2016 Physician Quality Reporting System (PQRS) Measure-Applicability Validation (MAV) Process for Claims-Based Reporting of Individual Measures

06/08/2016

2016 PQRS MEASURE-APPLICABILITY VALIDATION (MAV) PROCESS FOR CLAIMS-BASED REPORTING

The 2016 Physician Quality Reporting System (PQRS) requires individual eligible professionals to report at least 9 measures covering 3 National Quality Strategy (NQS) domains within the January 1, 2016 through December 31, 2016 reporting period. Currently the Physician Quality Reporting System (PQRS) is comprised of 282 measures, many of which are broadly applicable across specialties while other measures are specialty specific. Although extremely rare, the Centers for Medicare & Medicaid Services (CMS) recognize that a limited number of individual eligible professionals may not be able to identify 9 measures covering 3 domains that are applicable to their practice. This should be an exception and individual eligible professionals are encouraged to report a full complement of performance measures and should not use the MAV process to minimize their reporting requirement. CMS fully expects individual eligible professionals to report a full complement of 9 measures covering 3 domains and to only use the MAV processes presented here when reporting 9 measures covering 3 domains is simply not appropriate or possible.

The purpose of this guidance document is to carefully delineate the MAV processes and requirements as it pertains to PQRS reporting via claims for individual eligible professionals that are unable to report on 9 measures covering 3 domains. See the MAV Glossary for additional terms and review Table 1 for measure-specific information.

The objective of claims-based MAV is for CMS to validate that there were no other measures applicable to the individual eligible professional's practice. This is done by reviewing the reported measures linked to measure clusters, which are groups of measures that are related and hence applicable to a practice. Additional measure(s) or domain(s) that may have been applicable to the individual eligible professional's practice may be identified by this two-step validation process:

Step 1: Clinical/Domain Relation Test
And
Step 2: Minimum Threshold Test

The MAV process exists to help individual eligible professionals who might practice in specialties that have a limited number of measures for which they can report, to appropriately avoid the payment adjustments. However, MAV is an analytically complex process and while it may benefit some individual eligible professionals, it may also validate that some individual eligible professionals should be reporting more measures than they currently report, which would then mean that the 2018 payment adjustment may apply.

Individual eligible professionals that report less than 9 measures covering 3 domains would be subject to MAV. If the individual eligible professional passes MAV, they would avoid the 2018 PQRS payment adjustment. For those individual eligible professionals who fail MAV, the 2018 PQRS payment adjustment would apply. Review Case Study 1 for an example of how CMS would apply MAV.

Case Study 1: Ophthalmologist - When and How MAV Applies for Claims Reporting

If an ophthalmologist satisfactorily reports Measures #130, #226, and #317 and does not report on any other measures, then CMS will analyze claims data to complete the

1) Clinical relation/domain test, and the
2) Minimum threshold test.

MAV is only applied if the ophthalmologist satisfactorily reports on 1 to 8 measures or 9 or more measures covering less than 3 domains. If the ophthalmologist reports on at least 9 measures across 3 domains, then MAV does not apply.

> **Note:** If the ophthalmologist does not report at least 1 cross-cutting measure (when applicable) then that individual provider *with face-to-face encounters* will be automatically subject to the 2018 PQRS payment adjustment and MAV will not be utilized.

Step 1, when claims-based MAV applies, CMS analyzes claims based data to evaluate if there are any other measures or domains that could have been applicable based on the clinical clusters as represented below. PQRS Measure #130 is found in Cluster 3: Lung Care, Cluster 18: General Care, and Cluster 19: Preventive Care and Measure #226 is found in Cluster 5: Cancer Care and Cluster 18: General Care.

Next, CMS would consider **Step 2** of the claims-based MAV process which is the minimum threshold test. CMS will evaluate the claims data to see if there were at least 15 denominator eligible patients (or encounters) for the other measures within the clinical clusters of Lung Care, Cancer Care, General Care, and Preventive Care. If there were at least 15 denominator eligible patients (or encounters), based on the codes reported by the ophthalmologist, then CMS concludes that the ophthalmologist should have reported that measure(s) found within the Lung Care, Cancer Care, General Care, and Preventive Care Clusters and he/she would "fail" MAV. "Failing MAV" means the ophthalmologist would be subject to the 2018 payment adjustment. If there were less than 15 denominator eligible patients (or encounters), then CMS would not hold that ophthalmologist accountable for reporting the measure(s) and he/she would "pass" MAV. By "passing" MAV, the ophthalmologist may avoid the 2018 PQRS payment adjustment.

