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CMS Quality Measure Development Plan

2022 Annual Report

For the Quality Payment Program

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For the Quality Payment Program

Prepared by Health Services Advisory Group, Inc.

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Executive Summary

This report documents measure development activities for the Quality Payment Program in accordance with the *CMS Quality Measure Development Plan* (the MDP). The 2022 MDP Annual Report tracks funding expenditures, measure development, status of measurement gaps, and the calendar year (CY) 2022 measure inventory, as well as describing CMS policy updates aimed at promoting value-based care and advancing equity in the U.S. health care system.

2022 Quality Payment Program Measure Inventory

Merit-based Incentive Payment System (MIPS)		***Qualified Clinical Data Registries***	
200 total quality measures for all specialties (24% eCQMs)		CMS-approved:	**49**
Outcome/intermediate outcome:	**41**	Applicable to specialties prioritized in Measure Development Plan and Annual Reports:	**28**
Patient-reported outcome-based performance measures (PRO-PMs):	**18**	***Advanced Alternative Payment Models (APMs)***	
Efficiency:	**6**	CMS-approved:	**10**
Process:	**132**		
Patient experience:	**2**		
Structural:	**1**		

Key Accomplishments for the Quality Payment Program

- Established 7 MIPS Value Pathways for the 2023 performance year and prioritized 6 clinical areas for developing MVP measure sets focused on outcomes: behavioral health, diabetes, HIV/AIDS, hypertension, kidney disease, and women's health/maternal care
- Added the APM Performance Pathway as a reporting option for eligible clinicians in MIPS APMs
- Expanded MIPS telehealth services and made 39 electronic clinical quality measures (eCQMs) applicable for clinician reporting
- Added 5 episode-based cost measures for a total of 23 such measures used in CY 2022, which cover an estimated 13% of Medicare Part A and B costs toward a statutory target of 50%[1]

MACRA* Section 102 Funding

$13.2 million

expended in fiscal year (FY) 2021

$10.6 million for measure development

$2.6 million for support activities

*Medicare Access and Children's Health Insurance Program (CHIP) Reauthorization Act of 2015

25 Measures Developed in FY 2021	
Outcome/Intermediate:	**12**
Process:	**5**
PRO-PMs:	**8**
3 Measures Continuing Development in 2022	
PRO-PM:	**1**
Process:	**1**
Composite:	**1**

Refining the Measure Inventory – Since the inception of MIPS, CMS has reduced the measure inventory about 26% by removing low-bar, topped out, and duplicative measures. High-priority outcome measures have increased about 6% since 2017 and, including patient-reported outcome measures, make up 30% of MIPS measures.

MIPS Value Pathways (MVPs) – This new framework for a cohesive participation experience connects activities and measures from the four MIPS performance categories: quality, cost, promoting interoperability, and improvement activities. Each MVP is relevant to a specialty, medical condition, team-based care model, or episode of care and emphasizes the importance of patient experiences and better outcomes. CMS envisions that reporting on measures that directly relate to a clinician's practice will yield meaningful data for clinicians to use for quality improvement and for patients to make well-informed decisions about the care they need.

1. Introduction

This annual report—the sixth since 2017—describes priorities for clinician quality measurement and progress made in achieving goals defined in the *Centers for Medicare & Medicaid Services (CMS) Quality Measure Development Plan* (the MDP).[2] The 2022 MDP Annual Report documents ongoing efforts to develop quality measures for use in MIPS and APMs, together known as the Quality Payment Program. The report further documents how CMS addresses clinician quality measurement gaps and the funding used for related measure development.

Section 102 of the Medicare Access and Children's Health Insurance Program (CHIP) Reauthorization Act of 2015 (MACRA) authorizes $15 million each fiscal year (FY) from 2015 through 2019, available through the end of FY 2022, for development of quality measures for the Quality Payment Program and other activities carrying out section 102 of MACRA.[i] As required by section 102 of MACRA, the 2022 MDP Annual Report estimates funding, which totaled $13.2 million in FY 2021:

- $8.6 million for measure development under MACRA cooperative agreements
- $2.0 million[ii] for other measure development funded by section 102 of MACRA
- $1.0 million for technical support to MACRA cooperative agreement recipients (The three-year grants concluded in FY 2021, having funded 21 clinical quality measures.)
- $1.6 million related to MACRA support activities (e.g., development of the MDP Annual Report, identification of performance measurement gaps, developing approaches for systematic measure assessment, and the patient engagement support contract).

Since the inception of MIPS, CMS has reduced its measure inventory about 26% by removing low-bar, topped out, and duplicative measures. The final rule, titled "Medicare Program; CY 2022 Payment Policies Under the Physician Fee Schedule and Other Changes to Part B Payment Policies; Medicare Shared Savings Program Requirements; Provider Enrollment Regulation Updates; and Provider and Supplier Prepayment and Post-Payment Medical Review Requirements" (CY 2022 PFS Final Rule), includes 200 quality measures for the 2022 performance period, 24% of which are eCQMs.[3(p. 65687-65698),4] High-priority outcome measures have increased about 6% since 2017; together with patient-reported outcome measures (9%), they make up 30% of MIPS measures.

Objectives

The 2022 MDP Annual Report fulfills specific requirements of section 102 of MACRA[iii]:

- **Reports on the progress made in developing quality measures for the Quality Payment Program[iv] and the Secretary's efforts to implement the MDP.**[v] Twenty-five

[i] Section 1848(s)(6) of the Social Security Act (the Act), as added by section 102 of MACRA. Appendix A contains excerpts of the statutory language.
[ii] Includes expenditures related to measurement development, measurement maintenance, production support, and overhead costs
[iii] Section 1848(s)(3) of the Act.
[iv] Section 1848(s)(3)(A) of the Act.
[v] Section 1848(s)(3)(B)(i) of the Act.

measures intended for MIPS, MIPS APMs, or Advanced APMs were completed in FY 2021, and three are proceeding in development.

- **Provides other information the Secretary determines to be appropriate.**[vi] The Department of Health and Human Services (HHS) explored how performance measurement and associated policy levers can help reduce health inequities while sustaining efforts to update measurement technology.
- **Details updates to the MDP, including newly identified gaps and the status of previously identified gaps.**[vii] CMS is targeting six clinical areas of need for development of measure sets —especially including outcome measures—for MVPs, the future state of the clinician quality program.
- **Describes the quality measures developed during the previous year**[viii] **(FY 2021, October 1, 2020–September 30, 2021).** The report includes detailed measure information: name, health care quality priority; MACRA domain; developer, steward, type, endorsement status, whether electronically specified. The total number of quality measures developed and estimated expenditures for each type of measure are provided.
- **Describes quality measures in development at the time of the report (as of September 30, 2021).**[ix] An estimate of the time of completion is provided if available, along with the same details described for fully developed measures.
- **Provides an inventory of applicable measures.**[x] The inventory available for 2022 reporting in the Quality Payment Program consists of measures approved for MIPS, MIPS APM Performance Pathway (APP), MIPS qualified clinical data registries (QCDRs), and Advanced APMs.

