



# **Medicare Special Needs Plans Performance Results: HEDIS 2017**

**September 28, 2017**

**Prepared for**

Heather Kilbourne, COR  
Centers for Medicare & Medicaid Services  
Medicare Drug and Health Plan Contract Administration Group  
7500 Security Boulevard, Mail Stop C4-22-04  
Baltimore, MD 21244-1850

**Prepared by**

National Committee for Quality Assurance  
1100 13th Street, NW, Third Floor  
Washington, DC 20005

**CMS Contract No. HHSM-500-2016-00061C  
Deliverable 4.4**

## Table of Contents

Executive Summary.....	i
Overview.....	i
Findings.....	i
Objectives and Background .....	1
Objectives.....	1
SNP Overview .....	1
HEDIS Results.....	3
SNP Program Performance Changes HEDIS 2015–2017 (Tables 3a and 3b) .....	3
SNP Program and MA Program Performance (Table 4).....	11
SNP Program Performance by SNP Type (Table 5).....	14
SNP Program Performance by Enrollment Size (Table 6).....	19
SNP Benefit Package Performance (Table 7) .....	24
SNP Benefit Package Performance Changes HEDIS 2015–2017 (Table 8).....	28
SNP HEDIS Data Submissions by Measure (Tables 9a and 9b) .....	30
Appendix A: HEDIS Background.....	1
About HEDIS .....	1
Measure Selection.....	1
Data Collection and Validation Process.....	2
Appendix B: HEDIS 2017 Technical Specifications .....	1
Colorectal Cancer Screening (COL) .....	2
Care for Older Adults (COA) .....	6
Use of Spirometry Testing in the Assessment and Diagnosis of COPD (SPR).....	12
Pharmacotherapy Management of COPD Exacerbation (PCE) .....	15
Controlling High Blood Pressure (CBP) .....	19
Persistence of Beta-Blocker Treatment After a Heart Attack (PBH).....	26
Annual Monitoring for Patients on Persistent Medications (MPM).....	30
Medication Reconciliation Post-Discharge (MRP) .....	34
Potentially Harmful Drug-Disease Interactions in the Elderly (DDE) .....	38
Use of High-Risk Medications in the Elderly (DAE) .....	44
Osteoporosis Management in Women Who Had a Fracture (OMW) .....	49
Antidepressant Medication Management (AMM).....	53
Follow-Up After Hospitalization for Mental Illness (FUH).....	57
Board Certification (BCR).....	61
Plan All-Cause Readmissions (PCR).....	65
Appendix C: Reporting Plan All-Cause Readmissions .....	1

## Executive Summary

### Overview

This report provides results of measurement of care provided by Special Needs Plans (SNP) to Medicare beneficiaries using Healthcare Effectiveness Data and Information Set (HEDIS<sup>®1</sup>) measures. (See Appendix A for information about HEDIS.)

As of February 2016, there were 578 SNPs participating in the program; 464 of these were required to report HEDIS 2017 results by the Centers for Medicare & Medicaid Services (CMS). Results for this review period cover 32 HEDIS measures: 26 clinical performance measures, 4 board certification measures and 2 utilization measures. All measures were selected for their relevance to SNP populations. As required, results were audited by NCQA-Certified HEDIS Compliance Auditors. HEDIS data reflect care provided in 2016 and reported in HEDIS 2017. This report compares HEDIS 2017 results with those reported in 2015 and 2016. It also compares performance among different SNP types and compares SNP performance to the performance of the Medicare Advantage (MA) program as a whole.

### Findings

**All SNPs reporting in any of the three years (Table 3a).** Program-wide results for all SNPs were mixed. Trends below account for 32 measures collected in HEDIS 2015–2017. Small increases (even below 1 percentage point) can be statistically significant, given the large number of observations collected.

- **HEDIS 2015: 2017 (Three-Year Trend)**
  - Statistically significant increases: 15 measures.
  - Statistically significant decreases: 2 measures.
- **HEDIS 2016: 2017 (Two-Year Trend)**
  - Statistically significant increases: 11 measures.
  - Statistically significant decreases: 1 measures.

**Highest and Lowest Rates (Table 3a).** The measures with the highest and lowest HEDIS 2017 rates were:

#### Highest Five

1. *Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring* (95.5%).
2. *Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring* (95.3%).
3. *Annual Monitoring for Patients on Persistent Medications—Total Rate* (94.9%).
4. *Care for Older Adults—Pain Screening* (93.4%).
5. *Care for Older Adults—Medication Review* (92.8%).

<sup>1</sup>HEDIS<sup>®</sup> is a registered trademark of the National Committee for Quality Assurance (NCQA).

Lowest Five

1. *Use of Spirometry Testing in the Assessment and Diagnosis of COPD* (33.6%).
2. *Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge* (35.7%).
3. *Medication Reconciliation Post-Discharge* (42.9%).
4. *Potential Harmful Drug Disease Interactions—Dementia* (56.0%).  
(Lower values signify better performance; this is equivalent to 44.0%).
5. *Potential Harmful Drug Disease Interactions—History of Falls* (54.6%).  
(Lower values signify better performance; this is equivalent to 45.4%).

Three of the five measures with the highest performance are *Annual Monitoring for Patients on Persistent Medications* indicators. All five are medication management measures. NCQA will remove *Annual Monitoring for Patients on Persistent Medications* (which includes five indicators), from HEDIS next year for the Medicare product line. This decision was made because of high performance with minimal variation across Medicare plans, and was recommended by stakeholder consensus, including the Geriatric Measurement Advisory Panel, the Technical Measurement Advisory Panel and public comment feedback.

The five measures with the lowest performance are also reported at the MA contract-level.

**Largest Significant Changes (Table 3a).** The measures listed below show the largest statistically significant changes, positive or negative, from HEDIS 2015–2017.

Largest Five Increase Among All Reporters

1. *Care for Older Adults—Functional Status Assessment* (8.4 percentage points).
2. *Osteoporosis Management in Women Who Had a Fracture* (8.3 percentage points).
3. *Medication Reconciliation Post-Discharge* (7.3 percentage points).
4. *Care for Older Adults—Advance Care Planning* (6.4 percentage points).
5. *Care for Older Adults—Pain Screening* (4.8 percentage points).

Largest Five Decrease Among All Reporters

1. *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (–3.4 percentage points).
2. *Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event* (–1.9 percentage points).
3. Not applicable—No other measure showed a statistically significant decrease.
4. Not applicable—No other measure showed a statistically significant decrease.
5. Not applicable—No other measure showed a statistically significant decrease.

Three of the five measures with the largest increases are *Care for Older Adults* measures, which only SNPs collect. The two measures with the largest decreases are *Pharmacotherapy of COPD Exacerbation* measures.

**SNPs reporting HEDIS 2015–2017 (Table 3b).** While the information above (Table 3a) includes all reported HEDIS results, the results below (Table 3b) include HEDIS results only from SNPs that report in all of the past three years, HEDSI 2015-2017. Results for SNPs that reported in all three years were about the same as plans that reported in any of the three years. Trends below account for 32 measures collected in HEDIS 2015–2017. Small increases (even below 1 percentage point) can be statistically significant, given the large number of observations collected.

- **HEDIS 2015: 2017 (Three-Year Trend)**
  - Statistically significant increases: 13 measures.
  - Statistically significant decreases: 7 measures.
- **HEDIS 2016: 2017 (Two-Year Trend)**
  - Statistically significant increases: 11 measures.
  - Statistically significant decreases: 7 measures.

**Highest and Lowest Rates (Table 3b).** The measures with the highest and lowest HEDIS 2017 rates were:

#### Highest Five

1. *Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring* (95.5%).
2. *Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring* (95.4%).
3. *Annual Monitoring for Patients on Persistent Medications—Total Rate* (94.9%).
4. *Care For Older Adults—Pain Screening* (93.3%).
5. *Care For Older Adults—Medication Review* (92.6%).

#### Lowest Five

1. *Use of Spirometry Testing in the Assessment and Diagnosis of COPD* (35.0%).
2. *Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge* (36.8%).
3. *Potentially Harmful Drug-Disease Interactions—Dementia* (54.9%).  
(Lower values signify better performance; this is equivalent to 45.1%).
4. *Medication Reconciliation Post-Discharge* (46.0%).
5. *Potentially Harmful Drug-Disease Interactions—History of Falls* (53.7%).  
(Lower values signify better performance; this is equivalent to 46.3%).

**(Table 3b).** The measures listed below show the largest statistically significant changes, positive or negative, from HEDIS 2015–2017, among three-year reporters.

#### Largest Five Increase Among Three-Year Reporters

1. *Medication Reconciliation Post-Discharge* (7.2 percentage points).
2. *Care for Older Adults—Functional Status Assessment* (6.1 percentage points).
3. *Osteoporosis Management in Women Who Had a Fracture* (5.7 percentage points).
4. *Care for Older Adults—Advance Care Planning* (5.5 percentage points).
5. *Antidepressant Medication Management—Acute Phase* (3.0 percentage points).

#### Largest Five Decrease Among Three-Year Reporters

1. *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (4.7 percentage points).
2. *Active Board Certification—Family Medicine* (3.3 percentage points).
3. *Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event* (2.6 percentage points).
4. *Active Board Certification—Internal Medicine* (1.3 percentage points).
5. *Active Board Certification—Other Physician Specialists* (1.2 percentage points).

**SNP and MA program performance (Table 4).** This table shows SNP program performance for the measures SNP and MA plans are required to report, in the context of overall MA program performance. SNPs report a subset of the full MA HEDIS measures set, so this report compares only the measures that are commonly reported at the SNP benefit-package level and at the MA contract level.

MA program performance was higher than SNP program performance for 22 of 28 measures in 2017, with significant differences for 13 measures. The greatest difference in performance was 13.3 percentage points. Measures with the largest performance gaps between the MA and SNP programs plans were:

- *Medication Reconciliation Post-Discharge* (13.3 percentage points).
- *Controlling High Blood Pressure* (13.0 percentage points).
- *Antidepressant Medication Management—Acute Phase and Continuation Phase* (6.7 and 5.7 percentage points, respectively).
- *Active Board Certification—Geriatrics* (3.9 percentage points).

The SNP program performed higher than the MA program for 6 of 28 measures, with statistically significant differences for 4 measures. The greatest statistically significant difference in performance was 3.7 percentage points.

On measures where SNPs outperformed MA plans, the largest performance gaps included:

- *Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event* (3.7 percentage points).
- *Osteoporosis Management in Women Who Had a Fracture* (1.7 percentage points).
- *Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring and Total Rate* (1.6 percentage points each).

**Note:** MA plans report HEDIS measures at the contract level, which may include SNP beneficiaries because some MA contracts include SNP plan benefit packages. However, these represent a small portion of the overall MA population, as indicated by the eligible population data for each measure. Results were analyzed for statistically significant differences ( $p < 0.05$ ) between SNP and MA contract results.

**Program performance by SNP type (Table 5).** Overall, for HEDIS 2017, D-SNPs had higher rates on 12 measures than the other SNP types, compared to 17 measures for the I-SNPs and 3 measures for C-SNPs.

Performance increased across all SNP types for 11 measures:

- *Controlling High Blood Pressure.*
- *Antidepressant Medication Management—Acute Phase.*
- *Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring.*
- *Annual Monitoring for Patients on Persistent Medications—Total Rate.*
- *Medication Reconciliation Post-Discharge.*
- *Care for Older Adults—Medication Review, Functional Status Assessment and Pain Screening.*
- *Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure.*
- Both *Plan All Cause Readmissions* (statistically significant for all SNP types).

