companies currently selling training programs, diagnostic-coding manuals, and other risk-score-optimization strategies for the transition from V24 to V28.⁸⁹

Incorporating estimates of the V28's impact into MA coding-intensity projections

For 2024 and 2025, we projected under the V24 and V28 models separately and then applied the blend of risk scores that will be used for payment in each year. We started with the 2023 coding-intensity estimates of

17 percent under the V24 model and of about 10 percent under the V28 model (17 percent minus 7.7 percentage points due to lower coding intensity under V28), which reflects no plan response because the V28 model had not yet been used for plan payments.

To calculate the coding-intensity growth rate under V28, we started with the V24 coding-intensity growth rate of 1.6 percentage points annually, which is the average V24 coding-intensity trend from 2019 to 2023. We then applied the V22/V12 coding-intensity growth-rate ratio, adjusting the ratio to account for the greater share of diagnosis codes excluded from the V28 model relative to the V22 model. Based on this analysis, we estimate that coding intensity will grow about 2.4 percentage points annually under the V28 risk model.

We then projected coding intensity under V24 by adding 1.6 percentage points each year and projected coding intensity under V28 by adding 2.4 percentage points each year. After applying the payment-year risk-score blends, we estimate coding intensity to be about 17 percent in 2024, reflecting a blend of two-thirds V24 coding intensity (about 19 percent) and one-third V28 coding intensity (about 12 percent). For 2025, we estimate MA coding intensity to be about 16 percent, reflecting a blend of one-third V24 coding intensity (about 20 percent) and two-thirds V28 coding intensity (about 14 percent). ■

Endnotes

- 1 CMS includes FFS-claim administrative costs in MA benchmarks, which account for about 0.20 percent of FFS spending (Centers for Medicare & Medicaid Services 2023a, Centers for Medicare & Medicaid Services 2021). 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' reports, 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 Two plan types enrolling very small numbers of MA enrollees are not described here. Private FFS plans that operate without a network are limited to counties where fewer than two network-based plans are offered (about 3 percent of counties for 2025); by the end of 2024, private FFS plans covered fewer than 32,000 beneficiaries. Medical Savings Account plans combine a high deductible and a Medical Savings Account, and by the end of 2024 they covered about 1,100 beneficiaries.
- 3 HMOs generally do not pay for care provided by out-of-network (OON) providers. They often require that enrollees select a named primary care provider (PCP), who manages referrals to specialists. PPOs provide more flexibility for enrollees by not requiring a named PCP and by allowing enrollees to see both in- and out-of-network specialists without a referral. However, these plans generally have both higher premiums than HMOs and higher cost sharing for OON providers compared with in-network providers. HMO point-of-service is a subset of the HMO plan type that allows members to seek out-of-network care for certain types of services or in certain cases (such as travel). These plans offer less flexibility to seek care OON than PPOs but more than standard HMOs.
- 4 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 Chapter 12 of the Commission's March 2021 report to the Congress (Medicare Payment Advisory Commission 2021b).
- 5 If a plan bids above the benchmark, the plan's base rate is set at the benchmark and enrollees must pay a premium (in addition to the usual Part B premium) equal to the difference between the bid and the benchmark.
- 6 Examples of non-Medicare-covered supplemental benefits include dental, vision, and hearing coverage. Plans can offer such benefits on a mandatory or optional basis. Mandatory supplemental benefits are automatically included in the benefit package for all enrollees in a plan. Plans may use rebates to finance mandatory supplemental benefits and may charge enrollees a premium to cover costs not covered by the rebate. Additionally, plans may offer optional supplemental benefits. Plans are not permitted to apply rebate dollars toward optional supplemental benefits; enrollees pay an additional premium to access these benefits. Optional supplemental benefits cannot include reduced cost sharing for Medicare Part A and Part B services.
- 7 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.
- 8 An MA plan's benchmark may be as high as 125 percent of CMS's local-area projected FFS spending. 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 double-bonus 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 2016c).
- 9 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.
- 10 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. First, CMS has found that adding diagnoses from these sources does not improve the model's ability to

predict medical expenditures. Second, concerns exist about the reliability of diagnoses from providers with less clinical training (e.g., home health and durable medical equipment providers). Third, a high proportion of reported diagnoses from certain settings (e.g., lab and imaging tests) are used to rule out having a diagnosis (Pope et al. 2004).

- 11 To date, RADV audits have been initiated for plan years 2018 and earlier and have been completed for only a few years. Information about payment recoveries based on RADV audits has only been made public for 2007. Given the limited nature of RADV audits, we do not yet know whether the more widespread use of audits would affect plans' coding practices.
- 12 MA enrollees who could potentially have lower cost-sharing liability in FFS would likely have difficulty obtaining a Medigap policy if they switched to FFS, limiting their potential savings. Beneficiaries are only guaranteed access to a Medigap supplemental insurance policy with no underwriting, even if they have a preexisting condition, if they purchase it during the six-month Medigap open enrollment period that begins on the first day a beneficiary is both 65 years old and enrolled in Medicare Part B. Most beneficiaries have only one Medigap open enrollment period during their lifetime. Except in limited circumstances (e.g., a beneficiary moves outside of their MA plan's service area), access to a Medigap policy is not guaranteed in most states after the Medigap open enrollment period ends. Only four states (Connecticut, Massachusetts, Maine, and New York) require guaranteed-issue access to Medigap for aged (65 and over) beneficiaries in FFS Medicare, regardless of medical history, meaning that insurers cannot deny a Medigap policy to applicants based on preexisting conditions (Boccuti et al. 2018). In certain circumstances, beneficiaries who choose to enter MA and who subsequently disenroll to FFS within a 11-month trial period may also have guaranteed access to Medigap coverage with no underwriting (42 U.S.C. Sec. 1395ss).
- 13 In 2023, 15 percent of MA enrollees and 20 percent of FFS enrollees resided in rural areas.
- 14 Our measurement of beneficiary access to plans uses 2025 plan bids and July 2024 county-level enrollment for the Medicare population with both Part A and Part B coverage. Plans are included in a county only if they project enrolling at least one beneficiary in that county.
- 15 All beneficiaries enrolling in Medicare Part B, regardless of their decision to receive benefits through FFS or MA, are required to pay the Medicare Part B premium. Some MA plans use rebate dollars to pay a portion of their members' Part B premium as a supplemental benefit. Beneficiaries enrolling in Part D may pay a separate Part D premium, although MA Prescription Drug plans may use rebate dollars to reduce the amount the beneficiary pays for drug coverage under the plan. Plans bidding above the local benchmark or offering more supplemental benefits than can be financed by the plan rebate charge enrollees an additional plan premium. We refer to plans that do not charge a separate plan premium (including any Part D premium) as "zero-premium" plans. The increasing availability of zero-premium plans in recent years has largely been driven by the availability of zero-premium local PPO plans. Between 2019 and 2023, the availability of zero-premium local PPO plans increased from 69 percent of Medicare beneficiaries to 96 percent, and the availability of zero-premium HMOs increased from 86 percent to 98 percent.
- 16 We exclude employer group plans because they do not submit bids and so do not receive a rebate in the same manner as bidding plans. Instead, starting in 2019, CMS began paying employer group plans based on the bidding behavior of nonemployer plans in the prior year: The employer group plans receive a base payment rate that is based on the average bid-to-benchmark ratio of nonemployer plans (by quartile of FFS spending and plan type), plus a share of the difference between the base payment rate and a county-specific benchmark.
- 17 In 2025, conventional plans project that 11 percent of the rebate dollars used to reduce cost sharing will be allocated for plan administrative costs and profit. Among dual-eligible SNPs, 14 percent of the plan-projected rebate dollars used to reduce cost sharing is projected to be allocated for plan administrative costs and profit.
- 18 The plan liability for the MOOP cap is generally not comparable with FFS spending because most beneficiaries in FFS Medicare have supplemental insurance and are unlikely to have cost-sharing expenses that exceed the OOP cap for MA enrollees. In addition, MA enrollees are prohibited from purchasing Medigap coverage because MA plans are expected to provide supplemental benefits in lieu of Medigap coverage.
- 19 While MA plans have enrolled a growing number of beneficiaries with end-stage renal disease, MA plans' projected MOOP liability remained at 1 percent of projected payments annually from 2023 to 2025. The MOOP liability reported in plan bids is less than half of the 2.8 percent MOOP value estimated by Wakely in a report commissioned by AHIP, which used FFS claims data to estimate the MOOP value (Wakely 2024). The Wakely estimate did not account for the lower MOOP liability accrued by MA plans because of out-of-network care, claims denials, plan switching during the year, and cost-sharing reductions that are financed through plan rebates. In addition, the Wakely estimate did not consider cost-sharing reductions for FFS beneficiaries with supplemental coverage that would have reduced the