Report Organization

MACRA Requirements for the CMS MDP Annual Report (Chapter 2) describes FY 2021 activities of CMS components, in partnership with contractors, to support implementation of the MDP, as well as HHS' endeavors to support and coordinate with measures developers. *Quality Measures Developed and In Development During the Previous Year* (Chapter 3) details progress in measure development. *Closing the Measurement Gaps by Advancing the MDP* (Chapter 4) examines the current status of measurement gaps in the Quality Payment Program. *Inventory of Applicable Quality Measures* (Chapter 5) describes the measures approved for clinician reporting for CY 2022 performance and is followed by a brief *Conclusion* (Chapter 6).

Appendices supplement the report information:

Appendix A – *MACRA Statutory Language Excerpts*
Appendix B – *Acknowledgments*
Appendix C – *CMS-Funded Quality Measures Developed During the Previous Year*
Appendix D – *CMS-Funded Quality Measures in Development*
Appendix E – *CMS Advanced APM Quality Measures Inventory*

[vi] Section 1848(s)(3)(B)(v) of the Act.
[vii] Section 1848(s)(3)(B)(iv) of the Act.
[viii] Section 1848(s)(3)(B)(ii) of the Act.
[ix] Section 1848(s)(3)(B)(iii) of the Act.
[x] Section 1848(s)(3)(B)(iv) of the Act.

2. MACRA Requirements for the CMS MDP Annual Report

Efforts to Implement the Measure Development Plan

The MDP establishes measure priorities for the two primary tracks of the Quality Payment Program—MIPS and Advanced APMs—while adhering to CMS' guiding principles and meeting requirements of MACRA section 102. The MDP Annual Report contains updated clinician quality measure information from the most recent fiscal year and reflects CMS policy updates to meet present needs.

Since the onset of the U.S. public health emergency arising from the coronavirus disease 2019 (COVID-19) pandemic, CMS has redoubled efforts to reduce clinician burden and expand beneficiaries' access to health care. CMS applied the automatic MIPS extreme and uncontrollable circumstances policy to individual MIPS eligible clinicians for the 2021 performance year. They will have all four performance categories reweighted to 0% and receive a neutral payment adjustment in 2023 unless they submit data in two or more performance categories or have a higher final score from group or APM Entity participation.[5]

The CY 2022 PFS Final Rule finalized a policy expanding telehealth access for the diagnosis, evaluation, and treatment of mental health conditions.[xi,3(p. 65059)] Expanded Medicare coverage of other telehealth services during the public health emergency remains in effect through December 31, 2023.[3(p. 65055)]

In the past two years, a wide range of practitioners initiated or expanded telehealth services to beneficiaries regardless of their location. Addressing a measurement gap that arose with the changing mode of service delivery, CMS made 39 eCQMs available for CY 2021 MIPS reporting on telehealth services.[6] These timely policy actions enhanced beneficiaries' access to care and enabled reporting of quality measures for telehealth-based encounters during the public health emergency.

Feedback from participating clinicians continues to shape the evolving Quality Payment Program. This chapter of the MDP Annual Report highlights various CMS efforts to support beneficiaries, caregivers, and practitioners through partnerships and outreach efforts.

Funding New Measure Development

MACRA cooperative agreements represented a unique collaboration between CMS and private organizations such as specialty societies, universities, and hospitals to develop or adapt measures for the Quality Payment Program. By the end of the three-year project, recipients of seven grants developed 21 clinician quality measures for the specialties of orthopedic surgery, pathology, radiology, palliative care, oncology, and mental health and substance abuse. Chapter 3, *Quality Measures Developed and in Development During the Previous Year*, describes the measures completed in FY 2021.

[xi] In accordance with Section 1834(m)(7) of Social Security Act, as amended by section 123 of the Consolidated Appropriations Act, 2021.

Identifying and Developing Meaningful Measures

Two recent policy documents articulate CMS strategic priorities for health care quality measurement, with which the MDP's objectives for the Quality Payment Program align.

CMS Quality Measurement Action Plan

After a year of collaborative development with stakeholders,[7] CMS introduced the Quality Measurement Action Plan at the 2021 CMS Quality Conference. The plan supports value-based care infrastructure and management by the use and promotion of health data and embraces five overarching goals[8]:

- Use meaningful measures to streamline and align quality measurement.
- Leverage measures to drive improvement through public reporting and payment programs.
- Improve quality measures' efficiency by a transition to digital measures and use of advanced data analytics.
- Empower consumers to make the best health care choices through patient-directed quality measures and public transparency.
- Leverage quality measures to promote equity and close gaps in care.

CMS' Approach to Advancing Health Equity

As the nation's largest provider of health insurance through Medicare, Medicaid/CHIP, and the Marketplace, CMS strives to advance equity throughout the U.S. health care system. Social risk factors such as the physical environment, food insecurity, and unsafe housing are among the many contributors to disparities in health outcomes apart from clinical care.

The disparate impacts of COVID-19 on vulnerable populations—evidenced in infection patterns, access to treatment, mortality, and vaccination rates—underscored stark inequities in the health care system and population health. CMS is striving to identify, understand, and address social risk factors that contribute to health outcomes as an important step toward health equity.

CMS strives to advance health equity by addressing the health disparities that underlie the U.S. health system. With this in mind, CMS aims to advance attainment of the highest level of health for all people, where everyone has a fair and just opportunity to attain optimal health regardless of race, ethnicity, disability, sexual orientation, gender identity, socioeconomic status, geography, preferred language, or other factors that affect access to care and health outcomes. CMS is designing, implementing, and operationalizing policies and programs that support health for all the people served by its programs, eliminating avoidable differences in health outcomes experienced by people who are disadvantaged or underserved, and providing the care and support that enrollees need to thrive.[9]

Because timely and accurate social risk factor data are critical to help identify and understand disparities and their drivers, and to address and remove barriers for individuals in accessing CMS benefits, services, and supports, and coverage, the CY 2022 PFS Final Rule included a request for information on comprehensive health disparities based on social risk factors and race and ethnicity.[3(p. 65382)]

CMS continues to use quality improvement and informed provider practices to reduce the inequities stemming from social risk factors. Specifically, for the Quality Payment Program, a

CMS contractor began an information-gathering task to support the goal of assessing health equity through quality measurement. The contractor is seeking to identify broadly applicable quality measures or new measure concepts appropriate for the foundational layer of MVPs, an alternative reporting option anticipated for the 2023 performance year.

Other Strategic Initiatives

Digital measures – CMS is pursuing a transition to digital quality measures (dQMs) using health information that can be captured and transmitted electronically and via interoperable systems.[3(p. 65379)] According to the CY 2022 PFS Final Rule, data sources for dQMs may include administrative systems, electronically submitted clinical assessment data, case management systems, electronic health records, instruments such as wearable and medical devices, patient portals or applications, and health information exchanges or registries.[3(p. 65379)] CMS seeks input from other agencies and stakeholders to further specify dQM requirements through future rulemaking and policies. To support the transition to dQMs, a CMS contractor undertook the initial conversion to Fast Interoperability Resources (FHIR) specifications for all eCQMs used in MIPS and other CMS programs.