Performance decreased across all SNP types for four measures:

- *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event.*
- *Osteoporosis Management in Women Who Had a Fracture.*
- *Active Board Certification—Family Medicine.*
- *Active Board Certification—Geriatrics.*

D-SNPs showed statistically significant performance improvement for 10 measures (*Controlling High Blood Pressure; Antidepressant Medication Management—Acute Phase; Annual Monitoring for Patients on Persistent Medications—Total Rate; Medication Reconciliation Post-Discharge; Care for Older Adults—Medication Review, Functional Status Assessment, Pain Screening;* and both *Plan All Cause Readmissions* measures) and showed a statistically significant decrease in performance for 2 measures (both *Pharmacotherapy of COPD Exacerbation* measures).

I-SNPs showed statistically significant improvement for four measures (*Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event, Antidepressant Medication Management—Continuation Phase* and both *Plan All Cause Readmissions* measures) and showed a statistically significant decrease in performance for one measure (*Active Board Certification—Geriatrics*).

C-SNPs showed statistically significant improvement on nine measures (*Controlling High Blood Pressure, Persistence of Beta-Blocker Treatment After a Heart Attack, both Follow-Up After Hospitalization for Mental Illness* measures, *Medication Reconciliation Post-Discharge, Care for Older Adults—Medication Review, Functional Status Assessment, both Plan All Cause Readmissions* measures) and a statistically significant decrease in performance for one measure (*Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event*).

**Plan program performance by enrollment size (Table 6).** This table displays program-wide performance for all SNPs by enrollment. The 0–99 enrollment category had the least amount of plans (16 in 2017) and the ≥2,500 enrollment category had the most plans (183 plans in 2017).

#### <99 Enrollment

- Statistically significant increases in two measures: *Care for Older Adults—Advance Care Planning* (25.0 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average ≥65)* (2.69 percentage points).
- Statically significant decreases in one measure: *Plan All-Cause Readmissions (Risk-Adjusted Average <65)* (14.71 percentage points).

#### 100–499 Enrollment

- Statistically significant increases in six measures: *Medication Reconciliation Post-Discharge*, (16.6 percentage points), *Active Board Certification—Family Medicine* (5.7 percentage points), *Active Board Certification—Internal Medicine* (3.6 percentage points) and *Active Board Certification—Other Physician Specialists* (8.1 percentage points), *Plan All-Cause Readmissions (Risk-Adjusted Average ≥65)* (.01 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average <65)* (0.10 percentage points).
- Statistically significant decreases in one measure: *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (6.0 percentage points).

#### 500–999 Enrollment

- Statistically significant increases in three measures: *Medication Reconciliation Post-Discharge* (21.2 percentage points), *Care for Older Adults—Advance Care Planning* (12.2 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average  $\geq 65$ )* (1.08 percentage points).
- Statistically significant decreases in two measures: *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (6.4 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average  $< 65$ )* (1.20 percentage points).

#### 1,000–2,499 Enrollment

- Statistically significant increases in four measures: *Controlling High Blood Pressure* (5.8 percentage points), *Medication Reconciliation Post-Discharge* (21.0 percentage points), *Plan All-Cause Readmissions (Risk-Adjusted Average  $\geq 65$ )* (0.76 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average  $< 65$ )* (1.46 percentage points).
- No statistically significant decreases in measures.

#### $\geq 2,500$ Enrollment

- Statistically significant increases in eight measures: *Controlling High Blood Pressure* (3.5 percentage points), *Antidepressant Medication Management—Acute Phase* (1.8 percentage points), *Medication Reconciliation Post-Discharge* (21.2 percentage points), *Care for Older Adults—Medication Review* (3.4 percentage points), *Care for Older Adults—Functional Status Assessment* (4.4 percentage points), *Care for Older Adults—Pain Screening* (2.6 percentage points), *Plan All-Cause Readmissions (Risk-Adjusted Average  $\geq 65$ )* (1.04 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average  $< 65$ )* (0.64 percentage points).
- Statistically significant decreases in one measure: *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (3.9 percentage points).

**Plan benefit package-level performance (Table 7).** In addition to the aggregate performance analyses, NCQA evaluates performance at the benefit-package level. Analyses represent results from individual plan performance. Data show a wide distribution of performance within each measure. The average difference between the 10th and 90th percentiles, including *Plan All-Cause Readmissions*, is 21.0 percentage points, which is about the same as the average difference in 2016 (a decrease of 2.8 percentage points).

The average difference between the 10th and 90th percentiles, excluding *Plan All-Cause Readmissions*, is 23.1, which is about the same as the average difference in 2016 (a decrease of 2.8 percentage points). The average difference has stayed relatively the same between 2015 and 2017 (an increase of 5.9 percentage points).

## Objectives and Background

### Objectives

This report presents results for SNPs reporting HEDIS 2017 performance measures. It displays SNP performance in table format and discusses performance results, provides an overview of the criteria used to select the measures and examines the data collection and validation process. The *Data Limitations* section considers the challenges and constraints of SNP assessment.

### SNP Overview

SNPs were created by Congress in the Medicare Modernization Act (MMA) of 2003, as a new type of Medicare managed care plan that focuses on certain vulnerable groups of Medicare beneficiaries. Unlike other types of MA plans, SNPs may limit enrollment to the following subgroups:

- *Dual-Eligible SNPs (D-SNP)*: Beneficiaries eligible for Medicare and Medicaid.
- *Institutional SNPs (I-SNP)*: Beneficiaries who are institutionalized or are determined by use of a state assessment tool to meet institutional level of care. Beneficiaries who meet the institutional level of care can live in the community and be enrolled in the I-SNP.
- *Chronic SNPs (C-SNP)*: Beneficiaries with certain chronic or disabling conditions.

The MMA stated that SNPs should emphasize monitoring health status, managing chronic diseases, avoiding inappropriate hospitalizations and helping beneficiaries maintain or improve their health status.

**Table 1. Key Differences Between SNPs and Standard MA Plans**

Categories	SNPs	MA Plans
Enrollment	<ul style="list-style-type: none"> <li>• Must limit enrollment to targeted special needs individuals (i.e., dual eligible beneficiaries, those with specific chronic or disabling conditions, or living in or eligible for residing in an institutional setting).</li> <li>• May target specific subsets of special needs populations (e.g., beneficiaries with congestive heart failure or diabetes).</li> <li>• Dual-eligible and institutionalized beneficiaries may enroll and disenroll throughout the year. Chronic care beneficiaries have a one-time enrollment option outside of standard enrollment periods.</li> </ul>	<ul style="list-style-type: none"> <li>• Must be open to all Medicare-eligible beneficiaries.</li> <li>• Lock-in provision for all enrollees with an annual open-enrollment period.</li> </ul>
Benefits	<ul style="list-style-type: none"> <li>• Standard MA benefits.</li> <li>• Must offer Part D prescription drug coverage.</li> </ul>	<ul style="list-style-type: none"> <li>• Standard MA benefits.</li> <li>• Part D coverage is voluntary.</li> </ul>
Payments	<ul style="list-style-type: none"> <li>• Standard MA geographic payment schedule, with PMPM payments risk-adjusted by hierarchical condition category (HCC) scores.</li> </ul>	
Marketing	<ul style="list-style-type: none"> <li>• May target special needs populations in the market area.</li> <li>• May target specific subsets of special needs populations (on a case-by-case basis) in the market area.</li> </ul>	<ul style="list-style-type: none"> <li>• Must include all Medicare-eligible beneficiaries in the market area.</li> </ul>

## CMS SNP HEDIS Reporting Requirement

Since 2009, CMS has required every SNP benefit package (identified by a CMS Plan ID) with 30 or more enrollees to submit audited HEDIS results each year. SNPs listed in the February *SNP Comprehensive Report* as having 29 enrollees or fewer are not required to submit HEDIS measures the following year. Any SNP that meets the enrollment criteria must also exist in both the measurement year and the reporting year. Plans that terminate as of December 31, 2017, are required to report if they were in operation for the full 2017 calendar year. As of February 2016, 464 of 578 SNPs identified by CMS were required to submit data for this report.

**Table 2. SNP Enrollment as of February 2014, 2015 and 2016<sup>2</sup>**

SNP Type and Year	SNPs Required to Report HEDIS Measures	
	Number of SNPs	Enrollment
<b>2014 (Reported HEDIS 2015)</b>		
Chronic or Disabling Condition	112	272,255
Dual-Eligible	266	1,403,045
Institutional	42	48,956
<b>2014 Total</b>	<b>420<sup>3</sup></b>	<b>1,724,256</b>
<b>2015 (Reported HEDIS 2016)</b>		
Chronic or Disabling Condition	111	284,019
Dual-Eligible	265	1,491,557
Institutional	30	31,631
<b>2015 Total</b>	<b>406<sup>4</sup></b>	<b>1,807,207</b>
<b>2016 (Reported HEDIS 2017)</b>		
Chronic or Disabling Condition	103	328,030
Dual-Eligible	308	1,865,391
Institutional	53	59,513
<b>2016 Total</b>	<b>464<sup>5</sup></b>	<b>2,252,934</b>

For a plan's measure result to be publicly reported, NCQA requires a denominator of at least 30 enrollees. Denominators below this size do not support public reporting of individual plan rates. Measures that have a broader reach (e.g., screening measures such as *Colorectal Cancer Screening*) tend to have a larger percentage of publicly reportable plans; measures with a narrower specification (e.g., measures requiring a specific condition or event, such as *Persistence of Beta-Blocker Treatment After a Heart Attack*, *Osteoporosis Management in Women Who Had a Fracture*) tend to have a lower percentage of publicly reportable plans.

<sup>2</sup><https://www.cms.gov/Research-Statistics-Data-and-Systems/Statistics-Trends-and-Reports/MCRAdvPartDenrolData/Special-Needs-Plan-SNP-Data.html>

<sup>3</sup>Two SNPs submitted HEDIS 2015 data, although they were not required to submit HEDIS measures due to their small enrollment size. The number required to report was 418.

<sup>4</sup>One SNP submitted HEDIS 2016 data, although it was not required to submit HEDIS measures due to its small enrollment size. The number required to report was 405.

<sup>5</sup>One SNP submitted HEDIS 2017 data, although it was not required to submit HEDIS measures due to its small enrollment size. The number required to report was 463.

## HEDIS Results

### SNP Program Performance Changes HEDIS 2015–2017 (Tables 3a and 3b)

Tables 3a and 3b show a three-year trend in SNP performance on HEDIS measures. The two tables differ as follows:

- **Table 3a shows results aggregated across plans for the SNP program as a whole (2015–2017).** It includes measure results from all SNPs that reported in any of the three years. For the analysis presented in this table, results for statistical significance tests between HEDIS 2015 and 2017 and between HEDIS 2016 and 2017 were based on a non-paired t-test ( $p < 0.05$ ).
- **Table 3b shows results only for SNPs that reported HEDIS measures in all three reporting years (2015–2017).** It includes results for statistically significant differences between HEDIS 2015 and HEDIS 2017 and between HEDIS 2016 and HEDIS 2017, using a paired t-test ( $p < 0.05$ ) to illustrate performance differences among the same group of SNPs between different periods.

Although 32 measures were collected in HEDIS 2017, we did not include data for measures where changes in the specifications made year-to-year analysis impossible. There are 32 measures; 5 had a trend break due to a change in specifications that prevented comparison across the 3-year period.

**Highest and Lowest Rates (Table 3a).** The measures with the highest and lowest HEDIS 2017 rates were:

#### Highest Five

1. *Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring* (95.5%).
2. *Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring* (95.3%).
3. *Annual Monitoring for Patients on Persistent Medications—Total Rate* (94.9%).
4. *Care for Older Adults—Pain Screening* (93.4%).
5. *Care for Older Adults—Medication Review* (92.8%).