- MOOP liability in FFS. Further, Wakely did not adjust for Medicare Part A and Part B services that were financed by FFS on behalf of MA enrollees (e.g., Medicare services during hospice election). Wakely counted these services toward their MOOP estimate even though these types of services were not financed by MA plans.
- 20 Beneficiaries eligible for special enrollment periods include (but are not limited to) those who move outside of their plan's service area, move to a new county with additional plan options, live in or move out of a nursing home or rehabilitation hospital, are eligible for Medicaid coverage, or lose Medicaid coverage.
 - 21 In 2025, conventional MA plans (that is, excluding employer plans and SNPs) project that 12 percent of the \$53 used for non-Medicare-covered supplemental benefits will be allocated for plan administrative costs and profit. Among D-SNPs, 14 percent of the \$234 used for non-Medicare-covered supplemental benefits is projected to be allocated for plan administrative costs and profit.
 - 22 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 amount of projected spending for new types of supplemental benefits is not available in plan bid data.
 - 23 MA plans do not allocate administrative expenses or margins for Part D premium buydowns or Part D supplemental benefits when submitting Part C bids.
 - 24 In 2025, changes to the structure of the Part D direct-subsidy amount may have resulted in plans overestimating the amount of Part C rebates needed for their target Part D premium. Part D premium targets are initially calculated before plans know how much rebate funding they need to cover their target Part D premium (which is only known after Part D plans submit bids and CMS calculates the national average bid amount). After plans know how much they will need in rebates to cover their target Part D premium, plans reallocate their rebate to ensure that plan enrollees receive the full value of the rebate. However, CMS restricts changes in projected Part C margins that result from rebate allocations to an average of \$1 per member per month (<https://www.cms.gov/files/document/cy2025-rebate-reallocation-training-handout.pdf>). If an MA plan overestimated the amount of Part C rebates needed for their Part D premium, they would likely need to reallocate rebate funding from the Part D premium buydown to the Part B premium buydown, the only rebate-funded benefit for which plans do not receive a margin.
 - 25 Federal regulations require MA plans to submit encounter records for all items and services provided to enrollees (42 CFR Sec. 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 was not equipped to accept dental claims prior to 2024. 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. Beginning in 2024, CMS required MA organizations to submit plan-level information (not through beneficiary-level encounter records) for a wide range of supplemental-benefit categories, including data on the number of enrollees who are eligible for each benefit, the number of enrollees who used each benefit, total and median instances of use among eligible enrollees, the net spending amount incurred by the plan to offer each benefit, the type of payment arrangement, how the plan accounts for the cost of the benefit (including administrative expenses), and the total out-of-pocket cost per utilization for enrollees (Centers for Medicare & Medicaid Services 2024b).
 - 26 The Commission is examining MA rebates and supplemental benefits in greater depth in other reports and presentations during this analytic cycle; the results of that analysis will be presented separately.
 - 27 We estimate total MA payments by using CMS's projected enrollment and incurred payments per enrollee (Boards of Trustees 2024).
 - 28 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, our analysis does not include secondary effects that can be measured 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.