Quality Measure Index –The Quality Measure Index (QMI) is a scoring tool based on standardized definitions of quantifiable measure characteristics. The tool was developed to address a Government Accountability Office (GAO) recommendation that CMS develop new procedures to systematically assess quality measures for use in federal programs.[10] The goal of the QMI is to transparently display the strengths and limitations of each quality measure to facilitate comparisons between measures and aid CMS in selecting the best possible measures for quality programs. CMS began collecting information required for QMI scoring and classification variables on measures submitted for 2021 pre-rulemaking and refined the process for 2022 submissions. While the QMI was created to assess clinician-level quality measures, CMS broadened use of the instrument over the past year to assess facility-level measures for 17 CMS quality programs.

Alignment of measures – CMS convenes an internal agency workgroup to identify opportunities for quality measure alignment across quality reporting and payment programs, if appropriate, and to discuss approaches to align measures across settings. In a cross-component group with the Department of Veterans Affairs and the Department of Defense, CMS is exploring alignment across agencies and opportunities for joint initiatives to contribute to health care value through efficiency and decreased burden to patients, measured entities, and payers. CMS also partners with health insurance issuers and purchasers, medical associations, and consumer groups in the Core Quality Measures Collaborative (CQMC), convened by the National Quality Forum (NQF). Ten CQMC core measure sets are currently available for use across health care settings by any payer. The CQMC published the *CQMC Implementation Guide* in FY 2021 to support health plans seeking to implement value-based purchasing (VBP) programs.[11] The guide describes four steps to successfully implement VBP: (1) leadership and planning, (2) stakeholder engagement and partnership, (3) measure alignment, and (4) data and quality improvement support.

Partnering with Patients, Families, and Caregivers in Measure Development

CMS supports active partnerships in the design and evaluation of care through the Person and Family Engagement (PFE) for Quality Measure Development contract. The PFE contractor assists other CMS contractors with recruitment, engagement, and onboarding of beneficiaries and families to technical expert panels or other roles in measure development projects.

As part of the Measure Development Education & Outreach Series, CMS and its contractors promote the benefits of engaging beneficiaries and families in all stages of measure development. An information session titled "Transforming Measurement for Better Care: Lessons Learned About Patient-Centered Care" discussed best practices for creating meaningful relationships with patients and caregivers.[12] Person-centered measurement draws upon the experiences of patients and caregivers to inform measure developers about their health care needs, preferences, and values—in sum, what truly matters to them.

Partnering with Clinicians and Professional Societies

Measures Management System and Outreach

CMS launched the Measures Under Consideration Entry/Review Information Tool (MERIT) in 2021 for the submission of clinical quality measures for program consideration. The tool assists users with measure searches from current and prior years and adds structure to the annual measure submission workflow.[13]

The CMS Measures Management System (MMS) holds monthly information sessions for measure developers and other interested stakeholders. Past webinars are available for viewing on the MMS website.[14] Sessions from the past year include the following:

- "CMS Quality Measurement: Where It's Headed and How We'll Get There"
- "CMS Quality Measurement: Driving Quality in the U.S.: How CMS Evaluates its Measure Portfolio"
- "Specifying Your Measure: How to Create Clear and Unambiguous Measure Specifications"
- "Overcoming Common Challenges in the Measure Development Lifecycle"

The annual update to the *CMS Measures Management System Blueprint*, Version 17.0, features a population health measures supplement, considerations for Medicaid quality measures, revised measure reliability testing content, and an updated business case form.[15]

Quality Payment Program Educational Resources

CMS continually provides webinars and general educational resources for Quality Payment Program stakeholders. Twenty-four recorded webinars from 2021 are accessible on the Quality Payment Program website, covering topics such as the CY 2022 PFS Proposed Rule, QCDR measure development, and support for reporting options.[16] Regulatory and participation guidelines are also updated yearly.

Development of Episode-Based Cost Measures for the Merit-based Incentive Payment System

Since 2017, the MACRA cost measure project has engaged stakeholders in creating cost measures that take into consideration patient condition and care episode groups. These measures, developed and tested in cycles called waves, represent a range of clinical specialties and procedures and rely on administrative claims data to reduce burden on providers.

With the addition of five new episode-based cost measures, the total for the 2022 performance period is 23. Together with the *Medicare Spending Per Beneficiary (MSPB) Clinician Measure* and *Total Per Capita Cost*, these measures represent an estimated 94% of Medicare Part A and B costs at the clinician group level. Episode-based cost measures alone cover an estimated 13% of Part A and B costs; along with the *MSPB Clinician Measure*, approximately 33%.[xii] Section 1848(r)(2) of the Social Security Act, as amended by the Bipartisan Budget Act of 2018, section 51003(a)(2), set an initial target for episode-based and patient condition groups to cover 50% of expenditures under Parts A and B.[1] Four additional cost measures began development in 2021.

In the MDP, CMS added Efficiency and Cost Reduction to the five quality domains specified by MACRA. That category can encompass "balancing" quality measures of appropriate use of services to mitigate unintended consequences of cost measures. For example, *Colorectal Cancer Screening* (Quality ID #113*)* could be regarded as a balancing measure for the *Screening/ Surveillance Colonoscopy* episode-based cost measure.

Reducing Clinician Burden of Data Collection for Quality Measure Reporting

MIPS Value Pathways

The U.S. Government Accountability Office released a 2021 report detailing strengths and weaknesses of the original MIPS program.[17] Addressing feedback from the report and eligible clinicians, the MIPS Value Pathways (MVPs) framework was designed to be simpler to navigate than reporting on traditional MIPS measures and to provide more meaningful feedback. MVPs support patient-centered care and a continued emphasis on the importance of health equity (including measures and activities that assess health disparities and socioeconomic factors), patient outcomes, population health, interoperability, and reduced reporting burden for clinicians. CMS anticipates full transition to the MVP framework by 2027 with complementary measures and activities for each MVP relevant to a specialty, medical condition, team-based care model, or episode of care.

CMS built upon the MVP development criteria in the CY 2022 PFS Final Rule, specifying that MVPs must[3(p. 65405-65408)]:

- Include one or more outcome measures relevant to the MVP clinical area.
- Use other high-priority measures if outcome measures are not available.
- Permit outcome-based administrative claims measures within the MVP quality domain.
- Require complete testing at the clinician level to include QCDR measures.

The rule established the first seven MVPs for the 2023 performance year[3(p. 65998-66031)]:

- Advancing Rheumatology Patient Care
- Coordinating Stroke Care to Promote Prevention and Cultivate Positive Outcomes
- Advancing Care for Heart Disease
- Optimizing Chronic Disease Management
- Adopting Best Practices and Promoting Patient Safety Within Emergency Medicine
- Improving Care for Lower Extremity Joint Repair
- Support of Positive Experiences With Anesthesia

[xii] Coverage estimates by individual cost measure are available in the 2022 Summary of Cost Measures (https://qpp-cm-prod-content.s3.amazonaws.com/uploads/1728/2022-mips-summary-cost-measures.pdf) on the QPP Resource Library.