#### Lowest Five

1. *Use of Spirometry Testing in the Assessment and Diagnosis of COPD* (33.6%).
2. *Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge* (35.7%).
3. *Medication Reconciliation Post-Discharge* (42.9%).
4. *Potential Harmful Drug Disease Interactions—Dementia* (56.0%).  
(Lower values signify better performance; this is equivalent to 44.0%.)
5. *Potential Harmful Drug Disease Interactions—History of Falls* (54.6%).  
(Lower values signify better performance; this is equivalent to 45.4%.)

Three of the five measures with the highest performance are *Annual Monitoring for Patients on Persistent Medications* indicators. All five are medication management measures. The five measures with the lowest performance are also reported at the MA contract-level.

**Largest Significant Changes (Table 3a).** The measures listed below show the largest statically significant changes, positive or negative, from HEDIS 2015–2017. The measures with the largest

increases showed a 4.8 percentage point or greater rate increase. The measures with the largest decreases showed a 1.9 percentage point or greater rate decrease.

Largest Five Increase Among All Reporters

1. *Care for Older Adults—Functional Status Assessment* (8.4 percentage points).
2. *Osteoporosis Management in Women Who Had a Fracture* (8.3 percentage points).
3. *Medication Reconciliation Post-Discharge* (7.3 percentage points).
4. *Care for Older Adults—Advance Care Planning* (6.4 percentage points).
5. *Care for Older Adults—Pain Screening* (4.8 percentage points).

Largest Five Decrease Among All Reporters

1. *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (3.4 percentage points).
2. *Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event* (1.9 percentage points).
3. Not applicable—No other measure showed a statistically significant decrease.
4. Not applicable—No other measure showed a statistically significant decrease.
5. Not applicable—No other measure showed a statistically significant decrease.

Three of the five measures with the largest increases are *Care for Older Adults* measures, which only SNPs collect. The two measures with the largest decreases are *Pharmacotherapy of COPD Exacerbation* measures.

**Measures only SNPs report (3a).** There are four HEDIS measures that only SNPs report (*Care for Older Adults—Advance Care Planning, Functional Status Assessment, Medication Review, Pain Screening*). All showed statistically significant improvement for HEDIS 2017.

**SNPs reporting HEDIS 2015–2017 (Table 3b).** Results for SNPs that reported in all 3 years were about the same as plans that reported in any of the 3 years. Thirteen measures with data that could be trended showed statistically significant improvement over the entire period and 11 measures showed statistically significant improvement from 2016–2017. Seven measures showed statistically significant decline over the entire period and from 2016–2017.

The measures listed below show the largest statistically significant changes, positive or negative, from HEDIS 2015–2017, among three-year reporters.

Largest Five Increase Among Three-Year Reporters

1. *Medication Reconciliation Post-Discharge* (7.2 percentage points)
2. *Care for Older Adults—Functional Status Assessment* (6.1 percentage points).
3. *Osteoporosis Management in Women Who Had a Fracture* (5.7 percentage points).
4. *Care for Older Adults—Advance Care Planning* (5.5 percentage points).
5. *Antidepressant Medication Management—Acute Phase* (3.0 percentage points).

Largest Five Decrease Among Three-Year Reporters

1. *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (4.7 percentage points).
2. *Active Board Certification—Family Medicine* (3.3 percentage points).
3. *Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event* (2.6 percentage points).

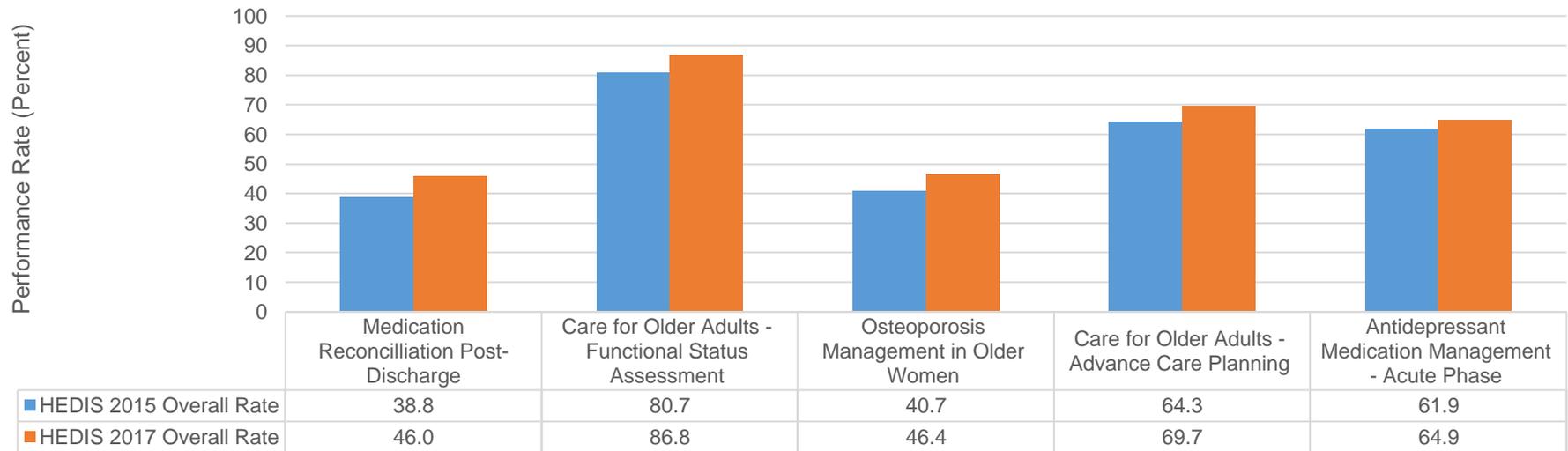
4. *Active Board Certification—Internal Medicine* (1.3 percentage points).
5. *Active Board Certification—Other Physician Specialists* (1.2 percentage points).

For this year’s edition of the report, we modified how we reported the *Plan All-Cause Readmission* measure to improve reader understanding and align more closely with CMS. As collected by NCQA, the measure is the ratio of observed rate of 30-day readmissions to the expected rate of 30-day readmissions, given the reporting unit’s case mix, with values less than 1.0 as better and values greater than 1.0 indicating performance concerns.

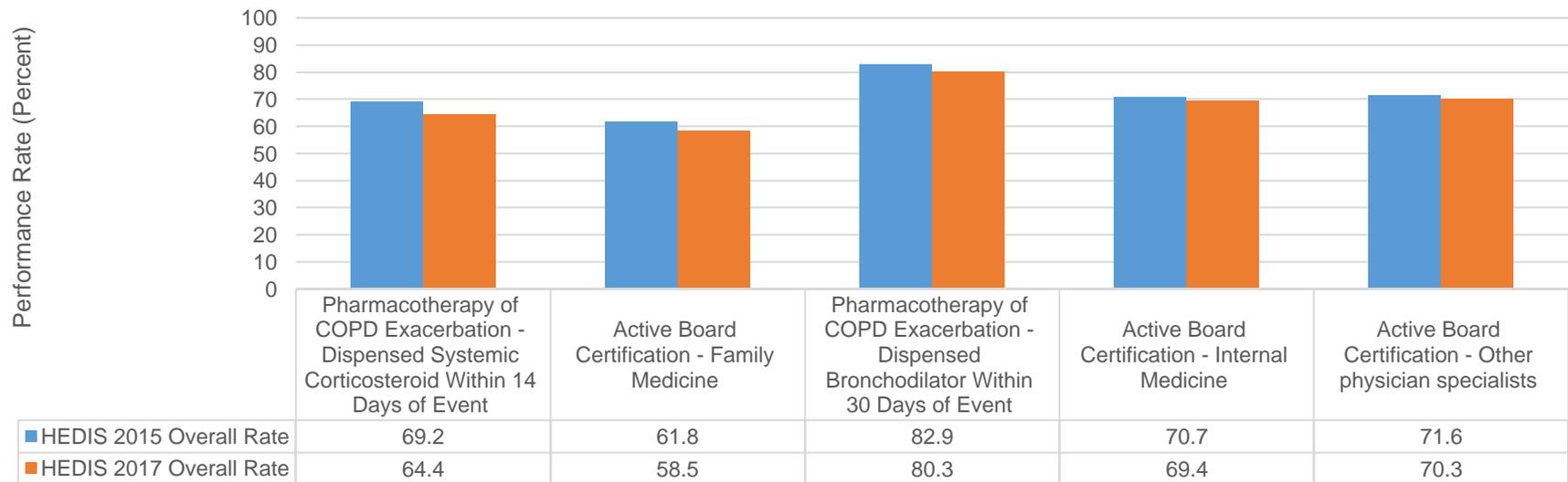
This year, we modified the metric to display performance on a 0%–100% scale (like other HEDIS measures used in this report). Lower is still better, but the reader can interpret the values as a “percentage of readmissions within 30 days.” To facilitate comparison to prior years, we calculated similar values for the past 2 years. This type of standardization is used in programs such as CMS Star Ratings. Refer to Appendix C for details.

The graphics on the next page represents the five measures with the largest increases and decreases among SNPs that reported in all three of the last periods (HEDIS 2015–2017).

### Measures With the Largest Increase Among 3-Year Reporters



### Measures With the Largest Decrease Among 3-Year Reporters



**Table 3a. HEDIS Performance for SNP Program HEDIS 2015, 2016 and 2017**

This table includes all SNP results combined, for all plans that reported in any of the three years.

Measure	HEDIS 2015	HEDIS 2016	HEDIS 2017		CHANGE	
	Overall Rate	Overall Rate	Eligible Population	Overall Rate	2015–2017	2016–2017
Colorectal Cancer Screening	68.9	72.5	795,165	75.3	NA	NA
Use of Spirometry Testing in the Assessment and Diagnosis of COPD	34.1	35.4	43,626	33.6	-0.5	-1.8
Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event	68.1	68.4	67,597	64.6	-3.4**	-3.7**
Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event	81.5	80.9	67,597	79.6	-1.9**	-1.3
Controlling High Blood Pressure	62.0	60.2	898,259	63.8	1.8	3.6**
Persistence of Beta-Blocker Treatment After a Heart Attack	89.9	90.0	9,098	90.5	0.6	0.5
Osteoporosis Management in Women Who Had a Fracture	37.6	47.4	10,630	45.9	8.3**	-1.5
Antidepressant Medication Management—Acute Phase	61.5	63.1	76,256	64.6	3.2**	1.5**
Antidepressant Medication Management—Continuation Phase	46.1	47.5	76,256	47.8	1.6**	0.3
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge	54.6	51.7	31,053	54.6	0.0	2.9**
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge	35.3	34.0	31,053	35.7	0.3	1.7
Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring	94.5	95.0	861,728	95.3	0.9**	0.3
Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring	55.4	55.2	17,767	56.0	0.6	0.8
Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring	94.7	95.3	542,970	95.5	0.8**	0.2
Annual Monitoring for Patients on Persistent Medications—Total Rate	93.8	94.5	1,422,465	94.9	1.1**	0.4**
Medication Reconciliation Post-Discharge	35.6	22.5	448,356	42.9	7.3**	20.4**
Care for Older Adults—Advance Care Planning	60.9	65.1	1,185,104	67.3	6.4**	2.2
Care for Older Adults—Medication Review	88.5	89.5	1,185,167	92.8	4.2**	3.3**
Care for Older Adults—Functional Status Assessment	78.9	83.2	1,185,167	87.3	8.4**	4.1**
Care for Older Adults—Pain Screening	88.6	91.0	1,185,167	93.4	4.8**	2.4**
Active Board Certification—Family Medicine	60.5	59.0	1,531,616	60.7	0.3	1.8

Measure	HEDIS 2015	HEDIS 2016	HEDIS 2017		CHANGE	
	Overall Rate	Overall Rate	Eligible Population	Overall Rate	2015–2017	2016–2017
Active Board Certification—Internal Medicine	69.0	69.9	1,930,959	71.2	2.2**	1.3
Active Board Certification—Geriatrics	46.3	49.1	85,138	50.5	4.2**	1.4
Active Board Certification—Other Physician Specialists	70.0	69.5	6,012,226	71.6	1.6	2.1**
Potentially Harmful Drug-Disease Interactions—History of Falls*	54.8	54.7	76,803	54.6	0.2	0.1
Potentially Harmful Drug-Disease Interactions—Dementia*	60.0	57.9	101,478	56.0	NA	NA
Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure*	17.1	16.9	48,624	16.6	0.6	0.3
Potentially Harmful Drug-Disease Interactions—Total Rate*	49.2	47.6	226,905	47.1	NA	NA
Use of High-Risk Medications in the Elderly—At Least One High-Risk Medication*	15.8	10.3	1,183,718	19.2	NA	NA
Use of High-Risk Medications in the Elderly—At Least Two Different High-Risk Medications*	2.7	1.4	1,183,718	11.7	NA	NA
Plan All-Cause Readmissions (Risk-Adjusted Average $\geq$ 65)*	16.69	15.61	261,198	14.63	2.07**	1.0**
Plan All-Cause Readmissions (Risk-Adjusted Average $<$ 65)*	19.34	19.15	142,346	18.52	0.82**	0.6**

\*Lower values signify better performance.