- 29 We note that our 2025 estimate of spending on MA relative to the amount Medicare would have spent for comparable FFS beneficiaries (120 percent) reflects some changes from the method used in the Commission's 2024 comparison (reported to be 122 percent in our March 2024 report) (Medicare Payment Advisory Commission 2024). First, in 2024 we conservatively projected that the effects of favorable selection would be similar to prepandemic levels (about 9 percentage points). For 2025, we used estimates of favorable selection from 2021 and 2022 to project the effect of favorable selection in 2023 to 2025. We also made technical updates to refine our methodology for estimating favorable selection; those updates increased our estimates of favorable selection from 2017 to 2020 and decreased our estimate of favorable selection for 2021. We now project that favorable selection accounts for 11 percentage points of the difference in spending. Second, we revised our method of estimating coding intensity to exclude beneficiaries in Puerto Rico because they lack complete data and to weight new enrollees by the share of payments associated with new and continuing enrollees. Also, we revised our estimated effect of phasing in the V28 model when we projected the effects of coding intensity from the most recent analytic year (2023) to subsequent payment years. For 2024 and 2025, we projected coding intensity based on the annual trend from 2019 through 2023, an increase of 1.6 percentage points per year. Then we reduced the annual trend by our estimate of the effect of the V28 phase-in, which is -2.3 percentage points in 2024 and -1.8 percentage points in 2025. See Technical Appendix 11-B, "Impact of phasing in the V28 risk-adjustment model" (p. 390), for more details. The net effect of all of those factors accounts for the -2 percentage point difference in our 2025 and 2024 estimates of MA spending relative to comparable FFS beneficiaries.
- 30 Our projected \$84 billion in MA payments above FFS spending in 2025 does not include spending for beneficiaries with ESRD. MA plans receive separate base payments for these beneficiaries, and MA payments are risk adjusted using a separate risk model. In future years, we will consider how to compare MA payments and FFS spending for ESRD beneficiaries, including the effects of favorable selection and coding intensity.
- 31 We also exclude beneficiaries for whom Medicare is a secondary payer and beneficiaries with ESRD in our comparisons using historical data.
- 32 Our estimates of the base-spending comparison for the years prior to 2016 continue to rely on CMS's projections of FFS spending (including adjustments that eliminate the effect of the sustainable growth rate) because those were the data we used under an older version of our methodology when those estimates were first published in earlier reports. We have not updated those estimates because our analysis indicates that results would be similar under our updated methodology that uses historical data. A more detailed description of the change in methodology for the base payment comparison can be found in the Commission's March 2023 report to the Congress, where it is described as a change from the prospective method to the retrospective method (Medicare Payment Advisory Commission 2023b).
- 33 The Commission's March 2023 report details our methodology for comparing our estimates using CMS's projections with historical spending for MA-eligible beneficiaries (Medicare Payment Advisory Commission 2023b). That report describes several adjustments that should be made when making this comparison. A 2024 analysis by Wakely that was commissioned by AHIP estimated the raw average spending difference between all Medicare beneficiaries and the subset of Medicare beneficiaries with both Part A and Part B coverage (Wakely 2024). This method is inadequate for comparisons of MA payment differences because CMS's payment methodology accounts for (among other things) Medicare as a secondary payer, the geographic differences in risk-standardized FFS spending, the geographic distribution of MA enrollees, and nonclaims FFS spending. The Commission's comparisons adjust for these differences, including the use of county-level FFS-spending data and risk scores, MA enrollment, MA risk scores, and MA payment rates.
- 34 We also report estimates from a simpler, more suggestive method that focuses on the selection percentage of MA entrants who recently switched from FFS compared with beneficiaries who remained in FFS. The advantages of that simpler method are that it can more easily be compared with estimates from the literature that use similar methods, and we can compute it for more years of data (going back to 2007). We use that simpler method for the selection estimates from 2007 to 2015 in Figures 11-3 and 11-4 and use our current, more comprehensive method for the estimates reported starting in 2016.
- 35 Our estimates account for the incentives that beneficiaries have to switch from FFS to MA because of the MOOP limit. However, MOOP limits do not appear to be an important factor in MA plan selection. For example, one study found that more generous OOP maximums did not result in enrollment gains in 2022 (Cates et al. 2022). Instead, the study found that lower premiums and a higher prevalence of supplemental benefits were associated with plans that experienced enrollment growth. This finding is consistent with prior research that found premiums were a driving factor in beneficiary plan selection (Jacobson et al. 2016, Jacobson et al. 2014, Medicare Payment Advisory Commission 2015, Meyers et al. 2019, Skopec et al. 2019).

- 36 Using the study from Teigland and colleagues, we identified the pre-Medicare spending and risk scores of the MA and FFS populations. We standardized the pre-period spending by the risk scores and converted the risk-standardized spending differences to payments above FFS spending.
- 37 Categories of risk scores were based on the distribution of MA entrants such that we determined a sufficient number of enrollees were in each risk-score category.
- 38 The Commission recognizes that social risk factors are associated with differences in health status and health care use and that switching between MA and FFS may lead to changes in a beneficiary's use of health services and in their Medicaid eligibility. Limited evidence suggests that MA plans do not provide greater access to services overall relative to FFS (Agarwal et al. 2022, Commonwealth Fund 2021, Fuglesten Biniek et al. 2021). In addition, MA plans have a financial incentive to ensure that beneficiaries who are eligible but not enrolled in Medicaid receive those benefits while in MA. These additional Medicaid benefits would potentially reduce the cost-sharing liability for both beneficiaries and MA plans. Further, enrolling beneficiaries in Medicaid who were Medicaid eligible but previously unenrolled also increases beneficiary risk scores because their predicted costs in MA would be under a Medicaid segment in CMS's risk model (rather than a non-Medicaid segment). To the extent that such beneficiaries would have remain unenrolled in Medicaid if still in FFS Medicare, this phenomenon would increase favorable selection in MA. Given our reliance on a beneficiary's FFS experience when estimating favorable selection, we cannot account for these additional changes in a beneficiary's social risk while enrolled in MA.
- 39 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 ESRD. A plan's base rate varies according to the plan's bid and the local area's benchmark.
- 40 International Classification of Diseases, 10th Revision, Clinical Modification guidelines for 2022.
- 41 In the V28 CMS-HCC risk model, introduced in 2024, these three HCCs have been constrained to have the same coefficient due to within-hierarchy coding intensity compared with FFS Medicare.
- 42 CMS has modified 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 had a coding-intensity estimate that was about 2.5 percentage points less than under the previous model because the new model removed some diagnoses that were found to be coded more frequently in MA. In 2017, CMS began accounting for Medicaid-benefit eligibility more accurately (full-, partial-, or no-benefits status by month), which reduced the gap in MA and FFS risk scores by about 1 percentage point, eliminating the amount by which MA risk scores were unduly higher than FFS due to differing shares of beneficiaries by Medicaid eligibility status. In 2024, CMS began phasing in a new risk model that, similar to the model introduced in 2014, is expected to reduce the gap in coding intensity relative to FFS by removing or constraining the coefficient of some diagnoses that were found to be coded more aggressively in MA.
- 43 The monthly Medicaid-status indicator that we use to identify eligibility for full, partial, or no Medicaid benefits incorrectly lists the vast majority of beneficiaries in Puerto Rico as not being eligible for Medicaid benefits.
- 44 In some counties, the full 5 percent or 10 percent quality-bonus increase to a plan's benchmark is limited by the ACA benchmark caps.
- 45 This organization-level analysis, like our national estimate of coding differences, uses the same method of estimating coding intensity as described in Chapter 13 of MedPAC's March 2024 report to the Congress, except that the MA risk scores are calculated separately for each MA organization.
- 46 Based on MedPAC's interviews with physicians and reporting from *Stat News* (Bannow et al. 2024).
- 47 Recent reporting shows that agents and brokers are often paid by plans to conduct health risk assessments of new enrollees, but such assessments are not allowable for risk adjustment because agents and brokers are not clinicians.
- 48 The general steps we followed were to identify physician and hospital encounter records allowable for risk adjustment; identify each record as a health risk assessment (using procedure codes for annual wellness visit or initial preventive physical exam, or an evaluation and management visit provided in the home), chart review (using a chart-review indicator), or other service; map diagnoses from those records to HCCs; apply HCC hierarchies; compare the HCCs we identified from encounter records with the HCCs in CMS's risk-score file and exclude HCCs not identified in both sources; apply HCC coefficients for the appropriate risk model; and apply Part A and Part B payment rates specific to each plan. We then identified the number of HCCs and associated dollar amounts that were supported through a health risk assessment, chart review, or both.