For example, Dr. Smith, an ophthalmologist, feels that the only applicable measures for him to report are Measures #130, #226, and #317. He reports these measures based on the CPT code 92012. This CPT code is found in the denominator criteria of Measures #130, #226, and #317. Since he has satisfactorily reported on Measures #130, #226, and #317, he is subject to the MAV analysis. CMS then evaluates which clinical clusters may be applicable to Dr. Smith based on the clusters as they are represented in the claims-based MAV document. If CMS determines that Dr. Smith may have been able to report the measures in Clusters: 3, 5, 18, and 19; CMS then performs the minimum threshold test analysis. Dr. Smith codes billable CPT codes related to ocular procedures. CMS would analyze the claims data to determine if Dr. Smith had at least 15 denominator eligible patients (or encounters) for any of the other measures contained within clinical Clusters 3, 5, 18 and, 19. If CMS evaluates that Dr. Smith did not have claims data that meet the denominators of any of the other measures found within the applicable clusters, he would then "pass" MAV.

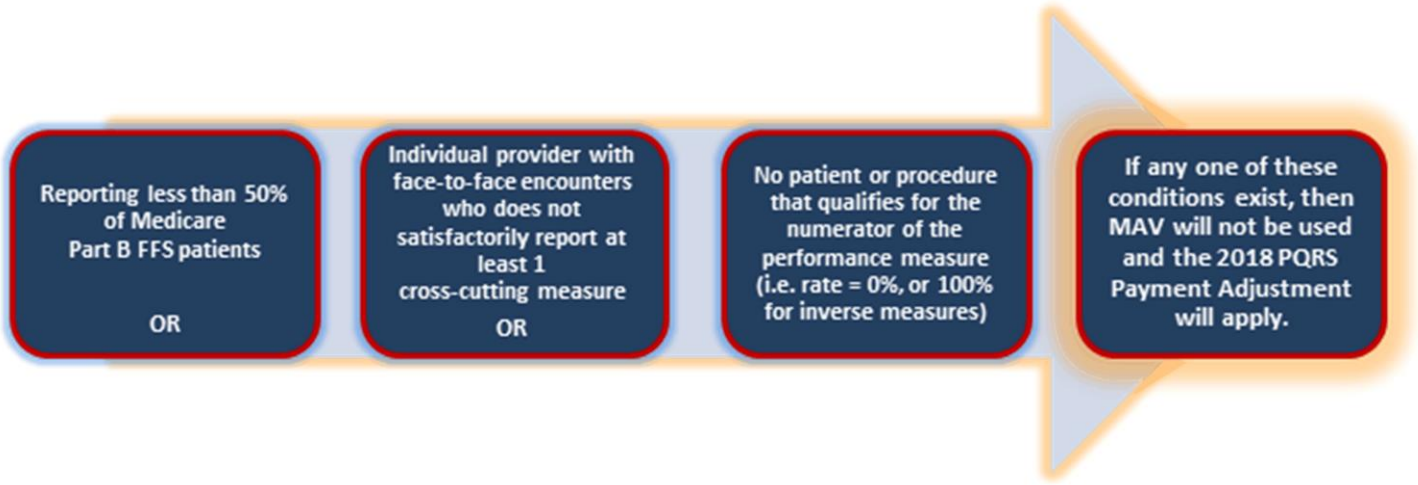
Figure 1: Eligibilty for MAV

MAV is Only Applied after the Following are Met (See Figure 1: Eligibility for MAV):

- Individual eligible professionals who satisfactorily report quality data codes (QDCs) for **less than 9 measures or measures covering less than 3 domains**.