\*\*Denotes a statistically significant difference ( $p < 0.05$ ) between years for which rates are compared.

Shaded cells that contain “NA” (Not Applicable) represent a trend break where year-to-year comparison is not possible.

**Table 3b. HEDIS Performance for Three-Year Reporting SNPs HEDIS 2015, 2016 and 2017**

This table shows population-based results only for SNPs that reported HEDIS 2015, 2016 and 2017 results.

Measure	HEDIS 2015	HEDIS 2016	HEDIS 2017		CHANGE	
	Overall Rate	Overall Rate	Eligible Population	Overall Rate	2015–2017	2016–2017
Colorectal Cancer Screening	70.0	72.7	580,130	74.4	NA	NA
Use of Spirometry Testing in the Assessment and Diagnosis of COPD	35.4	36.2	32,637	35.0	-0.3**	-1.2**
Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event	69.2	69.7	46,066	64.4	-4.7**	-5.3**
Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event	82.9	82.4	46,066	80.3	-2.6**	-2.1**
Controlling High Blood Pressure	65.0	62.8	619,417	66.6	1.6**	3.9**
Persistence of Beta-Blocker Treatment After a Heart Attack	90.1	90.6	6,643	91.4	1.3	0.8
Osteoporosis Management in Women Who Had a Fracture	40.7	48.0	7,929	46.4	5.7**	-1.6
Antidepressant Medication Management—Acute Phase	61.9	63.8	57,306	64.9	3.0**	1.1**
Antidepressant Medication Management—Continuation Phase	46.1	47.8	57,306	47.9	1.8	0.1
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge	55.5	52.9	22,590	55.4	-0.1	2.5**
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge	36.3	35.2	22,590	36.8	0.5	1.7
Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring	94.7	95.2	608,567	95.4	0.7**	0.1
Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring	56.2	57.0	12,681	56.7	0.5	-0.3
Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring	94.9	95.4	381,820	95.5	0.6**	0.1
Annual Monitoring for Patients on Persistent Medications—Total Rate	94.1	94.7	1,003,068	94.9	0.9**	0.2**
Medication Reconciliation Post -Discharge	38.8	24.9	319,103	46.0	7.2**	21.1**
Care for Older Adults—Advance Care Planning	64.3	67.4	852,944	69.7	5.5**	2.4**
Care for Older Adults—Medication Review	90.1	89.6	852,945	92.6	2.5**	3.0**

Measure	HEDIS 2015	HEDIS 2016	HEDIS 2017		CHANGE	
	Overall Rate	Overall Rate	Eligible Population	Overall Rate	2015–2017	2016–2017
Care for Older Adults—Functional Status Assessment	80.7	83.7	852,945	86.8	6.1**	3.1**
Care for Older Adults—Pain Screening	90.7	91.2	852,945	93.3	2.7**	2.1**
Active Board Certification—Family Medicine	61.8	60.4	672,081	58.5	-3.3**	-2.0**
Active Board Certification—Internal Medicine	70.7	71.0	793,651	69.4	-1.3**	-1.5**
Active Board Certification—Geriatrics	49.0	51.2	36,015	48.7	-0.3**	-2.5**
Active Board Certification—Other Physician Specialists	71.6	72.1	2,758,401	70.3	-1.2**	-1.7**
Potentially Harmful Drug-Disease Interactions—History of Falls*	54.4	54.4	60,286	53.7	0.7	0.7
Potentially Harmful Drug-Disease Interactions—Dementia*	59.4	57.3	75,518	54.9	NA	NA
Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure*	17.2	16.9	35,361	16.3	0.9	0.6
Potentially Harmful Drug-Disease Interactions—Total Rate*	49.0	47.6	171,165	46.5	NA	NA
Use of High-Risk Medications in the Elderly—At Least One High-Risk Medication*	14.7	9.5	844,383	17.9	NA	NA
Use of High-Risk Medications in the Elderly—At Least Two Different High-Risk Medications*	2.3	1.1	844,383	11.3	NA	NA
Plan All-Cause Readmissions (Risk-Adjusted Average $\geq$ 65)*	16.4	15.3	167,617	14.5	1.9**	0.8**
Plan All-Cause Readmissions (Risk-Adjusted Average $<$ 65)*	19.2	19.1	97,464	18.5	0.7**	0.6**

\*Lower values signify better performance.

\*\*Denotes a statistically significant difference ( $p < 0.05$ ) between years for which rates are compared.

Shaded cells that contain “NA” (Not Applicable) represent a trend break where year-to-year comparison is not possible.

## SNP Program and MA Program Performance (Table 4)

**SNP and MA program performance (Table 4).** This table shows SNP program performance for the measures SNP and MA plans are required to report, in the context of overall MA program performance. SNPs report a subset of the full MA HEDIS measures set, so this report compares only measures that are commonly reported at the SNP benefit-package level and at the MA contract-level.

The MA program performance was higher than the SNP program performance for 14 of 28 measures in 2017, with significant differences for 9 measures. The greatest difference in performance was 13.3 percentage points.

The SNP program performance was higher than the MA program for 14 of 28 measures, with statistically significant differences for 8 measures. The greatest statistically significant difference in performance was 7.7 percentage points.

Measures with the largest performance gaps between the MA and SNP programs plans included:

- *Medication Reconciliation Post-Discharge* (13.3 percentage points).
- *Controlling High Blood Pressure* (13.0 percentage points).
- *Antidepressant Medication Management—Acute Phase* and *Continuation Phase* (6.7 and 5.7 percentage points, respectively).
- *Active Board Certification—Geriatrics* (3.9 percentage points).

On measures where the SNPs outperformed MA plans, the largest performance gaps included:

- *Potentially Harmful Drug-Disease Interactions—History of Falls and Chronic Renal Failure* (7.7 and 6.7 percentage points, respectively).
- *Plan All-Cause Readmissions (Risk-Adjusted Average  $\geq 65$  and  $< 65$ )* (2.4 and 1.5 percentage points, respectively).
- *Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 days of Discharge* (0.7 percentage points).

**Note:** MA plans report HEDIS measures at the contract level, which may include SNP beneficiaries because some MA contracts include SNP plan benefit packages. However, these represent a small portion of the overall MA population, as indicated by the eligible population data for each measure. Results were analyzed for statistically significant differences ( $p < 0.05$ ) between SNP and other MA plan results.

**Table 4. HEDIS 2017 Performance for SNP Program and MA Program**

This table shows population-based performance for all SNPs and all MA plans.

Measures	SNPs		MA Organizations		Performance Gap in Rates (SNP—MA)	
	Eligible Population	Overall Rate	Eligible Population	Overall Rate	2016	2017
Colorectal Cancer Screening	795,165	75.3	8,123,649	75.9	NA	NA
Use of Spirometry Testing in the Assessment and Diagnosis of COPD	43,626	33.6	335,415	36.3	-2.4	-2.7**
Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event	67,597	64.6	267,240	66.8	-4.5**	-2.2**
Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event	67,597	79.6	267,240	75.9	1.7**	3.7**
Controlling High Blood Pressure	898,259	63.8	7,610,387	76.8	-14.0**	-13.0**
Persistence of Beta-Blocker Treatment After a Heart Attack	9,098	90.5	61,515	90.7	-0.9	-0.2
Osteoporosis Management in Women Who Had a Fracture	10,630	45.9	108,189	44.2	4.6	1.7
Antidepressant Medication Management—Acute Phase	76,256	64.6	410,355	70.3	-6.6**	-5.7**
Antidepressant Medication Management—Continuation Phase	76,256	47.8	410,355	54.4	-7.2**	-6.7**
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge	31,053	54.6	90,098	54.6	-0.7	-0.1
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge	31,053	35.7	90,098	35.0	0.5	0.7
Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring	861,728	95.3	6,384,663	93.7	1.5**	1.6**
Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring	17,767	56.0	148,836	56.1	-1.2	-0.1
Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring	542,970	95.5	4,187,835	94.0	1.5**	1.5**
Annual Monitoring for Patients on Persistent Medications—Total Rate	1,422,465	94.9	10,721,334	93.3	1.5**	1.6**
Medication Reconciliation Post-Discharge <sup>6</sup>	448,356	42.9	2,741,323	56.2	-1.4	-13.3**
Care for Older Adults—Advance Care Planning***	1,185,104	67.3	—	—	—	—
Care for Older Adults—Medication Review***	1,185,167	92.8	—	—	—	—

<sup>6</sup> Medication Reconciliation Post-Discharge began to be collected at the MA contract-level in HEDIS 2016, so a 2015 rate was not available to calculate a performance gap between 2015 and 2016.

Measures	SNPs		MA Organizations		Performance Gap in Rates (SNP—MA)	
	Eligible Population	Overall Rate	Eligible Population	Overall Rate	2016	2017
Care for Older Adults—Functional Status Assessment***	1,185,167	87.3	—	—	—	—
Care for Older Adults—Pain Screening***	1,185,167	93.4	—	—	—	—
Active Board Certification—Family Medicine	1,531,616	60.7	1,125,578	64.5	-7.5**	-3.7**
Active Board Certification—Internal Medicine	1,930,959	71.2	1,394,983	72.8	-4.3**	-1.7**
Active Board Certification—Geriatrics	85,138	50.5	61,591	54.5	-8.0**	-3.9**
Active Board Certification—Other Physician Specialists	6,012,226	71.6	4,409,085	73.1	-4.9**	-1.5
Potentially Harmful Drug-Disease Interactions—History of Falls*	76,803	54.6	758,277	46.8	-8.0**	-7.7**
Potentially Harmful Drug-Disease Interactions—Dementia*	101,478	56.0	671,787	46.8	NA	NA
Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure*	48,624	16.6	312,562	9.8	-7.2**	-6.7**
Potentially Harmful Drug-Disease Interactions—Total Rate*	226,905	47.1	1,742,626	40.2	NA	NA
Use of High-Risk Medications in the Elderly—At Least One High-Risk Medication*	1,183,718	19.2	12,562,226	13.3	NA	NA
Use of High-Risk Medications in the Elderly—At Least Two Different High-Risk Medications*	1,183,718	11.7	12,562,226	8.4	NA	NA
Plan All-Cause Readmissions (Risk-Adjusted Average $\geq 65$ )*	261,198	14.63	2,049,063	12.23	-2.82**	-2.40**
Plan All-Cause Readmissions (Risk-Adjusted Average $< 65$ )*	142,346	18.52	439,262	17.06	-1.77	-1.46**

\*Lower values signify better performance.