A participating MIPS eligible clinician must report four quality measures from the selected MVP, along with one of two available population health measures; CMS will use administrative claims data to calculate population health measures and cost performance. Among a weighted selection of improvement activities, the clinician must choose two medium-weight or one high-weight activity.[18] An MVP participant lacking a hardship exception would meet the same reporting requirements for promoting interoperability as for traditional MIPS.

Additional HHS Efforts to Support the MDP

National Quality Forum

NQF culminated a multiyear project with the July 2021 publication of the *Social Risk Trial Final Report.*[19] Begun in 2014, the CMS-funded project aimed to determine whether quality measures should adjust for social risk factors[xiii] in addition to clinical factors in performance measurement. In 2017, the NQF Disparities Standing Committee established to oversee and evaluate the trial authored a *Roadmap for Promoting Health Equity and Eliminating Disparities: The Four I's for Health Equity*, detailing how performance measurement and its associated policy levers can help reduce health inequities.[21]

In the project's final report, NQF underscores how the diverse impacts of COVID-19 have exposed and exacerbated the plight of marginalized populations. The report notes striking inequities in virus exposure and susceptibility, as well as access to testing, treatments, and vaccinations. It further observes that risk adjustment can either improve or worsen issues of health equity and health outcomes.

"Now more important than ever, it is resoundingly clear when performance measures are used for high-stakes incentive, value-based care delivery, and accountability purposes, the use of performance stratification and adjustment for social risks should be considered, tested, and evaluated for each individual measure submitted to NQF," the report states.

In other work relevant to Quality Payment Program stakeholders, NQF released two other publications on risk adjustment and health equity in 2021:

- *Current Practices of Testing Social and Functional Status-Related Risk Factors Within Risk Adjustment Models of Performance Measurement*[22] – The final report on an environmental scan conducted by NQF and informed by a technical expert panel examines data sources used for risk adjustment, functional or social risk factors available for testing, and approaches to conceptual and statistical models for risk adjustment.
- *Developing and Testing Risk Adjustment Models for Social and Functional Status-Related Risk Within Healthcare Performance Measurement*[23] – This technical report provides steps, best practices, and minimum standards for creating risk-adjustment models for social and functional factors.

[xiii] Social risk factors are the social conditions that may influence health outcomes as much as—or more than—medical care does, including socioeconomic position/status (e.g., income, education, and occupation), race and ethnicity and cultural context, gender, social relationships, residential and community characteristics, and health literacy. Within the context of inclusion in a risk adjustment model, these factors must possess a conceptual and empirical relationship to health care outcomes of interest, precede care delivery, and refrain from being either a consequence of the quality of care or a characteristic that could be swayed by health care interventions.[20]

NQF also established a Measures Application Partnership (MAP) Health Equity Advisory Group to provide input to CMS on health disparities associated with social determinants of health.[24] The advisory group, assembled through a Call for Nominations in July 2021, will evaluate and provide feedback on quality measures submitted in the Annual Call for Measures. In addition, the MAP piloted a process in which the MAP Coordinating Committee reviews measure sets outside of the annual rulemaking cycle and recommends measures for removal from programs.[25]

eCQI Resource Center and eCQM Standardization

The Electronic Clinical Quality Improvement (eCQI) Resource Center is the main CMS resource on eCQMs for developers and other stakeholders. The website content includes eCQI tools, measure specification and implementation guidance, and information regarding industry standards.

Stakeholders can turn to the eCQI Resource Center to locate education and outreach materials for evolving eCQM standards. Through the year, CMS hosted interactive webinars on "Cooking with Clinical Quality Language (CQL), Quality Data Model (QDM), and Fast Interoperability Resources (FHIR)" to engage measure developers and solicit feedback.[26] The eCQI Resource Center posts recorded presentations such as these from the past year:

- "Reporting Electronic Clinical Quality Measures (eCQMs) Using the HL7® Fast Healthcare Interoperability Resources® (FHIR) Standard"[27]
- "Authoring eCQMs Using the FHIR Standard"[28]
- "CMS Presents Quality Measurement using HL7 FHIR 101"[29]

Recent enhancements to the website's eCQM Data Element Repository (DERep) include a navigational aid that shows a user's location within the website and details on the data elements used with an eCQM.[30]

Updates to the Measure Database

The CMS Measures Inventory Tool (CMIT) has added search features to support environmental scans of quality measures.[31] The Environmental Scan Support Tool (ESST) produces results about a measure's focus and target population and can be used during information-gathering activities for measure development as well as measure maintenance. Results are updated monthly in CMIT. ESST can be accessed both publicly and through a controlled-access site. The De Novo Measure Scan (DNMS), offered through the controlled-access site for CMS personnel and contractors, uses search terms to identify relevant literature for specific measure concepts.[32] In March 2022, the CMS MMS contractor will restructure the measures to allow for more nuanced analysis of the CMS measures portfolio, including greater ability to assess alignment across CMS programs.

3. Quality Measures Developed and In Development During the Previous Year

Quality Measures Developed During the Previous Year

Professional societies, academic medical centers, and other entities developed 25 measures—mostly specific to a condition or clinician specialty—intended for potential inclusion in MIPS, MIPS APMs, or Advanced APMs. Their estimated development expenditures for FY 2021 totaled $8.79 million[xiv]:

- $2.03 million for eight outcome measures
- $3.03 million for eight PRO-PMs
- $1.8 million for four intermediate outcome measures
- $1.93 million for five process measures

For a measure to be implemented in a CMS program, it must be fully developed with valid and reliable testing results. In addition, CMS assesses burden on providers and potential impact of a measure. Because of the rigorous process of measure selection, not all measures that complete development will necessarily be implemented in a program.

Table 1 groups the 25 developed measures by health care quality priority/MACRA quality domain, identifies the steward or developer, and notes whether they are electronically specified.

Table 1: Summary of CMS-Funded Measures Developed in FY 2021

Health Care Quality Priority/MACRA Domain* - *Measure Name* (Steward/Developer[s])	# of Measures	# of eCQMs
Affordable Care	0	N/A
Communication and Coordination/Care Coordination **Outcome measures**: - *Clinician and Clinician Group Risk-standardized Hospital Admission Rates for Patients with Multiple Chronic Conditions*^ (CMS/Yale CORE) - *Risk-Standardized Acute Unplanned Cardiovascular-Related Admission Rates for Patients with Heart Failure for the Merit-based Incentive Payment System*^ (CMS/Yale CORE) **Process measures**: - *Rate of communicating results of an amended report with a major discrepancy to the responsible provider*Σ *(American Society for Clinical Pathology)* - *Rate of Notification of a New Diagnosis of Malignancy to the Responsible Provider*Σ *(American Society for Clinical Pathology)*	4	2
Effective Treatment/Clinical Care** **Outcome measures**: - *Improvement or Maintenance in Recovery for Individuals with a Mental Health and/or Substance Use Disorder* (American Psychiatric Association) - *Improvement or Maintenance of Functioning for Individuals with a Mental and/or Substance Use Disorder* (American Psychiatric Association)	6	1

[xiv] This figure is specific to measure development and implementation activities; it does not include measure maintenance, production support, and overhead costs.