  Note: MAV is a process to review and validate an individual eligible professional's inability to report on 9 measures covering 3 domains. CMS will analyze claims data to validate, using the clinical relation/domain test and the minimum threshold test to confirm that more measures and/or domains were not applicable to the individual eligible professional's practice. If additional measures or domains are found to be applicable through MAV, the individual eligible professional would be subject to the 2018 PQRS payment adjustment.
- Individual eligible professionals must satisfactorily report on at least 50% of their eligible patients or encounters for each measure.
- At least **1 cross-cutting measure** must be satisfactorily reported for those individual providers with **face-to-face encounters**. CMS will analyze claims data to determine if at least 15 cross-cutting measure denominator eligible encounters can be associated with the individual eligible professional. If it is determined that at least 1 cross-cutting measure was **not** reported, the individual eligible professional with face-to-face encounters will be automatically subject to the 2018 PQRS payment adjustment and MAV will not be utilized for that individual eligible professional. For those individual eligible professionals with no face-to-face encounters, MAV will be utilized for those that report less than 9 measures and/or less than 3 domains.
- For measures reported there must be at least 1 patient or procedure in the numerator of the rate for the measure to be counted as meeting performance. For measures that move towards 100% to indicate higher quality outcome, the rate must be greater than 0%. For inverse measures where higher quality moves the rate towards 0% the rate must be less than 100%. Individual eligible professionals who fail these criteria for a reported measure will **not** proceed through MAV and will be subject to the 2018 PQRS payment adjustment.

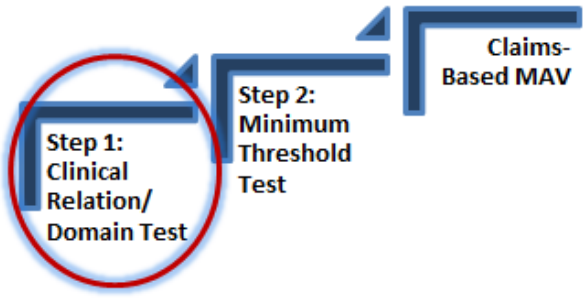
Figure 2: 2018 PQRS Payment Adjustment Will Apply



Please refer to Figure 5 for the *2016 Physician Quality Reporting System (PQRS) Measure-Applicability Validation (MAV) Process Flow for Claims-Based Reporting of Individual Measures for Payment Adjustment* for further guidance.

The Measure-Applicability Validation process, shown in Figure 3 and Figure 4, has two distinct steps.

Figure 3: Step 1, Clinical Relation/Domain Test, for Claims-Based MAV



Step 1: Clinical Relation/Domain Test

The clinical relation/domain test is the first step in the two-step, claims-based MAV process that will be applied to those who are subject to the validation process of satisfactorily reported measures **OR** domains (i.e. those individual eligible professionals that reported less than 9 measures or measures covering less than 3 domains).

This test is based on 2 factors:

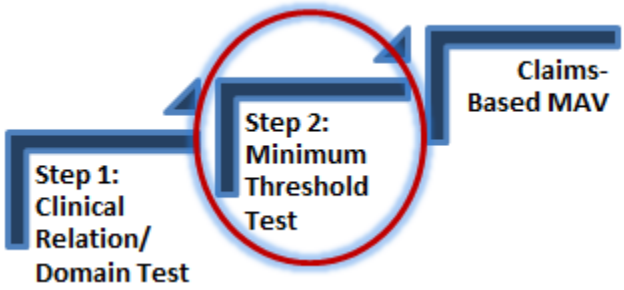
1. How the measure(s) satisfactorily reported currently apply within the individual eligible professionals practice, *and*
2. The concept that if 1 measure in a cluster of measures related to a particular clinical topic or individual eligible professional service is applicable to an individual eligible professional's practice, then other clinically related measures within the clinical cluster **may** also be applicable. Clinical clusters within MAV are measures that are clinically related based by patient type, procedure, or possible clinical action.