\*\*Denotes a statistically significant difference ( $p < 0.05$ ) between years for which rates are compared.

\*\*\*Data are not reported by MA plans.

Cells with a dash (—) indicate that there were no data for calculation.

## SNP Program Performance by SNP Type (Table 5)

**Program performance by SNP type (Table 5).** Overall for HEDIS 2017, D-SNPs had higher rates on 11 measures than the other SNP types, compared to 18 measures for the I-SNPs and 3 measures for C-SNPs.

Performance increased across all SNP types for 11 measures:

- *Controlling High Blood Pressure*
- *Antidepressant Medication Management—Acute Phase.*
- *Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring.*
- *Annual Monitoring for Patients on Persistent Medications—Total Rate.*
- *Medication Reconciliation Post-Discharge.*
- *Care for Older Adults—Medication Review, Functional Status Assessment and Pain Screening.*
- *Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure.*
- Both *Plan All Cause Readmissions* (statistically significant for all SNP types).

Performance decreased across all SNP types for three measures:

- *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event.*
- *Osteoporosis Management in Women Who Had a Fracture.*
- *Active Board Certification—Family Medicine and Geriatrics.*

D-SNPs showed statistically significant performance improvement for 11 measures and showed a statistically significant decrease in performance for 2 measures.

### D-SNP Significant Improvements

- *Controlling High Blood Pressure.*
- *Antidepressant Medication Management—Acute Phase.*
- *Annual Monitoring for Patients on Persistent Medications—Total Rate.*
- *Medication Reconciliation Post-Discharge.*
- *Care for Older Adults—Medication Review.*
- *Care for Older Adults—Functional Status Assessment.*
- *Care for Older Adults—Pain Screening.*
- *Plan All Cause Readmissions (Risk-Adjusted Average— $\geq 65$ ).*
- *Plan All Cause Readmissions (Risk-Adjusted Average— $< 65$ ).*

### D-SNP Significant Declines

- *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event.*
- *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 30 Days of Event.*

I-SNPs showed statistically significant improvement for four measures and showed statistically significant decreases in performance for one measure.

---

### I-SNP Significant Improvements

- *Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event.*
- *Antidepressant Medication Management—Continuation Phase.*
- *Plan All Cause Readmissions (Risk-Adjusted Average— $\geq 65$ ).*
- *Plan All Cause Readmissions (Risk-Adjusted Average— $< 65$ ).*

### I-SNP Significant Declines

- *Active Board Certification—Geriatrics.*

C-SNPs showed statistically significant improvement on nine measures and statistically significant decreases in performance for one measure.

### C-SNP Significant Improvements

- *Controlling High Blood Pressure.*
- *Persistence of Beta-Blocker Treatment After a Heart Attack.*
- *Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge.*
- *Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge.*
- *Medication Reconciliation Post-Discharge.*
- *Care for Older Adults—Medication Review.*
- *Care for Older Adults—Functional Status Assessment.*
- *Plan All Cause Readmissions (Risk-Adjusted Average— $\geq 65$ ).*
- *Plan All Cause Readmissions (Risk-Adjusted Average— $< 65$ ).*

### C-SNP Significant Declines

- *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event.*

**Table 5. SNP Overall Program Performance by SNP Type HEDIS 2016–2017**

This table displays program-wide results for all SNPs, by SNP type.

Measure	DUAL SNPS					INSTITUTIONAL SNPS					CHRONIC SNPS				
	2017		2016		2017 vs 2016	2017		2016		2017 vs 2016	2017		2016		2017 vs 2016
	#	Rate	#	Rate	Change	#	#	Rate	#	#	Rate	Rate	#	Rate	Change
Colorectal Cancer Screening	308	74.5	265	71.9**	NA	53	70.5	30	52.1**	NA	103	79.2	111	75.7**	NA
Use of Spirometry Testing in the Assessment and Diagnosis of COPD	308	32.4**	265	33.9**	-1.6	53	9.1**	30	6.8**	2.3	103	41.0**	111	43.5**	-2.5
Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event	308	64.8	261	68.5	-3.8**	53	52.9	30	55.9	-2.9	103	64.3	102	67.8	-3.5**
Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event	308	80.4	261	82.2	-1.8**	53	87.2	30	73.0	14.3**	103	74.0	102	73.6	0.3
Controlling High Blood Pressure	299	65.7	261	63.0	2.6**	48	74.2	30	67.5	6.8	103	55.9	111	49.8	6.1**
Persistence of Beta-Blocker Treatment After a Heart Attack	308	90.6	265	90.8	-0.2	53	88.2	30	88.5	-0.2	103	90.2	111	87.5	2.7**
Osteoporosis Management in Women Who Had a Fracture	308	44.5**	265	45.0	-0.4	53	19.8**	30	29.3	-9.6	103	54.6**	111	57.1**	-2.6
Antidepressant Medication Management—Acute Phase	308	64.3	265	62.7	1.5**	53	77.4	30	68.7	8.7	103	66.7	111	65.3	1.3
Antidepressant Medication Management—Continuation Phase	308	47.4	265	47.1	0.3	53	73.6**	30	61.2	12.4**	103	49.3	111	49.5	-0.2
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge	306	55.0	263	53.0	2.1	53	19.7*	30	25.8	-6.1	103	51.6	110	37.6	14.0**
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge	306	36.0	263	34.9	1.1	53	15.8	30	20.5	-4.7	103	32.9	110	24.0	8.9**
Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring	308	95.1**	265	94.7**	0.3	50	99.7**	30	99.2**	0.5	103	96.0**	111	96.0**	0.1

Measure	DUAL SNPS					INSTITUTIONAL SNPS					CHRONIC SNPS				
	2017		2016		2017 vs 2016	2017		2016		2017 vs 2016	2017		2016		2017 vs 2016
	#	Rate	#	Rate	Change	#	#	Rate	#	#	Rate	Rate	#	Rate	Change
Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring	308	54.2	265	53.9	0.3	50	98.7**	30	97.5**	1.2	103	52.0	111	53.0	-1.0
Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring	308	95.2**	265	94.9**	0.3	50	99.7**	30	99.2**	0.5	103	96.2**	111	96.2**	0.0
Annual Monitoring for Patients on Persistent Medications—Total Rate	308	94.7**	265	94.3**	0.4**	50	99.7**	30	99.1**	0.5	103	95.4**	111	95.3**	0.1
Medication Reconciliation Post-Discharge	307	43.3	264	23.8	19.5**	53	30.7	29	23.5	7.2	103	41.7	111	17.0	24.7**
Care for Older Adults—Advance Care Planning	307	66.6	265	63.8	2.7	53	97.5**	30	97.4**	0.1	103	65.6	111	67.0	-1.4
Care for Older Adults—Medication Review	307	92.0**	265	88.2	3.8**	53	98.2	30	96.7	1.5	103	95.1	111	93.7	1.4**
Care for Older Adults—Functional Status Assessment	307	86.2**	265	81.8**	4.4**	53	98.9**	30	97.3	1.6	103	90.1**	111	86.9	3.1**
Care for Older Adults—Pain Screening	307	92.8**	265	89.9	2.9**	53	98.8	30	98.1	0.6	103	95.2	111	94.5	0.7
Active Board Certification—Family Medicine	290	57.3	249	58.1	-0.8	49	70.7**	30	71.3**	-0.5	102	52.4	110	55.3	-2.9
Active Board Certification—Internal Medicine	289	68.9	249	69.1**	-0.1	49	75.4**	30	76.8**	-1.4	102	66.1	110	65.7**	0.4
Active Board Certification—Geriatrics	290	45.8**	249	48.9**	-3.1	49	61.4**	30	64.3**	-2.9**	102	34.4**	110	37.9**	-3.5
Active Board Certification—Other Physician Specialists	290	67.8	249	67.8	0.0	49	81.3**	30	80.6**	0.7	102	66.1	110	67.2	-1.0
Potentially Harmful Drug-Disease Interactions—History of Falls*	308	54.2	265	54.5	0.3	53	63.2**	30	62.5**	-0.7	103	54.7	111	54.6	-0.1
Potentially Harmful Drug-Disease Interactions—Dementia*	308	57.4**	265	59.9**	NA	53	51.8	30	51.6	NA	103	51.0	111	50.8	NA
Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure*	308	18.6**	265	18.8**	0.3	53	5.5**	30	7.8	2.3	103	12.4**	111	12.7	0.3

Measure	DUAL SNPS					INSTITUTIONAL SNPS					CHRONIC SNPS				
	2017		2016		2017 vs 2016	2017		2016		2017 vs 2016	2017		2016		2017 vs 2016
	#	Rate	#	Rate	Change	#	#	Rate	#	#	Rate	Rate	#	Rate	Change
Potentially Harmful Drug-Disease Interactions—Total Rate*	308	48.6	265	49.6	NA	53	48.5	30	49.0	NA	103	40.1**	111	39.8**	NA
Use of High-Risk Medications in the Elderly—At Least One High-Risk Medication*	308	19.9**	262	10.9	NA	53	13.9	30	9.5	NA	103	17.1	111	8.1	NA
Use of High-Risk Medications in the Elderly—At Least Two Different High-Risk Medications*	308	12.2	262	1.6	NA	53	11.2	30	0.7	NA	103	9.9	111	0.8	NA
Plan All-Cause Readmissions (Risk-Adjusted Average $\geq 65$ )*	288	15.1**	262	15.8	0.78**	43	9.1**	29	11.2**	2.13**	93	13.5**	110	15.10	1.63**
Plan All-Cause Readmissions (Risk-Adjusted Average $< 65$ )*	281	18.8	262	19.2	0.47**	41	15.40	29	16.60	1.20**	87	17.20	108	18.80	1.51**

\*Lower values signify better performance.

\*\*Denotes a statistically significant difference ( $p < 0.05$ ) between years when rates are compared.

Shaded cells that contain "NA" (Not Applicable) represent a trend break where year-to-year comparison is not possible.

## SNP Program Performance by Enrollment Size (Table 6)

This table displays program-wide performance for all SNPs by enrollment. Statistically significant changes are displayed by enrollment size categories and denote a change from HEDIS 2016–2017 within a specific enrollment category. Because statistical significance is a function of effect size and number of observations, NCQA did not test for statistical significance of the differences among SNP sizes because of the wide variation in SNP enrollment sizes. If such testing were performed, the mean of the larger SNPs would dominate the mean of the sizes against which comparisons are made. It should be noted that as enrollment size increases, it is more likely that statistically significant differences will be found for progressively smaller effect sizes that may not be clinically significant.

**Plan program performance by enrollment size (Table 6).** This table displays program-wide performance for all SNPs by enrollment. The <99 enrollment category had the least amount of plans (16 in 2017) and the ≥2,500 category had the most plans (183 plans in 2017).

### <99 Enrollment

- Statistically significant increases in two measures: *Care for Older Adults—Advance Care Planning* (25.0 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average ≥65)* (2.69 percentage points).
- Statically significant decreases in one measure: *Plan All-Cause Readmissions (Risk-Adjusted Average <65)* (14.71 percentage points).

### 100–499 Enrollment

- Statistically significant increases in six measures: *Medication Reconciliation Post-Discharge* (16.6 percentage points), *Active Board Certification—Family Medicine* (5.7 percentage points), *Active Board Certification—Internal Medicine* (3.6 percentage points) and *Active Board Certification—Other Physician Specialists* (8.1 percentage points), *Plan All-Cause Readmissions (Risk-Adjusted Average ≥65)* (0.01 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average <65)* (0.10 percentage points).
- Statistically significant decreases in one measure: *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (6.0 percentage points).