- 49 The six HCCs that each generated more than \$900 million in payments from health risk assessments and the percentage of the time that a health risk assessment was the only source of the HCC were vascular disease, 45 percent; major depressive, bipolar, and paranoid disorders, 44 percent; disorders of immunity, 64 percent; diabetes with chronic complications, 15 percent; chronic obstructive pulmonary disorder, 26 percent; morbid obesity, 37 percent. We note that diabetes with chronic complications has a constrained coefficient in the V28 risk model, meaning that differences in the level of severity (e.g., diabetes without complications, with chronic complications, or with acute complications) for these conditions are not reflected in the V28 risk-adjustment model coefficients.
- 50 The legal complaints cited in this section support this statement. 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 Inc.* 2020).
- 51 The eight HCCs that each generated more than \$1 billion in payments from chart reviews and the percentage of the time that a chart review was the only source of the HCC were vascular disease, 32 percent; chronic obstructive pulmonary disorder, 26 percent; diabetes with chronic complications, 17 percent; major depressive, bipolar, and paranoid disorders, 32 percent; congestive heart failure, 23 percent; disorders of immunity, 40 percent; morbid obesity, 33 percent; and rheumatoid arthritis and inflammatory connective tissue disease, 31 percent. We note that diabetes with chronic complications and congestive heart failure are among the HCCs that have a constrained coefficient in the V28 risk model, meaning that differences in the level of severity (e.g., diabetes without complications, with chronic complications, or with acute complications) for these conditions are not reflected in the V28 risk-adjustment model coefficients.
- 52 About \$5.2 billion in payments to MA plans was from HCCs identified on a health risk assessment and a chart review but not during any record of a physician or hospital encounter during the same calendar year.
- 53 For RADV 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.
- 54 Audit-eligible enrollees were also required to have 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.
- 55 Other factors may also influence insurers' decisions to enter new markets. Examples include state and federal regulatory and financial requirements (including licensure requirements), the size of the market, the local MA penetration rate, the number of competitors, benchmark payment rates for the market relative to the health care needs of the population, availability and quality of providers, and the estimated likelihood of achieving a sustainable risk profile after accounting for CMS's coding-intensity adjustment (Buzby et al. 2022, Killian and Swenson 2016).
- 56 Counties in Connecticut are excluded due to changes over time in how the state's counties are tabulated. Employer plans are excluded because employer plans do not compete directly with nonemployer plans.
- 57 The study assessed only whether the parent organization listed for a particular MA contract changed; it did not assess whether the company acquired one or all of the acquired insurer's MA contracts or acquired the other insurer altogether.
- 58 The top three organizations nationally also had the highest share of enrollees in both urban and rural areas in 2024. In urban areas, the top three organizations covered 58 percent of MA enrollees (up from 57 percent in 2023). In rural areas, the top three organizations accounted for 67 percent of the MA enrollees (up from 66 percent in 2023).
- 59 In 2024, 18 percent of MA enrollees were eligible for Medicaid and enrolled in dual-eligible SNPs (D-SNPs). The national D-SNP enrollment is more concentrated than overall MA enrollment (the three largest D-SNPs had 61 percent of enrollment). Enrollment in D-SNPs has been getting more concentrated nationally: The three largest organizations nationally had 60 percent of total enrollment in D-SNPs in 2024, an increase from 57 percent in 2023.
- 60 The HHI 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 and Federal Trade Commission guidelines, markets with an index above 1,800 are considered highly concentrated (Department of Justice and Federal Trade Commission 2023).
- 61 A "related party" is defined as any entity that "has a different tax identification number than that of the MAO but is associated with the MAO by any form of common, privately held ownership, control, or investment, including any

- arrangement in which the MAO does business with a related party through one or more unrelated parties” (Centers for Medicare & Medicaid Services 2023b).
- 62 Some parent organizations that are neither provider owned nor among the top five largest nationally report high rates of payments to related parties (shown under the “All other organizations” category in Figure 11-17, p. 369). Most of these organizations are recent entrants to the MA market with venture capital financing. We did not find evidence that these companies were owners of health care provider organizations, and the high rates being reported may reflect the structure of the business venture rather than the degree of vertical integration with providers.
 - 63 Star rating is a framework that CMS uses across MA and FFS. On its Care Compare website, CMS publishes star ratings on different types of Medicare providers (like physicians, hospitals, nursing homes, and others) so that beneficiaries can see how providers perform for FFS beneficiaries in their local area. However, there is no single quality evaluation for FFS Medicare in its entirety; star ratings of providers in FFS reflect their individual performance. The performance of a set of providers in a local area is not directly comparable with an MA star rating, which reflects the joint performance of an MAO and its network of contracted providers, at the contract level.
 - 64 This count includes measures for Medicare Advantage Prescription Drug plan (MA-PD) contracts. MA-only contracts and PDPs are measured on different subsets of measures.
 - 65 Measures are assigned unique weights, and the overall score is a weighted average. The other roughly 60 measures that Medicare collects are display measures that CMS publicly reports on the Medicare.gov website (not the Medicare Plan Finder website). Some display measures were previously incorporated into the star ratings but have been transitioned out. Others may be new measures that are being tested before inclusion in the star ratings or that are otherwise reported for informational purposes only.
 - 66 Currently, quality results for MA are reported on a contract-wide basis, and those results are used to determine the star rating for all plans under the contract’s offerings.
 - 67 The 2025 star-rating values have been updated with data from CMS’s December 2, 2024, release of the 2025 Star Ratings Data Tables.
 - 68 We also include FFS-CAHPS results in Chapter 4 (on physician and other health professionals).
 - 69 Using the beneficiary survey responses, CMS calculates national case-mix-adjusted FFS-CAHPS and MA-CAHPS scores. Scores are adjusted for education, self-reported general health status, self-reported mental health status, proxy completion or assistance with survey completion, dual eligibility or low-income-subsidy eligibility, age, and completion of the survey in an Asian language, all of which have been demonstrated to be associated with patient-experience scores (<https://www.ma-pdpcahps.org/globalassets/ma-pdp/quality-assurance/2025/ma-pdp-cahps-qapts-v15.0.pdf#page=86>). The FFS- and MA-CAHPS survey items and case-mix adjustment are largely the same, which can allow comparison between FFS and MA measure scores.
 - 70 Because MA contracts do not represent uniform geographic units, sampling at the contract level generates an average that is not necessarily geographically representative of the MA population nor geographically comparable with the FFS sample.
 - 71 The Commission discussed this literature at the March 2024 public meeting, <https://www.medpac.gov/wp-content/uploads/2023/10/MA-quality-presentation-FINAL.pdf>.
 - 72 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).
 - 73 Part B spending represents about 60 percent of all FFS Medicare spending (which is assumed to be the same share of spending on Part B services by MA plans). Twenty-five percent of Part B spending is financed through premiums paid by all Medicare Part B enrollees. The estimate does not account for the reduction in Part B premiums that is offered by some MA plans as a supplemental benefit.
 - 74 The share of non-ESRD MA enrollees with at least two years of prior enrollment in FFS is based on enrollment months in 2021.
 - 75 We exclude beneficiaries with Medicare as a secondary payer. CMS’s payment rates to MA plans are adjusted with the goal of removing the effects of having Medicare as a secondary payer.
 - 76 CMS sets MA payment rates using a non-ESRD population. MA plans are separately paid a state-based ESRD rate for MA enrollees.
 - 77 MA enrollees who use hospice continue receiving supplemental benefits through their MA plan, but MA plans are immediately no longer paid the base payment for Part A and Part B services for that enrollee. Thus, we remove MA months while a beneficiary uses hospice, but we count the share of the month prior to hospice enrollment as MA