Health Care Quality Priority/MACRA Domain* - *Measure Name* (Steward/Developer[s])	# of Measures	# of eCQMs
- *Reduction in Suicidal Ideation or Behavior Symptoms* (American Psychiatric Association) **Process measures**: - *Initiation and Update to Suicide Safety Plan for Individuals with Suicidal Ideation, Behavior or Suicide Risk* (American Psychiatric Association) - *Measurement-based Care Processes: Baseline Assessment, Monitoring and Treatment Adjustment* (American Psychiatric Association) - *Prolonged opioid prescribing following elective primary total hip arthroplasty (THA) and/or total knee arthroplasty (TKA)*$^{\Sigma}$ (Brigham and Women's Hospital)		
Healthy Living/Population Health and Prevention**	0	N/A
Patient Safety/Safety **Intermediate outcome measures**: - *Excessive Radiation Dose or Inadequate Image Quality for Diagnostic Computed Tomography (CT) in Adults* (The Regents of the University of California San Francisco) - *Hemodialysis Vascular Access: Practitioner-Level Long-Term Catheter Rate**** (CMS/UM-KECC) - *Unsafe Opioid Prescriptions at the Dialysis Practitioner Group Level***** (CMS/UM-KECC) - *Unsafe Opioid Prescriptions at the Prescriber Group Level***** (CMS/UM-KECC) **Outcome measures**: - *Risk-standardized complication rate (RSCR) following elective primary total hip arthroplasty (THA) and/or total knee arthroplasty (TKA)*$^{\Sigma}$ (Brigham and Women's Hospital) - *Risk-standardized inpatient respiratory depression rate following elective primary total hip arthroplasty (THA) and/or total knee arthroplasty (TKA)*$^{\Sigma}$ (Brigham and Women's Hospital) - *Risk-standardized major bleeding and venous thromboembolism (VTE) rate following elective primary total hip arthroplasty (THA) and/or total knee arthroplasty (TKA)*$^{\Sigma}$ (Brigham and Women's Hospital)	7	3
Person and Family Engagement/Patient and Caregiver Experience **Patient-reported outcome performance measures**: - *Care Goal Achievement Following Total Hip Arthroplasty (THA) and/or Total Knee Arthroplasty (TKA)* (Brigham and Women's Hospital) - *Palliative care outpatients' experience of feeling heard and understood* (American Academy of Hospice and Palliative Medicine) - *Palliative care outpatients' experience of receiving desired help for pain* (American Academy of Hospice and Palliative Medicine) - *Patient-Reported Fatigue Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer* (Purchaser Business Group on Health [PBGH]/Seattle Cancer Care Alliance [SCCA]) - *Patient-Reported Overall Mental Health Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer* (PBGH/SCCA) - *Patient-Reported Overall Physical Health Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer* (PBGH/SCCA) - *Patient-Reported Pain Intensity Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer* (PBGH/SCCA)	8	0

Health Care Quality Priority/MACRA Domain* - *Measure Name* (Steward/Developer[s])	# of Measures	# of eCQMs
- *Patient-Reported Pain Interference Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer* (PBGH/SCCA)		
Total	**25**	**6**

* CMS will update the measure priority/domain if a more suitable option is identified during the development process.
^ Although this measure was identified as completing development during FY 2020 in the 2021 MDP Annual Report, MACRA funding was spent on the initial NQF endorsement process during FY 2021.
Σ Planned to be electronically specified
** Prevention measures are included in the Effective Treatment health care quality priority.
*** Although the 2021 MDP Annual Report identified this measure as having completed development during FY 2020, MACRA funding was spent on implementation in MIPS.
**** This measure was identified as *Opioid Safety Measure* in the 2021 MDP Annual Report.

See *CMS-Funded Quality Measures Developed During the Previous Year* (Appendix C) for measure details.[xv]

Quality Measures in Development at the Time of This Report

Four measures intended for potential inclusion in MIPS, MIPS APMs, or Advanced APMs were in development but not completed during FY 2021 (Table 2). Two of them were being developed as eCQMs. The combined expenditures were estimated at $1.49 million, including $287,815 authorized by section 102 of MACRA:

- $738,287 for one composite measure
- $287,815 for one PRO-PM
- $463,377 for two process measures

Table 2: Summary of CMS-Funded Measures in Development[xvi] in FY 2021

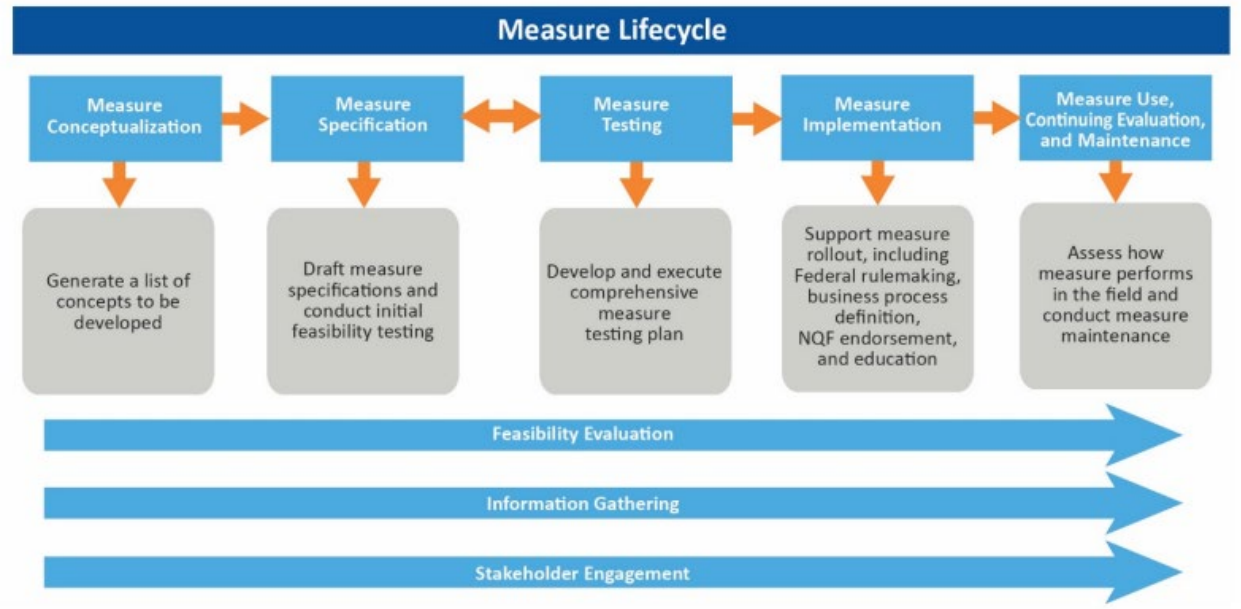
Health Care Quality Priority/MACRA Domain* (# of measures) - *Measure Name* (Steward/Developer[s])	Measure Type	eCQM
Affordable Care (0)	N/A	N/A
Communication and Coordination/Care Coordination (0)	N/A	N/A
Effective Treatment/Clinical Care (2)**		
- *Preventive Care and Wellness*Σ (CMS/Mathematica)	Composite	Yes
- *Safe Opioid Prescribing Practices*Σ,*** (CMS and American Society of Anesthesiologists [ASA]/Mathematica)	Process	Yes
Healthy Living/Population Health and Prevention (1)**		
- *COVID-19 Vaccination by Clinicians* (CMS and ASA/Mathematica)	Process	N/A
Patient Safety/Safety (0)	N/A	N/A
Person and Family Engagement/Patient and Caregiver Experience (1)		
- *Risk-Standardized Patient-Reported Outcomes Following Elective Primary Total Hip and/or Total Knee Arthroplasty (THA/TKA) Measure for Merit-based Incentive Payment System (MIPS)* (CMS/Yale CORE)	PRO-PM	N/A
Total	**4**	**2**