### 500–999 Enrollment

- Statistically significant increases in three measures: *Medication Reconciliation Post-Discharge* (21.2 percentage points), *Care for Older Adults—Advance Care Planning*, (12.2 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average ≥65)* (1.08 percentage points).
- Statistically significant decreases in two measures: *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (6.4 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average <65)* (1.20 percentage points).

### 1,000–2,499 Enrollment

- Statistically significant increases in four measures: *Controlling High Blood Pressure* (5.8 percentage points), *Medication Reconciliation Post-Discharge* (21.0 percentage points),

*Plan All-Cause Readmissions (Risk-Adjusted Average  $\geq 65$ )* (0.76 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average  $< 65$ )* (1.46 percentage points).

- There were no statistically significant decreases in measures.

$\geq 2,500$  Enrollment

- Statistically significant increases in eight measures: *Controlling High Blood Pressure* (3.5 percentage points), *Antidepressant Medication Management—Acute Phase* (1.8 percentage points), *Medication Reconciliation Post-Discharge* (20.2 percentage points), *Care for Older Adults—Medication Review* (3.4 percentage points), *Functional Status Assessment* (4.4 percentage points), *Pain Screening*, (2.6 percentage points), *Plan All-Cause Readmissions (Risk-Adjusted Average  $\geq 65$ )* (1.04 percentage points) and *Plan All-Cause Readmissions (Risk-Adjusted Average  $< 65$ )* (0.64 percentage points).
- Statistically significant decreases in one measure: *Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event* (3.9 percentage points).

**Table 6. SNP Overall Program Performance by Enrollment Size HEDIS 2016–2017**

RATE BY SNP ENROLLMENT SIZE															
Measure	<99			100–499			500–999			1,000–2,499			≥2,500		
	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change
<b>Total SNPs</b>	<b>16</b>	<b>34</b>		<b>105</b>	<b>86</b>		<b>67</b>	<b>53</b>		<b>93</b>	<b>87</b>		<b>183</b>	<b>146</b>	
Colorectal Cancer Screening	52.9	59.0	NA	67.9	68.8	NA	72.0	69.9	NA	71.5	69.0	NA	75.6	72.9	NA
Use of Spirometry Testing in the Assessment and Diagnosis of COPD	20.0	37.5	-17.5	25.9	31.8	-6.0	35.0	37.8	-2.8	34.2	34.7	-0.4	33.6	35.4	-1.9
Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event	53.8	55.4	-1.6	63.9	69.9	-6.0**	63.5	69.9	-6.4**	68.5	68.8	-0.3	64.4	68.3	-3.9**
Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event	69.2	72.8	-3.6	77.7	81.6	-3.9	77.0	80.6	-3.6	81.7	82.1	-0.3	79.6	80.8	-1.2
Controlling High Blood Pressure	48.8	57.9	-9.1	66.2	63.5	2.7	67.2	64.6	2.6	66.4	60.6	5.8**	63.5	60.0	3.5**
Persistence of Beta-Blocker Treatment After a Heart Attack	100.0	80.0	20.0	87.6	93.5	-5.9	89.9	91.8	-1.9	89.1	89.8	-0.7	90.6	89.9	0.8
Osteoporosis Management in Women Who Had a Fracture	42.9	0.0	42.9	38.7	48.4	-9.6	52.3	45.3	7.0	40.6	36.9	3.7	46.3	48.4	-2.1
Antidepressant Medication Management—Acute Phase	68.3	73.8	-5.5	68.4	71.2	-2.8	68.5	70.0	-1.6	66.7	66.9	-0.2	64.4	62.5	1.8**
Antidepressant Medication Management—Continuation Phase	58.5	66.7	-8.1	53.2	56.8	-3.5	52.8	55.1	-2.4	50.0	52.4	-2.4	47.4	46.8	0.6
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge	25.0	28.9	-3.9	38.3	41.3	-2.9	46.1	41.9	4.2	49.7	45.4	4.3	55.4	52.7	2.7
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge	25.0	13.2	11.8	23.1	19.1	3.9	28.5	24.5	4.0	29.6	28.0	1.7	36.5	35.0	1.4
Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring	91.3	89.6	1.7	95.0	95.0	0.1	94.5	95.4	-0.9	95.6	95.0	0.6	95.3	95.0	0.3

RATE BY SNP ENROLLMENT SIZE															
Measure	<99			100–499			500–999			1,000–2,499			≥2,500		
	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change
Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring	84.6	61.1	23.5	68.9	64.5	4.4	59.0	58.6	0.3	67.8	67.4	0.3	54.7	53.6	1.1
Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring	92.0	94.0	-2.1	95.7	95.7	0.0	95.0	95.6	-0.6	96.0	95.2	0.8	95.5	95.3	0.2
Annual Monitoring for Patients on Persistent Medications—Total Rate	91.4	91.1	0.3	94.9	94.7	0.1	94.2	94.9	-0.8	95.4	94.6	0.8	94.9	94.5	0.4
Medication Reconciliation Post-Discharge	26.6	16.5	10.1	36.5	19.9	16.6**	36.2	15.1	21.2**	41.1	20.1	21.0**	43.3	23.1	20.2**
Care for Older Adults—Advance Care Planning	57.8	32.8	25.0**	63.2	58.7	4.5	66.2	54.1	12.2**	69.9	62.8	7.1	67.2	65.8	1.4
Care for Older Adults—Medication Review	79.5	65.0	14.5	90.2	87.5	2.7	92.5	89.2	3.3	91.7	90.1	1.6	92.9	89.5	3.4**
Care for Older Adults—Functional Status Assessment	74.6	61.6	13.0	87.3	83.7	3.6	88.8	88.2	0.6	87.8	85.1	2.7	87.2	82.9	4.4**
Care for Older Adults—Pain Screening	80.5	66.7	13.8	91.4	90.0	1.5	93.6	93.3	0.3	93.7	92.1	1.6	93.5	90.9	2.6**
Potentially Harmful Drug-Disease Interactions—History of Falls*	55.6	64.5	9.0	55.7	60.2	4.6	55.4	54.8	-0.6	56.7	58.0	1.3	54.3	54.3	0.0
Potentially Harmful Drug-Disease Interactions—Dementia*	47.8	NA	NA	49.9	54.7	NA	50.0	53.0	NA	52.4	53.6	NA	56.6	58.7	NA
Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure*	5.3	4.8	-0.5	13.5	17.3	3.8	13.1	13.2	0.1	13.2	12.8	-0.4	17.0	17.4	0.4
Potentially Harmful Drug-Disease Interactions—Total Rate*	44.3	NA	NA	43.9	47.5	NA	42.4	43.5	NA	45.5	46.2	NA	47.4	47.9	NA
Use of High-Risk Medications in the Elderly—At Least One High-Risk Medication*	14.1	NA	NA	17.0	12.0	NA	16.0	11.3	NA	16.9	10.4	NA	19.5	10.2	NA

RATE BY SNP ENROLLMENT SIZE															
Measure	<99			100–499			500–999			1,000–2,499			≥2,500		
	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change	2017 Rate	2016 Rate	2017 vs 2016 Change
Use of High-Risk Medications in the Elderly—At Least Two Different High-Risk Medications*	8.5	NA	NA	11.2	1.6	NA	10.7	1.4	NA	11.1	1.3	NA	11.8	1.4	NA
Active Board Certification—Family Medicine	63.7	60.8	2.8	63.0	57.3	5.7**	53.1	54.7	-1.5	57.0	58.9	-1.8	62.9	62.5	0.3
Active Board Certification—Internal Medicine	73.5	72.9	0.6	72.3	68.7	3.6**	65.0	66.1	-1.2	68.8	69.2	-0.4	72.3	72.4	-0.1
Active Board Certification—Geriatrics	57.3	47.8	9.6	52.6	47.3	5.4	35.5	40.2	-4.7	43.7	43.6	0.2	54.3	58.4	-4.1
Active Board Certification—Other Physician Specialists	71.7	66.2	5.4	73.6	65.5	8.1**	63.1	66.1	-3.0	66.6	69.9	-3.2	74.6	75.2	-0.6
Plan All-Cause Readmissions (Risk-Adjusted Average ≥65)*	17.72	20.14	2.69	14.19	14.20	0.01	13.94	15.02	1.08	13.54	14.30	0.76	14.72	15.76	1.04
Plan All-Cause Readmissions (Risk-Adjusted Average <65)*	29.30	14.59	-14.71	17.92	18.01	0.10	19.12	17.92	-1.20	16.65	18.11	1.46	18.63	19.27	0.64

\*Lower values signify better performance.

\*\*Denotes the rate for that plan size is statistically different (p <0.05) from 2016–2017.

Shaded cells that contain “NA” (Not Applicable) represent a trend break where year-to-year comparison is not possible.

## SNP Benefit Package Performance (Table 7)

This section focuses on individual SNP benefit package performance (“plan benefit packages” [PBP]) and how performance on each measure is distributed. Distribution is based on performance of SNPs with at least 30 enrollees in the measure denominator—the minimum denominator size for reporting individual HEDIS rates.

Table 7 includes the mean, the standard deviation, the performance distribution (10th–90th percentiles) and the minimum and maximum HEDIS scores for SNPs that met the minimum denominator size. The number of SNPs able to report each measure ranged from 450 (for *Annual Monitoring for Patients on Persistent Medications—Total Rate*) to 85 (for *Persistence of Beta-Blocker Treatment After a Heart Attack*).

The average difference between the 10th and 90th percentiles, including *Plan All-Cause Readmission*, is 21.0 percentage points, which is about the same as the average difference in 2016, including *Plan All-Cause Readmission* of 23.1, (a decrease of 2.8 percentage points).

The average difference between the 10th and 90th percentiles, excluding *Plan All-Cause Readmissions*, is 23.1, which is about the same as the average difference in 2016 (a decrease of 2.8 percentage points). The average difference has stayed about the same between 2015 and 2017 (an increase of 5.9 percentage points).

The standard deviation ranges from 3.9 percentage points (*Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring*) to 27.6 percentage points (*Care for Older Adults—Advance Care Planning*), demonstrating that the spread around the mean score varies substantially by measure.

The smallest gaps (less than 10 percentage points) between the 10th and 90th percentiles were found for the following measures:

- *Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring* (8.4 percentage points).
- *Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring* (8.8 percentage points).
- *Annual Monitoring for Patients on Persistent Medications—Total Rate* (9.1 percentage points).

Eight measures had large percentage point differences (40 points or more) between SNPs scoring in the 10th percentile and in the 90th percentile:

- *Use of Spirometry Testing in the Assessment and Diagnosis of COPD* (42.0 percentage points).
- *Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge* (42.9 percentage points).
- *Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring* (43.7 percentage points).
- *Active Board Certification—Family Medicine* (44.4 percentage points).
- *Medication Reconciliation Post-Discharge* (59.0 percentage points).
- *Osteoporosis Management in Women Who Had a Fracture* (61.2 percentage points).
- *Active Board Certification—Geriatrics* (75.4 percentage points).
- *Care for Older Adults—Advance Care Planning* (76.0 percentage points).

Nine measures showed a large difference (at least 18 percentage points) between the 90th percentile and the mean score, and thus present the greatest areas for overall improvement.