- enrollment. Medicare spending while an MA enrollee is in hospice is excluded from our analysis entirely and is not included in our FFS denominator.
- 78 In 2022, about half of MA entrants (51 percent of enrollment months) met these criteria; for the remaining entrants, 8 percent had between one and two years of prior FFS enrollment, 12 percent had less than one year of prior FFS enrollment, and 30 percent had no prior FFS enrollment (meaning they enrolled directly in MA when they first became eligible for Medicare).
- 79 The population of FFS enrollees in each county used in the denominator includes all beneficiaries with at least one month of FFS enrollment in time $t = 0$ who were enrolled in FFS for the entire prior year ($t = -1$). It includes people who switched to MA in the following year. That construction is designed to closely align with the population that CMS uses to construct predicted spending while also ensuring that risk scores were constructed using CMS's HCC model. We also require the population of FFS enrollees in the denominator to be enrolled in both Part A and Part B to enhance similarity with the MA population. Average spending in the county is weighted by enrollment months and standardized to a 1.0 risk score (calculated as $\bar{y}_{g,t=0} = \frac{\sum_i y_{i,g,t=0}}{\sum_i r_{i,g,t=0}}$).
- 80 Mean reversion can occur in two directions. When an individual's spending is initially below their predicted spending, mean reversion can occur if their growth in spending exceeds their growth in risk score. Conversely, when an individual's spending is initially above their predicted spending, mean reversion can occur if their growth in spending is lower than their growth in risk score.
- 81 The weights represent each individual's share of the total predicted spending in the proxy group. Thus, the individual weight is defined as $\alpha_i = \frac{\bar{y}_{g,t=0} \times r_{i,g,t=0}}{\sum_i \bar{y}_{g,t=0} \times r_{i,g,t=0}}$.
- 82 Each cohort of MA enrollees and their proxy cohort of FFS beneficiaries were placed into 50 mutually exclusive groups and matched on those groups (an increase from 45 groups in our March 2024 report to the Congress). Beneficiaries were first placed into one of three mortality groups based on the year of death: year $t = T$, $t = T + 1$, and $t > T + 1$. Decedents (death in $t = T$) and near-decedents (death in $t = T + 1$) were assigned to 1 of 10 categories within their respective mortality group based on initial selection percentage in year $t = 0$. Nondecedents (death in $t > T + 1$) were assigned to 1 of 30 categories based on initial selection percentage in year $t = 0$. Categories of initial selection percentage were developed based on the distribution of spending and enrollment, with the goal of having meaningful differences between the categories while sustaining a reliable sample of enrollees within each category.
- 83 Although there is an insufficient number of observations to match MA enrollees to proxy groups by county of residence, we required beneficiaries in the proxy group to reside in counties with at least one MA enrollee in MA cohort c.
- 84 Beneficiaries in the proxy group are also required to be enrolled in FFS in the year prior to the base year (2016 in this example) in order to have a populated HCC risk score for 2017.
- 85 The weights are constructed to reflect each individual's predicted spending in year $t = T$ as a share of the mortality-cohort group's predicted spending in year $t = T$: $w_{i,T} = \frac{\bar{y}_{g,t=T} \times r_{i,t=T} \times m_{i,T}}{\sum_{i \in C^d,T} \bar{y}_{g,t=T} \times r_{i,t=T} \times m_{i,T}}$, where $m_{i,T}$ indicates months of enrollment.
- 86 The denominators for the comparison groups exclude beneficiaries who used hospice in the prior year but include beneficiaries who had hospice during the year of spending.
- 87 CMS's published normalization-factor data also show that the V28 normalization factor will increase MA risk scores by about 2 percent per year, or about 6 percent in total. The normalization factor applied to MA risk scores in 2023 was 1.127 (V24 only) and was reduced to 1.103 in 2024 (reflecting a two-thirds V24 factor of 1.146 and a one-third V28 factor of 1.015); it will be further reduced to 1.081 in 2025 (reflecting a one-third V24 factor of 1.153 and a two-thirds V28 factor of 1.045).
- 88 We used CMS's V24 and V28 risk-model software published for 2024 (<https://www.cms.gov/medicare/health-plans/medicareadvtspecratestats/risk-adjustors/2024-model-software/icd-10-mappings>).
- 89 Some examples of companies offering services to optimize coding for V28 include Advantmed, AGS Health, Alix Partners, Apixio, Athena Health, CareJourney (by Arcadia), Centauri Health Solutions, Change Healthcare, CodingIntel, Cotiviti (Verscend Technologies Inc.), Credo Health, Creyos, Datavant (formerly Ciox), DoctusTech, Edifecs, Episource, ForeSee Medical, Health Endeavors, Health Information Associates, Healthmine, IKS Health, IMO Health, Inovalon, IQVIA, Lightbeam Health Solutions, Matrix Medical Network, McKinsey & Company, Navina AI, Optum, Pareto Intelligence, Peoples Health (a UnitedHealthcare company), Persivia, PwC, R1 RCM, RAAPID Inc., Reveleer, Signify Health (CVS Health), UST HealthProof (Advantasure), Vatica Health, Vee Healthtek, Veradigm, and Wolters Kluwer.