*CMS will update the measure priority/domain if a more suitable option is identified during the development process.
**Prevention measures are included in the Effective Treatment health care quality priority.
Σ Planned to be electronically specified
***CMS stopped measure development because of preliminary feedback on challenges related to feasibility and data availability.

[xv] Section 1848(s)(3)(B)(ii) of the Act.
[xvi] As of November 1, 2021, to allow for estimated funding for the entire FY 2021 and for federal review and clearance of this report.

Measure development can be conceived as a series of gates through which each measure must pass to advance for consideration in CMS quality programs (Figure 1). Measure conceptualization, specification, and testing—the first three phases in the measure lifecycle—are critical to vet and assess the viability of a measure concept prior to implementation.

Figure 1: Phases of Measure Development



Source: *Blueprint for the CMS Measures Management System, Version 17.0*

The measures described in Table 2 were at different phases of development at the time of this report.[xvii] *Preventive Care and Wellness* required further specification as an eCQM; therefore, its development status reverted from testing to measure specification. *COVID-19 Vaccination by Clinicians* was undergoing data collection and testing. In the implementation phase, the *THA/TKA* PRO-PM is undergoing initial NQF endorsement review and passed the Scientific Methods Panel in October 2021.

These measures can be considered for inclusion in the Quality Payment Program once all testing has been completed. See *CMS-Funded Quality Measures in Development* (Appendix D) for additional details about these measures, including developers and timelines for completion.[xviii]

CMS stopped development on *Safe Opioid Prescribing Practices* during FY 2021 after preliminary feedback revealed challenges related to feasibility and data availability. The measure primarily captured opioid prescriptions greater than 42 days; most states limit prescriptions to 30 days. See Table D-1 in Appendix D for details.

[xvii] As of November 1, 2021, to allow for estimated funding for the entire FY 2021 and for federal review and clearance of this report.
[xviii] Section 1848(s)(3)(B)(iii) of the Act.

4. Closing the Measurement Gaps by Advancing the MDP

Closing Previously Identified Gaps

FY 2021 measure development efforts demonstrate progress toward addressing the measurement gaps identified in the 2017–2021 MDP Annual Reports.[7,33-36] Fifteen of the 25 measures that completed development in FY 2021, covering six of the prioritized specialties (Table 3), could fill an identified gap for which no measures were found in the 2017 *CMS Quality Measure Development Plan Environmental Scan and Gap Analysis Report (MACRA, Section 102)*.[37] Some gaps could close as measure developers complete the sequence of steps required to submit measures for consideration.

Table 3: Recently Developed Measures Corresponding to Identified Gaps

Measure Title	Gap Noted in 2017 MDP E-Scan
General Medicine/Crosscutting	
*- Clinician and Clinician Group Risk-standardized Hospital Admission Rates for Patients with Multiple Chronic Conditions**	Admission -Multiple chronic conditions
- Risk-Standardized Acute Unplanned Cardiovascular-Related Admission Rates for Patients with Heart Failure for the Merit-based Incentive Payment System	Admission
Mental Health/Substance Use	
- Measurement-based Care Processes: Baseline Assessment, Monitoring and Treatment Adjustment	Patient activation/ engagement
Oncology	
- Patient-Reported Fatigue Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer	Health-related quality of life (QOL)
- Patient-Reported Overall Mental Health Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer	Health-related QOL
- Patient-Reported Overall Physical Health Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer	Health-related QOL
- Patient-Reported Pain Intensity Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer	Pain control
- Patient-Reported Pain Interference Following Chemotherapy among Adults with Breast Cancer, Colon Cancer, and Non-Small Cell Lung Cancer	Pain control
Orthopedic Surgery	
- Care goal achievement following total hip arthroplasty (THA) and/or total knee arthroplasty (TKA)	Care goal achievement
- Risk-standardized complication rate (RSCR) following elective primary total hip arthroplasty (THA) and/or total knee arthroplasty (TKA) (eCQM)	Complications from procedures

Measure Title	Gap Noted in 2017 MDP E-Scan
- Risk-standardized inpatient respiratory depression rate following elective primary total hip arthroplasty (THA) and/or total knee arthroplasty (TKA) (eCQM)	Medication side effects
- Risk-standardized major bleeding and venous thromboembolism (VTE) rate following elective primary total hip arthroplasty (THA) and/or total knee arthroplasty (TKA) (eCQM)	Medication side effects
Palliative Care/Hospice	
- Palliative care outpatients' experience of feeling heard and understood	Patient/caregiver experience
- Palliative care outpatients' experience of receiving desired help for pain	Patient/caregiver experience
Pathology	
- Rate of communicating results of an amended report with a major discrepancy to the responsible provider	Diagnostic accuracy

*This measure was finalized in the 2022 PFS Final Rule for use in MIPS.[3(p. 65695-65698)]

The three measures proceeding in development in FY 2021 (Table 2) also address important priorities for the Quality Payment Program: A measure intended for orthopedic surgeons assesses performance based on patient-reported functional outcomes and experience of care after total hip or knee arthroplasty. Two crosscutting measures are applicable to general medicine: *COVID-19 Vaccination by Clinicians* addresses a timely public health issue in the workplace, while testing of *Preventive Care and Wellness*, an eCQM, has supported the creation of FHIR composite standards.

A review of the CQMC core sets examined whether any of the measures could address clinician-level gaps previously identified for MDP-prioritized specialties.[37,38] *Oncology Care Model (OCM)-6 Patient-Reported Experience of Care* in the Oncology Core Set is specific to patients with cancer and addresses the measurement gap of patient/caregiver experience for oncology.[37]

Measures Under Consideration List Applicable to Identified Gaps

Each year the Measures Under Consideration List identifies quality and efficiency measures under review by the Secretary of HHS for use in certain Medicare quality programs.[39] The *2021 MDP Annual Report*[7] mentioned five quality measures on the 2020 Measures Under Consideration List for MIPS,[40,xix] all applicable to prioritized general medicine/ crosscutting practices.[37] Three of those five measures were listed in the proposed rule for stakeholder feedback, and one was subsequently adopted for MIPS in the CY 2022 PFS Final Rule[3(p. 65689-65691)]: *Person-Centered Primary Care Measure Patient Reported Outcome Performance Measure (PCPCM PRO-PM)*.