For those individual eligible professionals who satisfactorily submit QDCs for 9 PQRS measures covering **less than 3 domains**, there will be a determination if additional measures with additional domains may also apply to the individual eligible professional based on the clinical cluster. If no other measures or domains are identified through this process, the individual eligible professional would avoid the 2018 PQRS payment adjustment. Case Study 2 shows how the clinical relation/domain test will be applied for individual eligible professionals reporting via claims:

Case Study 2: Pathologist - How the Claims-based MAV Clinical Relation/Domain Test Will Be Applied:

A pathologist, identified as an individual eligible professional who is subject to MAV due to meeting the pre-requisites for MAV, reported QDCs for Measure #395, one of the PQRS measures related to pathology. CMS will determine if the reported measure is contained within a cluster or is excluded from a cluster. If the measure is contained within a cluster, then CMS will analyze claims data to evaluate if any of the other measures or domains within the clinical cluster may have also been applicable. If there are other measure(s)' denominators criteria that are applicable, CMS will proceed to Step 2 (Minimum Threshold Test) to determine whether any of the other pathology measure(s) in the pathology cluster could also have been submitted. CMS determined that the reported measure was part of a measure cluster for pathologists. Upon further analysis, CMS determined that some of the other measures in the cluster (left unreported by the physician) would be applicable to the physician's practice and could have been reported.

Figure 4: Step 2, Minimum Threshold Test, for Claims-Based MAV



Step 2: Minimum Threshold Test

Figure 4 shows the second step of the MAV process which is applied to those individual eligible professionals who have had additional measures or domains identified during the first step (the clinical relation/domain test) that could have been reported. The minimum threshold test will be applied to these individual eligible professionals.

The minimum threshold test is based on the concept that during the 2016 PQRS reporting period (January 1, 2016 through December 31, 2016), if an individual eligible professional treated more than a certain number of Medicare patients meeting the denominator criteria of any of the other measures within the clinical cluster (that is, the individual eligible professional treated more than a "threshold" number of patients or encounters), then that individual eligible professional should have reported the QDCs for that measure. The common minimum threshold, based on statistical and clinical frequency considerations, will not be less than 15 patients (or encounters) for the reporting period for each 2016 PQRS measure.

Case Study 3: Pathologist - How the Claims-Based MAV Minimum Threshold Test Will Be Applied:

The Pathologist, from Case Study 2, reported Measure #395 Lung Cancer Reporting (Biopsy/Cytology Specimens) from Cluster 14: Pathology Lung Cancer. Based on Cluster 14, CMS will evaluate (Step 1 – the Clinical Relation/Domain Test) if Measure #396 Lung Cancer Reporting (Resection Specimens) could have been reported.

CMS then proceeds to the next step (Step 2 – Minimum Threshold Test) which will evaluate if there were at least 15 denominator eligible encounters for Measure #396 for the individual eligible professional. If there are at least 15 encounters, then CMS will conclude that this measure was applicable and should have been reported by the Pathologist. If less than 15 encounters are identified, then CMS would not hold this individual eligible professional accountable for reporting Measure #396.

During the reporting period, CMS will determine a minimum threshold for each individual PQRS measure based on analysis of Medicare Part B FFS claims data. However, no threshold will fall below the common threshold of 15 patients (or encounters) described above.