- *Active Board Certification—Geriatrics* (36.2 percentage points).
- *Care for Older Adults—Advance Care Planning* (34.8 percentage points).
- *Osteoporosis Management in Women Who Had a Fracture* (29.6 percentage points).
- *Medication Reconciliation Post-Discharge* (29.0 percentage points).
- *Use of Spirometry Testing in the Assessment and Diagnosis of COPD* (24.9 percentage points).
- *Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring* (24.6 percentage points).
- *Active Board Certification—Family Medicine* (24.2 percentage points).
- *Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge* (23.1 percentage points).
- *Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge* (21.9 percentage points).

Table 7. SNP Benefit Package Performance HEDIS 2017

Measures	Total SNPs	Mean	Std. Dev.	PERCENTILE DISTRIBUTION OF PERFORMANCE						
				Min	P10	P25	P50	P75	P90	Max
Colorectal Cancer Screening	390	70.4	12.4	3.2	53.6	63.5	72.4	79.3	84.0	96.2
Use of Spirometry Testing in the Assessment and Diagnosis of COPD	196	34.9	15.4	0.8	17.8	24.8	33.0	41.7	59.8	78.0
Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event	260	66.2	11.5	13.3	52.4	62.6	67.8	73.6	78.0	90.2
Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event	260	81.1	9.9	33.9	68.7	77.3	83.1	87.3	91.3	100.0
Controlling High Blood Pressure	380	66.0	12.7	23.5	49.0	59.1	67.0	74.4	81.6	93.2
Persistence of Beta-Blocker Treatment After a Heart Attack	85	90.7	6.2	69.7	83.1	87.1	91.5	95.6	97.1	100.0
Osteoporosis Management in Women Who Had a Fracture	90	48.6	21.4	6.3	17.0	34.0	47.0	65.2	78.2	93.8
Antidepressant Medication Management—Acute Phase	265	66.1	9.2	37.5	54.4	60.0	65.6	72.4	77.5	98.5
Antidepressant Medication Management—Continuation Phase	265	49.4	10.2	28.1	38.2	42.4	47.7	55.4	61.5	89.4
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge	174	52.6	16.3	12.5	32.9	41.8	50.3	64.0	75.8	97.9
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge	174	33.5	15.7	4.9	16.4	21.3	30.5	43.8	55.4	85.1
Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring	428	94.8	4.3	62.2	90.5	93.1	95.3	97.7	99.2	100.0
Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring	144	59.6	17.5	24.7	40.5	47.2	57.6	66.1	84.2	100.0
Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring	412	95.4	3.9	70.0	91.4	93.8	95.9	97.9	99.7	100.0
Annual Monitoring for Patients on Persistent Medications—Total Rate	450	94.5	4.2	65.7	90.0	92.9	95.0	97.1	99.1	100.0
Medication Reconciliation Post-Discharge	400	40.7	21.3	0.0	10.7	25.4	39.4	55.9	69.8	97.0
Care for Older Adults—Advance Care Planning	447	62.4	27.6	0.0	21.3	41.8	66.4	87.1	97.3	100.0
Care for Older Adults—Medication Review	447	91.1	12.3	0.9	81.3	89.4	94.2	97.9	99.5	100.0
Care for Older Adults—Functional Status Assessment	447	86.1	17.6	0.0	63.4	81.1	92.5	97.1	99.4	100.0

Measures	Total SNPs	Mean	Std. Dev.	PERCENTILE DISTRIBUTION OF PERFORMANCE						
				Min	P10	P25	P50	P75	P90	Max
Care for Older Adults—Pain Screening	447	91.8	12.3	0.1	80.1	90.6	95.9	98.4	99.8	100.0
Potentially Harmful Drug-Disease Interactions—History of Falls*	264	55.2	9.8	94.0	66.7	61.5	54.8	48.5	42.3	30.5
Potentially Harmful Drug-Disease Interactions—Dementia*	272	52.7	9.6	79.1	64.1	59.4	52.2	47.0	40.5	22.0
Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure*	237	14.2	8.1	42.9	24.0	19.0	13.4	7.8	4.8	0.0
Potentially Harmful Drug-Disease Interactions—Total Rate*	338	45.4	9.3	86.7	56.3	50.3	45.0	38.9	34.4	18.0
Use of High-Risk Medications in the Elderly—At Least One High-Risk Medication*	449	18.0	6.2	37.6	26.0	21.8	17.6	13.7	10.6	2.8
Use of High-Risk Medications in the Elderly—At Least Two Different High-Risk Medications*	449	11.7	4.5	31.6	18.3	14.5	11.2	8.6	6.3	0.0
Active Board Certification—Family Medicine	439	62.5	19.2	1.1	42.2	47.1	67.0	74.2	86.7	100.0
Active Board Certification—Internal Medicine	438	69.7	14.9	1.0	55.0	62.9	72.9	77.2	85.0	100.0
Active Board Certification—Geriatrics	435	55.8	26.3	0.0	16.6	33.3	60.0	72.7	92.0	100.0
Active Board Certification—Other Physician Specialists	438	71.1	16.7	0.2	55.8	58.6	76.8	82.8	86.4	100.0
Plan All-Cause Readmissions (Risk-Adjusted Average $\geq$ 65)*	405	14.6	6.3	74.4	19.3	16.4	14.0	11.7	8.1	3.6
Plan All-Cause Readmissions (Risk-Adjusted Average $<$ 65)*	370	18.6	8.8	87.5	26.1	21.8	17.7	14.0	9.9	4.7

\*Lower values signify better performance.

**SNP Benefit Package Performance Changes HEDIS 2015–2017 (Table 8)**

Table 8 analyzes performance by benefit package, showing the percentage of benefit packages that improved or decreased performance from 2015–2017 and from 2016–2017. As in Table 7, results are shown from SNPs that met the minimum sample size of 30 or more. Comparisons between 2015 and 2017 were based on plans with submissions in all three years; comparisons between 2016 and 2017 were based on plans with submissions in 2016 and 2017.

Of the 27 measures where a comparison can be made, more than 50% of SNPs showed improvement on 18 measures from 2016–2017. Conversely, there were 9 measures where more than 50% of SNPs showed decreased performance from 2016–2017.

**Table 8. SNP Benefit Package Performance Changes HEDIS 2015–2017**

Measures	Percentage of SNPs With Changes in Performance 2015 2017*		Percentage of SNPs With Changes in Performance 2016 2017**	
	Improved Performance	Decreased Performance	Improved Performance	Decreased Performance
Colorectal Cancer Screening	NA	NA	NA	NA
Use of Spirometry Testing in the Assessment and Diagnosis of COPD	50.0	50.0	39.4	60.6
Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event	34.1	65.9	31.3	68.1
Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event	40.3	59.7	37.5	61.9
Controlling High Blood Pressure	64.6	35.4	62.9	36.8
Persistence of Beta-Blocker Treatment After a Heart Attack	61.9	38.1	52.0	46.0
Osteoporosis Management in Women Who Had a Fracture	64.0	36.0	44.6	55.4
Antidepressant Medication Management—Acute Phase	63.3	36.7	57.9	42.1
Antidepressant Medication Management—Continuation Phase	53.6	46.4	52.3	47.2
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge	56.0	44.0	63.0	37.0
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge	57.0	43.0	57.1	42.9
Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring	64.8	34.8	52.8	43.7
Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring	52.2	46.7	42.7	54.2
Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring	64.1	35.1	53.2	42.1
Annual Monitoring for Patients on Persistent Medications—Total Rate	69.0	30.3	53.9	43.1
Medication Reconciliation Post-Discharge	65.6	34.4	93.8	6.2

Measures	Percentage of SNPs With Changes in Performance 2015 2017*		Percentage of SNPs With Changes in Performance 2016 2017**	
	Improved Performance	Decreased Performance	Improved Performance	Decreased Performance
Care for Older Adults—Advance Care Planning	71.5	26.7	65.3	33.1
Care for Older Adults—Medication Review	68.5	29.3	66.3	31.0
Care for Older Adults—Functional Status Assessment	75.6	21.5	66.6	29.4
Care for Older Adults—Pain Screening	69.6	27.0	58.2	38.1
Potentially Harmful Drug-Disease Interactions—History of Falls	54.5	45.5	52.2	47.8
Potentially Harmful Drug-Disease Interactions—Dementia	NA	NA	NA	NA
Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure	53.3	46.7	55.8	44.2
Potentially Harmful Drug-Disease Interactions—Total Rate	NA	NA	NA	NA
Use of High-Risk Medications in the Elderly—At Least One High-Risk Medication*	NA	NA	NA	NA
Use of High-Risk Medications in the Elderly—At Least Two Different High-Risk Medications	NA	NA	NA	NA
Active Board Certification—Family Medicine	23.8	72.8	26.8	67.4
Active Board Certification—Internal Medicine	34.3	61.5	26.8	67.4
Active Board Certification—Geriatrics	32.3	57.7	29.4	59.4
Active Board Certification—Other Physician Specialists	25.7	72.5	22.5	71.7
Plan All-Cause Readmissions (Risk-Adjusted Average ≥65)	70.6	29.4	59.2	40.8
Plan All-Cause Readmissions (Risk-Adjusted Average <65)	100.0	—	51.3	48.7

\*Includes only SNPs that reported rates in all three years, 2015–2017.

\*\*Includes only SNPs that reported rates in 2016 and 2017.

Cells with a dash (—) indicate that there were no data for calculation.

Shaded cells that contain “NA” (Not Applicable) represent a trend break where year-to-year comparison is not possible.

**Note:** The sum of SNPs with Improved Performance and Decreased Performance does not always equal 100%, because there are SNPs that had no change in performance.

## SNP HEDIS Data Submissions by Measure (Tables 9a and 9b)

Tables 9a and 9b show the number of SNPs reporting each HEDIS measure and rationales for SNPs that were unable to report valid rates for certain measures. A total of 464 SNPs submitted HEDIS measure results; 463 were required to submit HEDIS measure results and CMS received 1 additional submission from a SNP that did not provide the number of enrollees.

NCQA changed the audit requirement for the *Board Certification* measure beginning in HEDIS 2016: Measures and indicators are only required to be audited once every three years. If an organization's results were audited for HEDIS 2015, data are not required to be audited again until HEDIS 2018. Plans were not required to have the measures audited for HEDIS 2017 if data were audited for HEDIS 2016.

NCQA-Certified HEDIS Auditors categorized each measure as follows:

### Did Report Categories (Table 9a)

- Denominator  $\geq 30$  is designated as a Reportable Rate for individual plans.
- Denominator  $< 30$  receives an NA audit designation. These rates are not considered individually reportable.

### Did Not Report Categories (Table 9b)

- HEDIS measure rates generally have a 95% confidence interval. If NCQA-Certified HEDIS Auditors determine that a rate is likely to be biased by more than  $\pm 5$  percentage points because of data errors, they designate the rate Materially Biased.
- Chose Not to Report indicates that the SNP chose not to report a specific measure.

Table 9a reports the number of submissions by measure; Table 9b reports the rationale for SNPs that did not have reportable measure results. Measures not listed in this table had complete results across all five "did not report" categories.

As mentioned above, measure results must have denominators  $\geq 30$  to be considered reliable for individual SNP reporting. NCQA used measure results with denominators  $\geq 30$  for the SNP PBP-level performance analysis (Table 7). Measure results based on denominators  $< 30$  were not used in this analysis.

There were 15 measures for which more than 80% of the SNPs had a sufficient population to allow individual SNP-level reporting. *Annual Monitoring for Patients on Persistent Medications—Total Rate* had the largest number (450 [97%]) of SNPs with a sufficient population, followed by both *Use of High-Risk Medications in the Elderly* measures (449 [96.8%]).

There were 108 instances, 76 from *Active Board Certification* measures, when a SNP did not report a measure because it was found to be materially biased. There were 2 instances where SNPs chose not to report a measure.