Ten potential MIPS quality measures were included on the 2021 Measures Under Consideration List.[41] Six of the 10 are applicable to prioritized specialties.[xx] Additionally, four of the 10 measures directly relate to subtopic gaps identified in the 2017 MDP Environmental Scan and Gap Analysis Report[37] (Table 4).

[xix] Five quality measures and five cost measures were included for MIPS on the 2020 Measures Under Consideration List.
[xx] Prioritized specialties in the MDP and MDP Annual Reports included allergy/immunology, emergency medicine, general medicine/crosscutting, mental health and substance use conditions, neurology, oncology, orthopedic surgery, palliative care, pathology, physical medicine and rehabilitation, radiology, and rheumatology.

Table 4: Measures Under Consideration Corresponding to Identified Gaps

Measure Title	Gap Noted in 2017 MDP E-Scan	MAP Recommendation
General Medicine/Crosscutting		
- Screening for Social Drivers of Health	Healthy communities	Conditional support
- Screen Positive Rate for Social Drivers of Health	Healthy communities	Conditional support
Oncology		
- Appropriate intervention of immune-related diarrhea and/or colitis in patients treated with immune checkpoint inhibitors	Medication side effects	Conditional support
Orthopedic surgery		
- Care Goal Achievement Following a Total Hip Arthroplasty (THA) or Total Knee Arthroplasty (TKA)	Care goal achievement	Do not support with potential for mitigation

As part of the pre-rulemaking process, the multi-stakeholder MAP convened by NQF reviewed all submitted measures.[xxi] The MAP conditionally supported three of the measures in Table 4 for rulemaking; it did not support the fourth measure but noted the potential for mitigation.[42] CMS considers the MAP recommendations when reviewing measures for potential use in programs.

Identifying New Gaps for Measure Development

CMS annually publishes needs and priorities for each program that falls under the CMS pre-rulemaking process.[43] High-priority measurement gaps for MIPS include the following:

- **Specialties:** dentistry, speech-language pathology, behavioral health, maternal health
- **Clinical conditions:** diabetes – amputation prevention
- **Health equity:** including measures and activities that assess health disparities and social determinants of health
- **Other topics:** shared decision-making, patient-reported outcomes

CMS has also identified six clinical areas for future MVP development: behavioral health, diabetes, HIV/AIDS, hypertension, kidney disease, and women's health and maternal care. The MDP project team has been tasked to perform an environmental scan and gap analysis focused on those areas and to seek feedback from the MDP Technical Expert Panel (TEP) to prioritize identified gaps for potential outcome measure development.

[xxi] Comprehensive information about the MAP and MAP processes is available at: http://www.qualityforum.org/MAP_Initiates_Review_of_Performance_Measures_for_Federal_Programs.aspx.

5. Inventory of Applicable Quality Measures

The inventory of applicable quality measures describes the measures available in 2022 for reporting by eligible clinicians and clinician groups participating in the Quality Payment Program. The inventory consists of MIPS measures, a subset of which are designated for the APM Performance Pathway; MIPS QCDR measures; and measures approved for use in Advanced APMs. The MIPS measures were posted for stakeholder review and input through the rulemaking process, which culminated in the November 19, 2021, publication of the CY 2022 PFS Final Rule, which took effect on January 1, 2022.[3]

MIPS Measures Included in the CY 2022 PFS Final Rule

For the 2021 performance period, 209 MIPS quality measures were available for reporting. The CY 2022 PFS Final Rule removed 13 measures[3(p. 65877-65891)] and added four new measures to MIPS,[3(p. 65687-65698)] yielding 200 quality measures available for the 2022 performance period: 41 intermediate outcome or outcome measures, 18 PRO-PMs, 132 process measures, six efficiency measures, two patient engagement/experience measures, and one structural measure.

Of the 200 quality measures, 135 are categorized as high priority[xxii] to assist clinicians in selecting measures for reporting to meet MIPS requirements. For the 2022 performance period, CMS implemented a certified nurse midwife specialty set and modified specialty measure sets based on a review of updates to quality measure specifications, changes finalized through rulemaking, and feedback from specialty societies.[3(p. 65700-65877)] CMS includes at least one high-priority measure in all specialty sets so that MIPS eligible clinicians can select a specialty set that reflects their scope of practice and report on measures within that set.[3(p. 65700-65877)] An interactive tool to view the comprehensive list of MIPS measures is available at https://qpp.cms.gov/mips/quality-measures.

APM Performance Pathway

The APP is a reporting option available to MIPS eligible clinicians participating in MIPS APMs, who are scored on the quality performance category for a fixed set of MIPS measures (Table 5):

- 10 measures via the CMS Web Interface[xxiii] or three MIPS eCQMs
- Consumer Assessment of Healthcare Providers and Systems (CAHPS) for MIPS patient experience survey
- Two readmission measures, calculated by CMS from administrative claims

[xxii] High-priority measures include outcome (including intermediate and patient-reported), appropriate use, patient safety, efficiency, patient experience, care coordination, and opioid-related quality measures.[3(p. 65407)] MIPS eligible clinicians must report six measures, including one outcome measure, or, in the absence of an applicable outcome measure, a high-priority measure.

[xxiii] The CMS Web Interface as a collection type/submission method for MIPS groups and virtual groups will remain an option through the CY 2022 performance period.[3(p. 65440)] The CMS Web Interface for APM Entities (specifically, Shared Savings Program accountable care organizations [ACOs] meeting the APM Performance Pathway reporting requirements only) will be available through the CY 2024 performance period.[3(p. 65629)]

Table 5: Measures Included in the Final APM Performance Pathway Measure Set for Performance Year 2022 and Subsequent Performance Years[a,3(p. 65266)]

Measure #	Measure Title	Collection Type	Submitter Type	Meaningful Measure Area
Quality ID #321	CAHPS for MIPS	CAHPS for MIPS Survey	Third Party Intermediary	Patient's Experience
Quality ID #479	Hospital-Wide, 30-day, All-Cause Unplanned Readmission (HWR) Rate for MIPS Eligible Clinician Groups	Administrative Claims	N/A	Admissions & Readmissions
Quality ID #484	Risk-Standardized, All-Cause Unplanned Readmission for Multiple Chronic Conditions	Administrative Claims	N/A	Admissions & Readmissions
Quality ID #001	Diabetes: Hemoglobin A1c (HbA1c) Poor Control	eCQM/MIPS CQM/ CMS Web Interface*	APM Entity/Third Party Intermediary	Mgt. of Chronic Conditions
Quality ID #134	Preventive Care and Screening: Screening for Depression and Follow-up Plan	eCQM/MIPS CQM/ CMS Web Interface*	APM Entity/Third Party Intermediary	Treatment of Mental Health
Quality ID #236	Controlling High Blood Pressure	eCQM/MIPS CQM/ CMS Web Interface*	APM Entity/Third Party Intermediary	Mgt. of Chronic Conditions
Quality ID #318	Falls: Screening for Future Fall Risk	CMS Web Interface*	APM Entity/Third Party Intermediary	Preventable Healthcare Harm
Quality ID #110	Preventive Care and Screening: Influenza Immunization	CMS Web Interface*	APM Entity/Third Party Intermediary	Preventive Care
Quality ID #226	Preventive Care and Screening: Tobacco Use: Screening and Cessation Intervention	CMS Web Interface*	APM Entity/Third Party Intermediary	Prevention and Treatment of Opioid and Substance Use Disorders
Quality ID #113	Colon Cancer Screening	CMS Web Interface*	APM Entity/Third Party Intermediary	Preventive Care
Quality ID #112	Breast Cancer Screening	CMS Web Interface*	APM Entity/Third Party Intermediary	Preventive Care
Quality ID #438	Statin Therapy for the Prevention and Treatment of Cardiovascular Disease	CMS Web Interface*	APM Entity/Third Party Intermediary	Mgt. of Chronic Conditions
Quality ID #370	Depression Remission at Twelve Months	CMS Web Interface*	APM Entity/Third Party Intermediary	Treatment of Mental Health