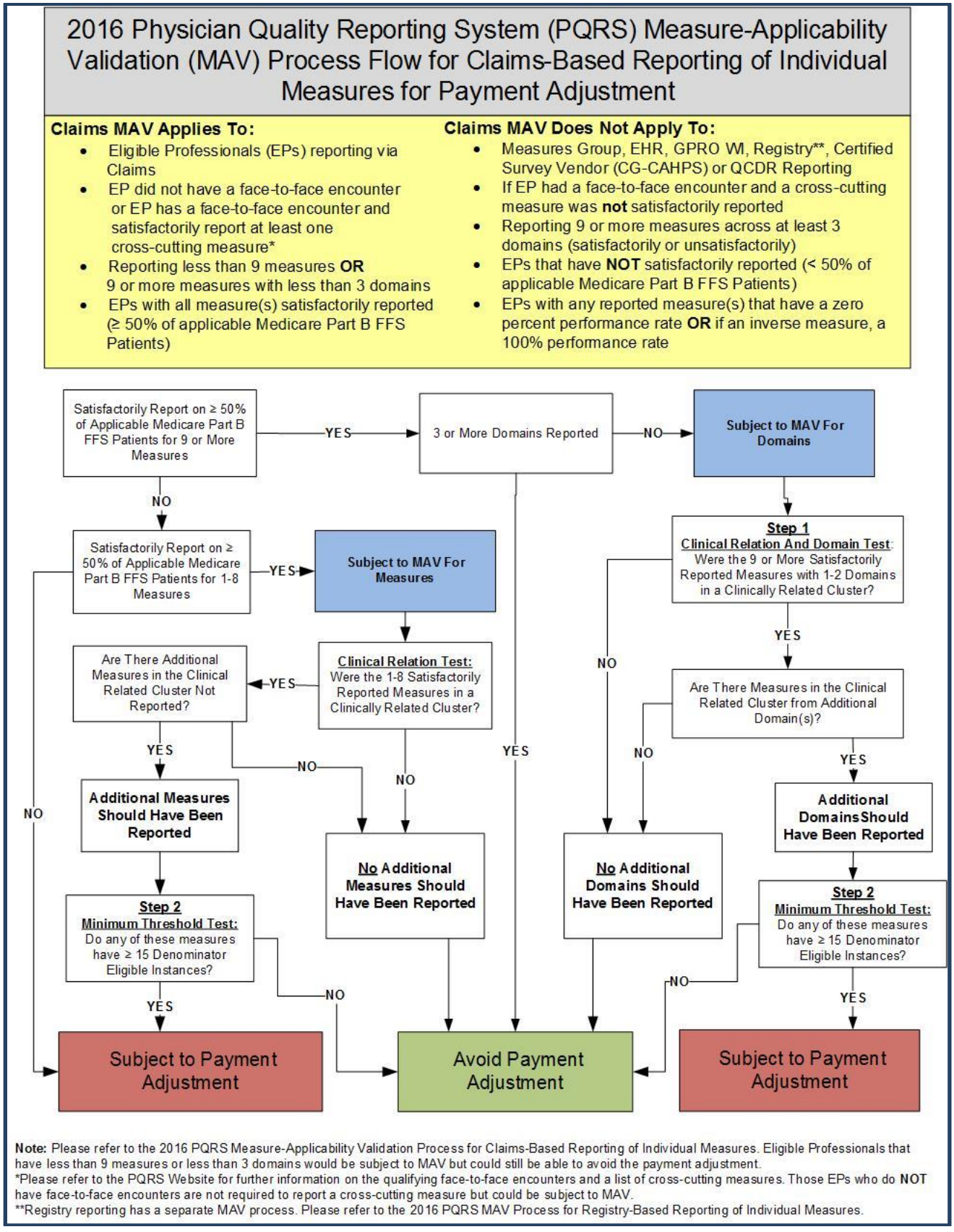
Other Program Considerations

QDCs submitted on claims must be supported in medical record documentation. Other laws and regulations relating to Medicare program may also apply to PQRS.

CMS may determine that it is necessary to modify the measure-applicability validation process after the start of the 2016 reporting period. However, any changes will result in the MAV process being applied more leniently, thereby

1. Allowing a greater number of eligible professionals to pass validation, *and*
2. Causing no eligible professional who would otherwise have passed, to fail. Any made modifications will be published on the CMS PQRS website as soon as possible after determination that a change is needed.

Figure 5: Claims-Based MAV Process Flow



Claims-Based MAV Glossary of Terms

Claims-Based MAV Minimum Threshold
The 15-minimum patient or encounter threshold is only related to CMS' determination pertaining to claims if the other measure(s) within the clinical cluster should have been reported by the individual eligible professional.

Cluster
Measures related to a particular clinical topic or individual eligible professional service that is applicable to a specific, individual eligible professional.

Domains
Represent the Department of Health and Human Services' (HHS's) NQS priorities for healthcare quality improvement. A domain is automatically included in the structure of each measure. The 6 NQS domains mirror the 6 priorities of the NQS that are developed for the pursuit of NQS's 3 broad aims:

1. **Better Care:** Improve the overall quality by making health care more patient-centered, reliable, accessible, and safe.
2. **Healthy People/Healthy Communities:** Improve the health of the U.S. population by supporting proven interventions to address behavioral, social, and environmental determinants of health in addition to delivering higher-quality care.
3. **Affordable Care:** Reduce the cost of quality health care for individuals, families, employers, and government.