References

- 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.
- Agarwal, R., S. Gondi, and R. K. Wadhera. 2022. Comparison of Medicare Advantage vs. traditional Medicare for health care access, affordability, and use of preventive services among adults with low income. *JAMA Network Open* 5, no. 6 (June 1): e2215227.
- Bannow, T., B. Herman, C. Ross, et al. 2024. Inside UnitedHealth's strategy to pressure physicians: \$10,000 bonuses and a doctor leaderboard. *Stat News*, October 16. <https://www.statnews.com/2024/10/16/united-health-optum-care-medicare-advantage-strategy-dashboard-emails-documents/>.
- Blue Health Intelligence. 2020. Predictive analytics to optimize coding accuracy. <https://bluehealthintelligence.com/health-plans/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. 2024. *The 2024 annual report of the Boards of Trustees of the Federal Hospital Insurance and Federal Supplementary Medical Insurance Trust Funds*. Washington, DC: Boards of Trustees. <https://www.cms.gov/oact/tr/2024>.
- Boccuti, C., J. G., K. Orgera, et al. 2018. *Medigap enrollment and consumer protections vary across states*. Washington, DC: KFF. <https://www.kff.org/medicare/issue-brief/medigap-enrollment-and-consumer-protections-vary-across-states/>.
- Brown, J., M. Duggan, I. Kuziemko, et al. 2014. How does risk selection respond to risk adjustment? New evidence from the Medicare Advantage program. *American Economic Review* 104, no. 10 (October): 3335–3364.
- Brown, R. S., J. W. Bergeron, D. G. Clement, et al. 1993. *The Medicare risk program for HMOs: Final summary report on findings from the evaluation*. Princeton, NJ: Mathematica Policy Research Inc.
- Buzby, E., H. Mirchandani, and J. Hirsch. 2022. *Strategy considerations for effectively entering the Medicare Advantage market*. Seattle, WA: Milliman. <https://www.milliman.com/en/insight/strategy-considerations-for-effectively-entering-the-medicare-advantage-market>.
- Cabral, M., M. Geruso, and N. Mahoney. 2018. Do larger health insurance subsidies benefit patients or producers? Evidence from Medicare Advantage. *American Economic Review* 108, no. 8: 2048–2087.
- Cates, J., C. Bentley, J. M. Friedman, et al. 2022. *Analysis of 2022 AEP enrollment results for Medicare Advantage plans*. Seattle, WA: Milliman. <https://us.milliman.com/en/insight/analysis-of-2022-aep-enrollment-results-for-medicare-advantage-plans>.
- Centers for Medicare & Medicaid Services, Department of Health and Human Services. 2024a. Fact sheet: 2025 Medicare Advantage and Part D star ratings. <https://www.cms.gov/files/document/fact-sheet-2025-medicare-advantage-and-part-d-star-ratings.pdf>.
- Centers for Medicare & Medicaid Services, Department of Health and Human Services. 2024b. Medicare Part C reporting requirements. Effective January 1, 2024. <https://www.cms.gov/files/document/cy2024-part-c-reporting-requirements-01092024.pdf>.
- Centers for Medicare & Medicaid Services, Department of Health and Human Services. 2024c. Payment year 2018 Medicare Advantage contract-specific risk adjustment data validation (RADV): Audit methods and instructions. <https://www.cms.gov/files/document/payment-year-2018-ma-radv-audit-methods-instructions.pdf>.
- Centers for Medicare & Medicaid Services, Department of Health and Human Services. 2023a. Announcement of calendar year (CY) 2024 Medicare Advantage (MA) capitation rates and Part C and Part D payment policies. <https://www.cms.gov/files/document/2024-announcement-pdf.pdf>.
- Centers for Medicare & Medicaid Services, Department of Health and Human Services. 2023b. CY 2023 Bid Pricing Tools (BPT) and instructions. <https://www.cms.gov/medicarehealth-plansmedicare-readvtgspcraetatsbid-forms-instructions/2023>.
- Centers for Medicare & Medicaid Services, Department of Health and Human Services. 2021. Announcement of calendar year (CY) 2022 Medicare Advantage capitation rates and Medicare Advantage and Part D payment policies.
- 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>.

- Chartis Group. 2024. *Mounting headwinds in Medicare Advantage market haven't stopped growth: 2024 Medicare Advantage competitive enrollment report*. Chicago, IL: The Chartis Group. <https://www.chartis.com/insights/mounting-headwinds-medicare-advantage-market-havent-stopped-growth>.
- Chernew, M., K. Miller, A. Petrin, et al. 2023. Reducing Medicare Advantage benchmarks will decrease plan generosity, but those effects will likely be modest. *Health Affairs* 42, no. 4 (April): 479–487.
- Commonwealth Fund. 2021. Medicare Advantage vs. traditional Medicare: How do beneficiaries' characteristics and experiences differ? Issue brief. October 14. <https://www.commonwealthfund.org/publications/issue-briefs/2021/oct/medicare-advantage-vs-traditional-medicare-beneficiaries-differ>.
- Congressional Budget Office. 2022. *Options for reducing the deficit, 2023 to 2032—Volume I: Larger reductions*. Washington, DC: CBO. <https://www.cbo.gov/publication/58164>.
- Congressional Budget Office. 2017. *Effects of Medicare Advantage enrollment on beneficiary risk scores*. Working paper 2017–08. Washington, DC: CBO.
- Curto, V., L. Einav, A. Finkelstein, et al. 2019. Health care spending and utilization in public and private Medicare. *American Economic Journal: Applied Economics* 11, no. 2 (April): 302–332.
- Curto, V., L. Einav, J. Levin, et al. 2021. Can health insurance competition work? Evidence from Medicare Advantage. *Journal of Political Economy* 129, no. 2: 570–606.
- CVS Health. 2023. CVS Health completes acquisition of Oak Street Health. <https://www.cvshealth.com/news/company-news/cvs-health-completes-acquisition-of-oak-street-health.html>.
- 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 Federal Trade Commission. 2023. *Merger guidelines*. Washington, DC: DOJ/FTC. https://www.ftc.gov/system/files/ftc_gov/pdf/P234000-NEW-MERGER-GUIDELINES.pdf.
- Frakt, A. B., S. D. Pizer, and R. Feldman. 2012. The effects of market structure and payment rate on the entry of private health plans into the Medicare market. *Inquiry* 49, no. 1 (Spring): 15–36.
- Frank, R. G., and C. Milhaupt. 2023. *Related businesses and preservation of Medicare's medical loss ratio rules*. Los Angeles, CA: USC Schaeffer/Brookings. <https://www.brookings.edu/articles/related-businesses-and-preservation-of-medicare-medical-loss-ratio-rules/>.
- 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. <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/>.
- Freed, M., J. Fuglesten Biniek, A. Damico, et al. 2024. *Medicare Advantage in 2024: Premiums, out-of-pocket limits, supplemental benefits, and prior authorization*. Washington, DC: KFF. <https://www.kff.org/medicare/issue-brief/medicare-advantage-in-2024-premiums-out-of-pocket-limits-supplemental-benefits-and-prior-authorization/>.
- Fuglesten Biniek, J., A. Cottrill, N. Sroczynski, et al. 2024. *Medicare spending was 27% more for people who disenrolled from Medicare Advantage than for similar people in traditional Medicare*. Washington, DC: KFF. <https://www.kff.org/medicare/issue-brief/medicare-spending-was-27-percent-more-for-people-who-disenrolled-from-medicare-advantage-than-for-similar-people-in-traditional-medicare/>.
- Fuglesten Biniek, J., N. Ochieng, J. Cubanski, et al. 2021. *Cost-related problems are less common among beneficiaries in traditional Medicare than in Medicare Advantage, mainly due to supplemental coverage*. Issue brief. Washington, DC: KFF.
- Geruso, M., and T. Layton. 2020. Upcoding: Evidence from Medicare on squishy risk adjustment. *Journal of Political Economy* 128, no. 3 (March): 984–1026.
- 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.
- Ghoshal-Datta, N., M. E. Chernew, and J. M. McWilliams. 2024. Lack of persistent coding in traditional Medicare may widen the risk-score gap with Medicare Advantage. *Health Affairs* 43, no. 12 (December): 1638–1646.
- Goldberg, E. M., A. N. Trivedi, V. Mor, et al. 2017. Favorable risk selection in Medicare Advantage: Trends in mortality and plan exits among nursing home beneficiaries. *Medical Care Research and Review* 74, no. 6 (December): 736–749.
- Government Accountability Office. 2023. *Medicare Advantage: Plans generally offered some supplemental benefits, but CMS has limited data on utilization*. GAO-23-105527. Washington, DC: GAO.