[a] *Statin Therapy for the Prevention and Treatment of Cardiovascular Disease* (Quality ID #438), *Depression Remission at Twelve Months* (Quality ID #370), and *Preventive Care and Screening: Tobacco Use: Screening and Cessation Intervention* (Quality ID #226) do not have benchmarks and therefore will not be scored for performance year 2022; however, they are required to be reported to complete the Web Interface dataset.

*ACOs will have the option to report via the Web Interface for the 2022, 2023, and 2024 performance years only.

Additional information about MIPS APMs and the APP for performance year 2022 is available in the CY 2022 PFS Final Rule[3] and on the Quality Payment Program website at https://qpp.cms.gov/apms/mips-apms or https://qpp.cms.gov/mips/apm-performance-pathway.

QCDR Measures Approved for 2022 MIPS Reporting

QCDRs are registry vendors approved by CMS to expand reporting options for MIPS eligible clinicians, including those without sufficient MIPS quality measures applicable to their specialties. QCDRs may report on MIPS quality measures and/or measures developed for those registries and submitted for CMS consideration. For the 2022 MIPS performance period, CMS approved 49 QCDRs, listed with corresponding approved measures in the *2022 Qualified Clinical Data Registries (QCDRs) Qualified Posting*[44] at https://qpp.cms.gov/about/resource-library.

Twenty-eight of 49 unique QCDRs approved for 2022 reporting focus on clinical specialties prioritized in the MDP or subsequent gap analyses, including general medicine/crosscutting. The counts in Table 6 add up to more than 28 because some QCDRs are applicable to more than one prioritized specialty.

Each QCDR has at least one outcome or other high-priority measure among six or more quality measures, consistent with the 2022 requirement for eligible clinicians reporting under MIPS. The CY 2022 PFS Final Rule established that a QCDR measure must be fully tested for reliability and validity at the clinician level to be considered for an MVP in the Quality Payment Program.[3(p. 65407)] For a QCDR measure to be considered for future use in an MVP, testing data must be received by the end of the annual QCDR Self-Nomination Period, typically July 1–September 1.[45]

Table 6: QCDRs Applicable to MDP-Prioritized Specialties

Specialty	# of QCDRs
Allergy/Immunology	1
Emergency medicine	6
General medicine/Crosscutting	5
Mental health/Substance use	5
Neurology	3
Oncology	3
Orthopedic surgery	4
Palliative care	1
Pathology	2
Physical medicine and rehabilitation	8
Radiology	5
Rheumatology	2

Advanced APM Quality Measures

The Center for Medicare & Medicaid Innovation (CMS Innovation Center) works in consultation with clinicians to test new payment and service delivery models. Models are designed to reduce expenditures while preserving or enhancing the quality of care for beneficiaries. Eligible clinicians who achieve Qualifying APM Participant (QP) status in the Advanced APM track of the Quality Payment Program are excluded from the MIPS reporting requirements and payment adjustment and receive a 5 percent lump-sum incentive payment during the corresponding payment year through payment year 2024. A differential payment update under the PFS will apply in payment years beginning in 2026.[3(p. 65375)]

One criterion for Advanced APMs is that they must base payment for items and services in part on MIPS-comparable quality measures, which CMS has interpreted as measures that are reliable and valid and have an evidence-based focus[46]; at least one of those must be an outcome measure. See *CMS Advanced APM Quality Measures Inventory* (Appendix E) for a list of measures for each model included in the 2022 Quality Payment Program.

6. Conclusion

The MDP Annual Report updates stakeholders on the progress made in fulfilling the goals of the MDP and describes efforts to develop CMS-funded clinician quality measures for use in the Quality Payment Program, as required by statute. Twenty-five quality measures were completed during FY 2021; four were in development—two of which were electronically specified. The CY 2022 PFS Final Rule finalizes 200 MIPS measures[3(p. 65687-65698)] for the current performance year and anticipates the approval of 10 Advanced APMs.[3(p. 65638),4] Forty-nine QCDRs were approved through a separate review process.

This report documents quality measurement activities during the second year of the public health emergency. Despite widespread availability of effective and safe vaccines, COVID-19 continued to adversely affect health care providers, beneficiaries, and systems of care. CMS' response to the national emergency produced a well-received outcome for Medicare beneficiaries: expanded access to telehealth services. Accommodating a dramatic shift in utilization, CMS provided new encounter codes and designated 39 eCQMs as telehealth-eligible to facilitate accountability for this mode of health services.

The public health emergency highlighted stark disparities throughout the health care system that CMS has committed to combat by seeking to identify, understand, and address social risk factors that contribute to health outcomes. CMS's approach to advancing health equity is integral to quality improvement and performance measurement activities, including the collection and assessment of social risk factor data. Culminating a three-year project in 2021, the NQF *Social Risk Factor Trial Final Report*[19] provides further guidance on the treatment of social risk factors within quality measurement. Individual assessment of performance measures for potential social risk factor adjustment is among the report's recommendations to CMS, along with a call to all providers, payers, and stakeholders to provide more complete data (e.g., race/ethnicity) to assess disparities and help determine appropriate risk adjustment.

A 2022 MDP environmental scan and gap analysis is planned to examine the landscape of quality measures within clinical areas that CMS has prioritized: behavioral health, diabetes, HIV/AIDS, hypertension, kidney disease, and women's health and maternity care. The information gathering will support development of the future state of the clinician program, MIPS Value Pathways (MVPs).

CMS also identified a range of high-priority specialties, clinical conditions, and topics as measure gaps in its annual publication *Program-Specific Measure Needs and Priorities: 2021 Measures Under Consideration List*.[43] Noted areas for MIPS include maternal health, behavioral health, diabetes–amputation prevention, and health equity and social determinants of health.

Combined, these efforts support the vision of the Measure Development Plan and advancement of the Quality Payment Program. Plans to transition eligible clinicians to MVPs will reduce reporting burden and foster meaningful comparisons of quality throughout the health care system. Importantly, by championing health equity as a top agency priority, CMS is committed to investigate and mitigate factors independent of provider performance that compromise the quality and outcomes of health care.

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