The 6 NQS Domains associated with the PQRS quality measures are as follows:

1. Patient Safety
2. Person and Caregiver-Centered Experience and Outcomes
3. Communication and Care Coordination
4. Effective Clinical Care
5. Community/Population Health
6. Efficiency and Cost Reduction

Eligible professional (EP)
Determine if you are eligible to participate for purposes of the PQRS incentive payment and payment adjustment. A list of eligible medical care professionals considered eligible to participate in PQRS is available on the CMS.gov Web site at this path: **CMS.gov/PQRS> How To Get Started>Eligible Medical Care Professionals**. Read this list carefully, as not all entities are considered "eligible professionals" because they are reimbursed by Medicare under other fee schedule methods than the Physician Fee Schedule (PFS).

Satisfactorily Reporting Criteria
In the instance an individual eligible professional reports on at least 9 measures covering at least 3 domains MAV would not be triggered. MAV is only triggered in the instance an individual eligible professional satisfactorily reports on less than 9 measures covering less than 3 domains. The following components would be an indication of satisfactorily reporting:

- Each measure reported must be at least 50% of the Medicare Part B Fee-for-Service (FFS) denominator eligible patients (or encounters) for patients seen during the reporting period to which the measure applies.
- Any measure with a 0% performance rate, unless it is an inverse measure, will not be counted as satisfactorily reporting.
  - *If an individual eligible professional reports 9 measures covering 3 domains but a measure is calculated with a zero percent performance rate, CMS will conclude that they did not satisfactorily report and MAV would not be triggered. If the individual eligible professional reported 10 measures but 1 measure was a 0% performance rate, CMS would determine the individual eligible professional did satisfactorily report as long as all the other reporting satisfactorily criteria were met.*
- Refer to the *Code of Federal Regulations* statute §414.90 Physician Quality Reporting System (PQRS) for broader application of the term satisfactorily reporting for PQRS

Measure-Applicability Validation (MAV) Training Course
The 2016 Measure-Applicability Validation (MAV) self-paced training course is designed for individual EPs reporting measures via claims or an individual EP or group practice reporting via a registry vendor. The course presents a high-level overview of the MAV process and how it will apply for 2016 PQRS reporting purposes.

The course includes the following four modules:
Module 1: MAV Overview
Module 2: Knowing When MAV Applies
Module 3: MAV Analysis Process
Module 4: MAV Scenarios

The course also provides real-world MAV scenarios, in addition to providing helpful information on how to avoid the 2018 PQRS payment adjustment.

To start this course click on the following link: **Measure-Applicability Validation Training Course** or click **Analysis and Payment** to view the PowerPoint presentation.

Clusters of Related Measures

Figure 6:

Example of Cluster of Clinically Related Measures

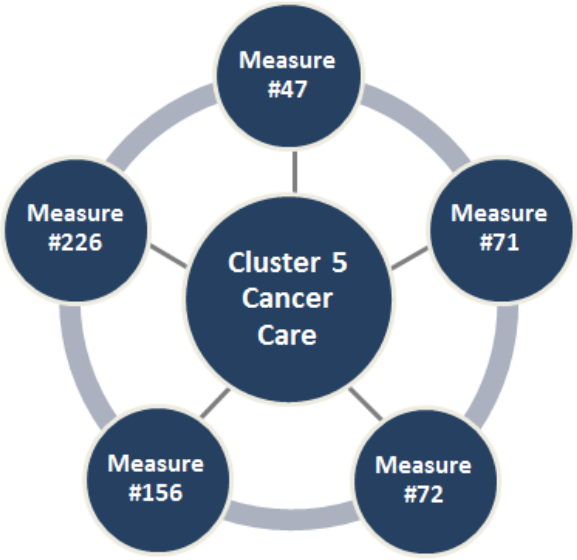


Table 1: PQRS Clusters of Clinically Related Measures Used in MAV Step 1: Clinical Relation/Domain Test of the 2016 Claims-Based Reporting of Individual Measures