- Government Accountability Office. 2021. *Medicare Advantage: Beneficiary disenrollments to fee-for-service in last year of life increase Medicare spending*. Washington, DC: GAO. <https://www.gao.gov/products/gao-21-482>.
- Government Accountability Office. 2013. *Medicare Advantage: Substantial excess payments underscore need for CMS to improve accuracy of risk score adjustments*. 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 market-wide changes. *Inquiry* 55 (January–December): 46958018788640.
- Hnath, J. G. P., J. M. McWilliams, and M. E. Chernew. 2024. Medicare Advantage: National carriers expand market share while regional carriers without affiliation decline, 2012–23. *Health Affairs* 43, no. 12 (December): 1647–1654.
- Humana. 2022. Humana’s CenterWell Senior Primary Care and Welsh, Carson, Anderson & Stowe announce second joint venture to develop and operate value-based primary care clinics for Medicare patients. Press release. May 16. <https://press.humana.com/news/news-details/2022/Humanas-CenterWell-Senior-Primary-Care-and-Welsh-Carson-Anderson--Stowe-Announce-Second-Joint-Venture-to-Develop-and-Operate-Value-Based-Primary-Care-Clinics-for-Medicare-Patients/default.aspx#gsc.tab=0>.
- Humana. 2021. Humana completes acquisitions of Kindred at Home. <https://press.humana.com/news/news-details/2021/Humana-Completes-Acquisition-of-Kindred-at-Home/default.aspx#gsc.tab=0>.
- Humana. 2020. Humana’s Partners in Primary Care and Welsh, Carson, Anderson & Stowe form joint venture to expand the nation’s system of value-based primary care centers focused on serving Medicare patients. Press release. February 3. <https://press.humana.com/news/news-details/2020/joint-venture-expand-value-based-primary-care/default.aspx#gsc.tab=0>.
- Ippolito, B., E. Trish, and B. Vabson. 2024. Expected out-of-pocket costs: Comparing Medicare Advantage with fee-for-service Medicare. *Health Affairs* 43, no. 11 (November): 1502–1507.
- Jacobs, P. D. 2024. In-home health risk assessments and chart reviews contribute to coding intensity in Medicare Advantage. *Health Affairs* 43, no. 7 (July): 942–949.
- 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. 2016. *Medicare Advantage plan switching: Exception or norm?* Washington, DC: KFF.
- Jacobson, G., T. Neuman, and A. Damico. 2019. *Do people who sign up for Medicare Advantage plans have lower Medicare spending?* Washington, DC: KFF.
- Jacobson, G., C. Swoope, M. Perry, et al. 2014. *How are seniors choosing and changing health insurance plans? Findings from focus groups with Medicare beneficiaries*. Washington, DC: KFF.
- James, H. O., B. A. Dana, M. Rahman, et al. 2024. Medicare Advantage health risk assessments contribute up to \$12 billion per year to risk-adjusted payments. *Health Affairs* 43, no. 5 (May): 614–622.
- Johnson, G., Z. M. Lyon, and A. Frakt. 2017. Provider-offered Medicare Advantage plans: Recent growth and care quality. *Health Affairs* 36, no. 3 (March 1): 539–547.
- Keohane, L. M., R. C. Grebla, V. Mor, et al. 2015. Medicare Advantage members’ expected out-of-pocket spending for inpatient and skilled nursing facility services. *Health Affairs* 34, no. 6 (June): 1019–1027.
- Killian, R. W., and R. L. Swenson. 2016. *Medicare Advantage: Market entry variables to success*. Seattle, WA: Milliman. <https://www.milliman.com/en/insight/medicare-advantage-market-entry-variables-to-success>.
- Kosar, C. M., H. O. James, D. Kim, et al. 2024. Excess diagnosis coding in Medicare Advantage: Evidence from skilled nursing facility clinical assessments. *Health Affairs* 43, no. 12 (December): 1628–1637.
- 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.
- Langwell, K. M., and J. P. Hadley. 1990. Insights from the Medicare HMO demonstrations. *Health Affairs* 9, no. 1 (Spring): 74–84.
- 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>.