Cluster Number	Cluster Title	Measure Number	Domain	Measure Title
1	Urinary Incontinence Care	48	Effective Clinical Care	Urinary Incontinence: Assessment of Presence or Absence of Urinary Incontinence in Women Aged 65 Years and Older
		50	Person and Caregiver-Centered Experience and Outcomes	Urinary Incontinence: Plan of Care for Urinary Incontinence in Women Aged 65 Years and Older
2	Diabetic Care	1	Effective Clinical Care	Diabetes: Hemoglobin A1c Poor Control
		117	Effective Clinical Care	Diabetes: Eye Exam
		128	Community/ Population Health	Preventive Care and Screening: Body Mass Index (BMI) Screening and Follow-Up Plan

Cluster Number	Cluster Title	Measure Number	Domain	Measure Title
3	Lung Care	51	Effective Clinical Care	Chronic Obstructive Pulmonary Disease (COPD): Spirometry Evaluation
		52	Effective Clinical Care	Chronic Obstructive Pulmonary Disease (COPD): Inhaled Bronchodilator Therapy
		130	Patient Safety	Documentation of Current Medications in the Medical Record
4	Emergency Care	54	Effective Clinical Care	Emergency Medicine: 12-Lead Electrocardiogram (ECG) Performed for Non-Traumatic Chest Pain
		254	Effective Clinical Care	Ultrasound Determination of Pregnancy Location for Pregnant Patients with Abdominal Pain
		255	Effective Clinical Care	Rh Immunoglobulin (Rhogam) for Rh-Negative Pregnant Women at Risk of Fetal Blood Exposure
5	Cancer Care	47	Communication and Care Coordination	Care Plan
		71	Effective Clinical Care	Breast Cancer: Hormonal Therapy for Stage IC - IIIC Estrogen Receptor/Progesterone Receptor (ER/PR) Positive Breast Cancer
		72	Effective Clinical Care	Colon Cancer: Chemotherapy for AJCC Stage III Colon Cancer Patients
		156	Patient Safety	Oncology: Radiation Dose Limits to Normal Tissues
		226	Community/Population Health	Preventive Care and Screening: Tobacco Use: Screening and Cessation Intervention
		Note: When reporting #47 and/or #226, they are not subject to MAV for this clinical cluster. It is expected to report these measures if #71, #72, or #156 are reported.		
6	Osteoporosis Care	24	Communication and Care Coordination	Communication with the Physician or Other Clinician Managing On-going Care Post-Fracture for Men and Women Aged 50 Years and Older
		39	Effective Clinical Care	Screening for Osteoporosis for Women Aged 65-85 Years of Age
		41	Effective Clinical Care	Osteoporosis: Pharmacologic Therapy for Men and Women Aged 50 Years and Older
		418	Effective Clinical Care	Osteoporosis Management in Women Who Had a Fracture
7	Ear, Nose, & Throat Care	91	Effective Clinical Care	Acute Otitis Externa (AOE): Topical Therapy
		93	Efficiency and Cost Reduction	Acute Otitis Externa (AOE): Systemic Antimicrobial Therapy – Avoidance of Inappropriate Use
8	Pathology	99	Effective Clinical Care	Breast Cancer Resection Pathology Reporting: pT Category (Primary Tumor) and pN Category (Regional Lymph Nodes) with Histologic Grade
		100	Effective Clinical Care	Colorectal Cancer Resection Pathology Reporting: pT Category (Primary Tumor) and pN Category (Regional Lymph Nodes) with Histologic Grade
		249	Effective Clinical Care	Barrett's Esophagus

Cluster Number	Cluster Title	Measure Number	Domain	Measure Title
		250	Effective Clinical Care	Radical Prostatectomy Pathology Reporting
		251	Effective Clinical Care	Quantitative Immunohistochemical (IHC) Evaluation of Human Epidermal Growth Factor Receptor 2 Testing (HER2) for Breast Cancer Patients
9	Diagnostic Imaging	145	Patient Safety	Radiology: Exposure Time Reported for Procedures Using Fluoroscopy
		146	Efficiency and Cost Reduction	Radiology: Inappropriate Use of "Probably Benign" Assessment Category in Mammography Screening
		147	Communication and Care Coordination	Nuclear Medicine: Correlation with Existing Imaging Studies for All Patients Undergoing Bone Scintigraphy
		195	Effective Clinical Care	Radiology: Stenosis Measurement in Carotid Imaging Reports
		225	Communication and Care Coordination	Radiology: Reminder System for Screening Mammograms
		436	Effective Clinical Care	Radiation Consideration for Adult CT: Utilization of Dose Lowering Techniques
10	Appropriate Follow-Up Imaging	405	Effective Clinical Care	Appropriate Follow-Up Imaging for Incidental Abdominal Lesions
		406	Effective Clinical Care	Appropriate Follow-Up Imaging for Incidental Thyroid Nodules in Patients
11	Eye Care	12	Effective Clinical Care	Primary Open-Angle Glaucoma (POAG): Optic Nerve Evaluation
		14	Effective Clinical Care	Age-Related Macular Degeneration (AMD): Dilated Macular Examination
		19	Communication and Care Coordination	Diabetic Retinopathy: Communication with the Physician Managing Ongoing Diabetes Care
		140	Effective Clinical Care	Age-Related Macular Degeneration (AMD): Counseling on Antioxidant Supplement
		141	Communication and Care Coordination	Primary Open-Angle Glaucoma (POAG): Reduction of Intraocular Pressure (IOP) by 15% OR Documentation of a Plan of Care
12	Surgical Care	21	Patient Safety	Perioperative Care: Selection of Prophylactic Antibiotic – First OR Second Generation Cephalosporin
		22	Patient Safety	Perioperative Care: Discontinuation of Prophylactic Parenteral Antibiotics (Non-Cardiac Procedures)
		23	Patient Safety	Perioperative Care: Venous Thromboembolism (VTE) Prophylaxis (When Indicated in ALL Patients)
		47	Communication and Care Coordination	Care Plan

Note: *When reporting #47, it is not subject to MAV for this clinical cluster. It is expected to report this measure if #21, #22, or #23 are reported.*

2016 PQRS Measure-Applicability Validation (MAV) for Claims-Based Reporting-Appendix A
Measures within a cluster

Cluster Number	Cluster Title	Measure Number	Domain	Measure Title
13	Chiropractic Care & Physical/Occupational Therapy	131	Communication and Care Coordination	Pain Assessment and Follow-Up
		182	Communication and Care Coordination	Functional Outcome Assessment
14	Pathology Lung Cancer	395	Communication and Care Coordination	Lung Cancer Reporting (Biopsy/ Cytology Specimens)
		396	Communication and Care Coordination	Lung Cancer Reporting (Resection Specimens)
15	Gynecological Care	422	Patient Safety	Performing Cystoscopy at the Time of Hysterectomy for Pelvic Organ Prolapse to Detect Lower Urinary Tract Injury
		429	Patient Safety	Pelvic Organ Prolapse: Preoperative Screening for Uterine Malignancy
16	Headache Care	419	Efficiency and Cost Reduction	Overuse of Neuroimaging for Patients with Primary Headache And a Normal Neurological Examination
		435	Effective Clinical Care	Quality of Life Assessment for Patients with Primary Headache Disorders
17	Immunization Care	110	Community/ Population Health	Preventive Care and Screening: Influenza Immunization
		111	Community/ Population Health	Pneumonia Vaccination Status for Older Adults
18	General Care	130	Patient Safety	Documentation of Current Medications in the Medical Record
		226	Community/Population Health	Preventive Care and Screening: Tobacco Use: Screening and Cessation Intervention
		134	Community/Population Health	Preventive Care and Screening: Screening for Clinical Depression and Follow-Up Plan
		Note: *When submitting #130 and/or #226, they are not subject to MAV for this clinical cluster. It is expected to submit those measures if #134 is submitted.*		
19	Preventive Care	112	Effective Clinical Care	Breast Cancer Screening
		113	Effective Clinical Care	Colorectal Cancer Screening
		130	Patient Safety	Documentation of Current Medications in the Medical Record
		317	Community/Population Health	Preventive Care and Screening: Screening for High Blood Pressure and Follow-Up Documented
		Note: *When submitting #130 or #317, they are not subject to MAV for this clinical cluster. It is expected to submit these measures if #112 and/or #113 are submitted. There is no requirement for both #112 and #113 to be reported.*		