- Lieberman, S. M., S. Valdez, and P. B. Ginsburg. 2023. *Medicare Advantage enrolls lower-spending people, leading to large overpayments*. White paper. June. https://healthpolicy.usc.edu/wp-content/uploads/2023/06/2023.06_Schaeffer_Center_White_Paper_Role_of_Risk_Adjustment_in_Overpaying_Medicare_Advantage_Plans.pdf.
- McWilliams, J. M., G. Weinreb, L. Ding, et al. 2023. Risk adjustment and promoting health equity in population-based payment: Concepts and evidence. *Health Affairs* 42, no. 1 (January): 105–114.
- Medicare Payment Advisory Commission. 2024. *Report to the Congress: Medicare payment policy*. Washington, DC: MedPAC.
- Medicare Payment Advisory Commission. 2023a. *Report to the Congress: Medicare and the health care delivery system*. Washington, DC: MedPAC.
- Medicare Payment Advisory Commission. 2023b. *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. 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. 2019. *Report to the Congress: Medicare and the health care delivery system*. Washington, DC: MedPAC.
- Medicare Payment Advisory Commission. 2017. *Report to the Congress: Medicare payment policy*. Washington, DC: MedPAC.
- Medicare Payment Advisory Commission. 2016a. Medicare Advantage: Calculating benchmarks and coding intensity. Presentation at the Commission's November public meeting. <https://www.medpac.gov/wp-content/uploads/2016/11/MA-AB-Coding-Nov16-For-Laptop.pdf>.
- Medicare Payment Advisory Commission. 2016b. *Report to the Congress: Medicare and the health care delivery system*. Washington, DC: MedPAC.
- Medicare Payment Advisory Commission. 2016c. *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. 2004. *Report to the Congress: Medicare payment policy*. Washington, DC: MedPAC.
- Medicare Payment Advisory Commission. 1998. *Report to the Congress: Medicare payment policy*. Washington, DC: MedPAC.
- Meyers, D. J., E. Belanger, N. Joyce, et al. 2019. Analysis of drivers of disenrollment and plan switching among Medicare Advantage beneficiaries. *JAMA Internal Medicine* 179, no. 4 (April 1): 524–532.
- Milhaupt, C. 2023. *Medicare Advantage spending, medical loss ratios, and related businesses: An initial investigation*. Los Angeles, CA: USC Schaeffer/Brookings. <https://www.brookings.edu/articles/medicare-advantage-spending-medical-loss-ratios-and-related-businesses-an-initial-investigation/>.
- Newhouse, J. P. 2002. *Pricing the priceless: A health care conundrum*. Cambridge, MA: MIT Press.
- Newhouse, J. P., M. Price, J. M. McWilliams, et al. 2015. How much favorable selection is left in Medicare Advantage? *American Journal of Health Economics* 1, no. 1 (Winter): 1–26.
- 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: KFF. <https://www.kff.org/report-section/beneficiary-experience-affordability-utilization-and-quality-in-medicare-advantage-and-traditional-medicare-a-review-of-the-literature-report/>.
- Office of Inspector General, Department of Health and Human Services. 2023. *Toolkit: To help decrease improper payments in Medicare Advantage through the identification of high-risk diagnosis codes*. A-07-23-01213. Washington, DC: OIG.
- Optum. 2020. *A smarter retrospective risk adjustment program*. Eden Prairie, MN: Optum.
- Ortaliza, J., K. Amin, C. Cox, et al. 2023. *Health insurer financial performance in 2021*. Washington, DC: KFF.

- Ortaliza, J., J. Fuglesten Biniek, E. Hinton, et al. 2024. *Health insurer financial performance in 2023*. Washington, DC: KFF. <https://www.kff.org/medicare/issue-brief/health-insurer-financial-performance/>.
- Pelech, D. 2018. Paying more for less? Insurer competition and health plan generosity in the Medicare Advantage program. *Journal of Health Economics* 61 (September): 77–92.
- Pelech, D. 2017. Dropped out or pushed out? Insurance market exit and provider market power in Medicare Advantage. *Journal of Health Economics* 51 (January): 98–112.
- Pizer, S. D., and A. B. Frakt. 2002. Payment policy and competition in the Medicare+Choice program. *Health Care Financing Review* 24, no. 1 (Fall): 83–94.
- 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.
- Rahman, M., L. Keohane, A. N. Trivedi, et al. 2015. High-cost patients had substantial rates of leaving Medicare Advantage and joining traditional Medicare. *Health Affairs* 34, no. 10 (October): 1675–1681.
- Riley, G., C. Tudor, Y. P. Chiang, et al. 1996. Health status of Medicare enrollees in HMOs and fee-for-service in 1994. *Health Care Financing Review* 17, no. 4 (Summer): 65–76.
- Riley, G. F. 2012. Impact of continued biased disenrollment from the Medicare Advantage program to fee-for-service. *Medicare & Medicaid Research Review* 2, no. 4.
- Ross, C., L. Lawrence, B. Herman, et al. 2024. How UnitedHealth turned a questionable artery-screening program into a gold mine. *Stat News*, August 7. <https://www.statnews.com/2024/08/07/unitedhealth-peripheral-artery-disease-screening-program-medicare-advantage-gold-mine/>.
- Ryan, A. M., Z. Chopra, D. J. Meyers, et al. 2023. Favorable selection in Medicare Advantage is linked to inflated benchmarks and billions in overpayments to plans. *Health Affairs* 42, no. 9 (September): 1190–1197.
- Schulte, F. 2016. Medicare Advantage audits reveal pervasive overcharges. <https://publicintegrity.org/health/medicare-advantage-audits-reveal-pervasive-overcharges/>.
- Schulte, F., and H. K. Hacker. 2022. Audits—hidden until now—reveal millions in Medicare Advantage overcharges. *Kaiser Health News*, November 21. <https://khn.org/news/article/audits-hidden-until-now-reveal-millions-in-medicare-advantage-overcharges/>.
- Signify Health. 2023. CVS Health completes acquisition of Signify Health. <https://www.signifyhealth.com/news/cvs-health-completes-acquisition-of-signify-health>.
- Skopec, L., S. Zuckerman, E. Allen, et al. 2019. *Why did Medicare Advantage enrollment grow as payment pressure increased?* Washington, DC: Urban Institute.
- Song, Z., M. B. Landrum, and M. E. Chernew. 2013. Competitive bidding in Medicare Advantage: Effect of benchmark changes on plan bids. *Journal of Health Economics* 32, no. 6 (December): 1301–1312.
- Teigland, C., Z. Pulungan, Y. Su, et al. 2023. *Harvard-Inovalon Medicare study: Utilization and efficiency under Medicare Advantage vs. Medicare fee-for-service*. White paper. https://www.inovalon.com/wp-content/uploads/2023/11/PAY-23-1601-Insights-Harvard-Campaign-Whitepaper_FINAL.pdf.
- United States of America ex rel. Benjamin Poehling v. UnitedHealth Group Inc. et al. 2016. U.S. District Court for the Central District of California. No. 11-cv-0258-A. <https://dockets.justia.com/docket/virginia/vaedce/2:2020cv00079/467869>.
- United States of America ex rel. James M. Swoben v. Secure Horizons, e. a. 2017. U.S. District Court for the Central District of California. No. CV 09–5013 JFW (JEMx).
- United States of America v. Anthem Inc. 2020. US 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>.
- UnitedHealth Group. 2023. Investor conference 2023. <https://www.unitedhealthgroup.com/content/dam/UHG/PDF/investors/2023/ic23/Investor-Conference-2023-Book.pdf>.
- UnitedHealth Group. 2022. Optum and LHC Group to combine, advancing abilities to extend value-based care into patients’ homes. Press release. <https://www.unitedhealthgroup.com/newsroom/2022/2022-03-29-optum-lhc-group-combine.html>.
- Wakely. 2024. Memorandum to Lynn Nonnemaker from Tim Courtney and Rachel Stewart re: Value of Medicare Advantage compared with fee for service. January 18. https://ahiporg-production.s3.amazonaws.com/documents/Value-of-MA-Response-to-MedPAC_01.18.2024.pdf.