SNPs were more likely to have denominators  $< 30$  for measures that address a new condition or incident (e.g., hospitalized and discharged with a heart attack during a defined period) or less prevalent conditions, because there are fewer patient encounters or actions to meet the numerator requirement. The four *Active Board Certification* measures had the smallest number of SNPs with denominators  $\geq 30$  (43 [9.3%]). *Persistence of Beta-Blocker Treatment After a Heart Attack* also had a small number of SNPs with denominators  $\geq 30$  (85 [18.3%]).

**Table 9a. SNP HEDIS 2017 Data Submission—Did Report**

Measures	Total Submissions		Denominator ≥30		Denominator <30	
	N	%	N	%	N	%
Colorectal Cancer Screening	464	100.0	390	84.1	74	15.9
Use of Spirometry Testing in the Assessment and Diagnosis of COPD	464	100.0	196	42.2	268	57.8
Pharmacotherapy of COPD Exacerbation—Dispensed Systemic Corticosteroid Within 14 Days of Event	464	100.0	260	56.0	204	44.0
Pharmacotherapy of COPD Exacerbation—Dispensed Bronchodilator Within 30 Days of Event	464	100.0	260	56.0	204	44.0
Controlling High Blood Pressure	450	97.0	380	81.9	70	15.1
Persistence of Beta-Blocker Treatment After a Heart Attack	464	100.0	85	18.3	379	81.7
Osteoporosis Management in Women Who Had a Fracture	464	100.0	90	19.4	374	80.6
Antidepressant Medication Management—Acute Phase	464	100.0	265	57.1	199	42.9
Antidepressant Medication Management—Continuation Phase	464	100.0	265	57.1	199	42.9
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge	462	99.6	174	37.5	288	62.1
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge	462	99.6	174	37.5	288	62.1
Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring	461	99.4	428	92.2	33	7.1
Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring	461	99.4	144	31.0	317	68.3
Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring	461	99.4	412	88.8	49	10.6
Annual Monitoring for Patients on Persistent Medications—Total Rate	461	99.4	450	97.0	11	2.4
Medication Reconciliation Post-Discharge	463	99.8	400	86.2	63	13.6
Care for Older Adults—Advance Care Planning	463	99.8	447	96.3	16	3.4
Care for Older Adults—Medication Review	463	99.8	447	96.3	16	3.4
Care for Older Adults—Functional Status Assessment	463	99.8	447	96.3	16	3.4
Care for Older Adults—Pain Screening	463	99.8	447	96.3	16	3.4
Potentially Harmful Drug-Disease Interactions—History of Falls	464	100.0	264	56.9	200	43.1
Potentially Harmful Drug-Disease Interactions—Dementia	464	100.0	272	58.6	192	41.4
Potentially Harmful Drug-Disease Interactions—Chronic Renal Failure	464	100.0	237	51.1	227	48.9

Measures	Total Submissions		Denominator ≥30		Denominator <30	
	N	%	N	%	N	%
Potentially Harmful Drug-Disease Interactions—Total Rate	464	100.0	338	72.8	126	27.2
Use of High-Risk Medications in the Elderly—At Least One High-Risk Medication	464	100.0	449	96.8	15	3.2
Use of High-Risk Medications in the Elderly—At Least Two Different High-Risk Medications	464	100.0	449	96.8	15	3.2
Active Board Certification—Family Medicine	45	9.7	43	9.3	2	0.4
Active Board Certification—Internal Medicine	45	9.7	43	9.3	2	0.4
Active Board Certification—Geriatrics	49	10.6	43	9.3	6	1.3
Active Board Certification—Other Physician Specialists	46	9.9	43	9.3	3	0.6
Plan All-Cause Readmissions (Risk-Adjusted Average ≥65)	424	91.4	405	87.3	19	4.1
Plan All-Cause Readmissions (Risk-Adjusted Average <65)	409	88.1	370	79.7	39	8.4

**Table 9b. SNP HEDIS 2017 Data Submission—Did Not Report**

Measures	DID NOT REPORT CATEGORIES									
	Materially Biased		Chose Not to Report		Benefit Not Offered		Out of Scope		Audit Not Required <sup>17</sup>	
	N	%	N	%	N	%	N	%	N	%
Controlling High Blood Pressure	14	3.0	0	0.0	0	0.0	0	0.0	0	0.0
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 30 Days of Discharge	0	0.0	0	0.0	2	0.4	0	0.0	0	0.0
Follow-Up After Hospitalization for Mental Illness—Follow-Up Within 7 Days of Discharge	0	0.0	0	0.0	2	0.4	0	0.0	0	0.0
Annual Monitoring for Patients on Persistent Medications—ACE/ARB Monitoring	3	0.6	0	0.0	0	0.0	0	0.0	0	0.0
Annual Monitoring for Patients on Persistent Medications—Digoxin Monitoring	3	0.6	0	0.0	0	0.0	0	0.0	0	0.0
Annual Monitoring for Patients on Persistent Medications—Diuretic Monitoring	3	0.6	0	0.0	0	0.0	0	0.0	0	0.0
Annual Monitoring for Patients on Persistent Medications—Total Rate	3	0.6	0	0.0	0	0.0	0	0.0	0	0.0
Medication Reconciliation Post-Discharge	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Care for Older Adults—Advance Care Planning	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Care for Older Adults—Medication Review	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Care for Older Adults—Functional Status Assessment	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Care for Older Adults—Pain Screening	1	0.2	0	0.0	0	0.0	0	0.0	0	0.0
Active Board Certification—Family Medicine	19	4.1	0	0.0	0	0.0	0	0.0	400	86.2
Active Board Certification—Internal Medicine	19	4.1	0	0.0	0	0.0	0	0.0	399	86.0
Active Board Certification—Geriatrics	19	4.1	0	0.0	0	0.0	0	0.0	396	85.3
Active Board Certification—Other Physician Specialists	19	4.1	0	0.0	0	0.0	0	0.0	399	86.0
Plan All-Cause Readmissions (Risk-Adjusted Average ≥65)	1	0.2	1	0.2	0	0.0	1	0.2	0	0.0
Plan All-Cause Readmissions (Risk-Adjusted Average <65)	0	0.0	1	0.2	0	0.0	0	0.0	0	0.0

<sup>17</sup>Active Board Certification measure is only required to audit every three years.

## Data Limitations

Analysis provides information about how well SNPs performed in key quality areas described in the body of this report. Limited results from small plans affects analysis. As of February 2017, there were 578 SNPs participating in the program; 464 were required by CMS to report HEDIS 2017. To provide a complete picture of the SNP environment, analyses systematically distinguished aggregate program performance from benefit package performance. Program-level analysis includes data from all SNP submissions, regardless of size, to generate a complete picture of the program.

HEDIS reporting guidelines require a minimum denominator of 30 for each measure. With a smaller number, the reliability and stability of rates for individual plans are below statistically acceptable levels. Some SNPs did not have 30 enrollees for any measure, although they had more than 30 enrollees overall and were therefore included in the analysis comparing benefit package performance. SNP overall program performance is included by measure, regardless of enrollment size.

Trend breaks for some measures in the report are the result of year-to-year changes in specifications for reportable measures. Trend breaks also result from introduction of new measures during the three-year analysis period or from measures that were no longer required, resulting in data that could not be trended during the review period.

### **HEDIS Exclusions for Nonacute Admissions**

---

For clinically appropriate reasons, there are exclusions in some HEDIS measures for enrollees admitted to nonacute inpatient facilities. Therefore, I-SNPs, which should have a higher percentage of membership in facilities, have more enrollees excluded from those measures than other types of plans. Two measures have optional exclusions; two have nonoptional exclusions for enrollees who are admitted to nonacute inpatient facilities. Exclusions apply to all SNP types and to other MA, commercial and Medicaid plans.

- *Controlling High Blood Pressure*. Optional exclusion of enrollees admitted to a nonacute inpatient setting.
- *Persistence of Beta-Blocker Treatment*. Exclude enrollees hospitalized for AMI but transferred directly to nonacute care facilities for any diagnosis.
- *Follow-Up After Hospitalization for Mental Illness*. Exclude enrollees discharged to nonacute care facilities after being hospitalized for mental illness.
- *Annual Monitoring for Patients on Persistent Medications*. Optional exclusion of enrollees who had acute or nonacute inpatient stays.

All submissions were reviewed by HEDIS Compliance Auditors, even if there were no enrollees in the measure denominator after the exclusion. I-SNP results indicate that there were enrollees living in the community (I-SNP enrollees must be at risk for institutionalization, but not necessarily institutionalized) or that some SNPs chose not to implement the optional exclusions.

## Appendix A: HEDIS Background

### About HEDIS

HEDIS is a comprehensive set of standardized performance measures designed to provide purchasers and consumers with the information they need for reliable comparison of health plan performance. The HEDIS measurement set is sponsored, supported and maintained by NCQA. Measures relate to many significant public health issues, such as cancer, heart disease, smoking, asthma and diabetes. SNPs can use HEDIS performance data to identify opportunities for improvement, monitor the success of quality improvement initiatives, track improvement and provide a set of measurement standards that allow comparison with other plans. Data allow identification of performance gaps and establishment of realistic targets for improvement. NCQA-Certified HEDIS Compliance Auditors verify all measure results using a process designed by NCQA.

Development of a HEDIS measure involves multiple steps of refinement and evaluation. NCQA's Committee on Performance Measurement (CPM), which oversees evolution of the measurement set, includes representation by purchasers, consumers, health plans, health care providers and policy makers. Measurement Advisory Panels (MAP) provide the clinical and technical knowledge required to develop measures. Additional HEDIS Expert Panels and the Technical Measurement Advisory Panel (TMAP) identify methodological issues and give feedback on new and existing measures.

### Measure Selection

With guidance from the Geriatric MAP, NCQA recommended to CMS a subset of HEDIS measures to be reported by SNPs. Starting with measures reported by MA plans at the contract level, the subset was then defined by one of the following qualities:

1. An upper age limit above 75 years of age, because measures with an upper age limit below 75 would exclude many SNP beneficiaries, **or**
2. Measures focus on overall health management rather than on one disease or condition, and are therefore appropriate for a population with multiple comorbid conditions.

SNPs reported the following measures in HEDIS 2017:

- *Colorectal Cancer Screening.*
- *Care for Older Adults.*
- *Use of Spirometry Testing in the Assessment and Diagnosis of COPD.*
- *Pharmacotherapy of COPD Exacerbation.*
- *Controlling High Blood Pressure.*
- *Persistence of Beta-Blocker Treatment After a Heart Attack.*
- *Annual Monitoring for Patients on Persistent Medications.*
- *Medication Reconciliation Post-Discharge.*
- *Potentially Harmful Drug-Disease Interactions in the Elderly\*.*
- *Use of High-Risk Medications in the Elderly\*.*
- *Osteoporosis Management in Women Who Had a Fracture.*
- *Antidepressant Medication Management.*

- *Follow-Up After Hospitalization for Mental Illness.*
- *Board Certification.*
- *Plan All-Cause Readmission\*.*

\*Lower rate indicates better performance.

Appendix B contains the technical specifications for these measures.

**Note:** *HEDIS 2017 results are reported in 2017 and primarily cover services delivered in 2016.*

## **Data Collection and Validation Process**

To submit HEDIS measures, SNPs used NCQA's web-based Interactive Data Submission System, which has extensive data validation checks. Before the submission process, NCQA collected SNP benefit package profile data to determine reporting eligibility. HEDIS measures were reported by SNPs with an enrollment of  $\geq 30$  enrollees as of the CMS February 2016 SNP Comprehensive Report, which has enrollment figures for mid-January 2016.

Before data were submitted to NCQA, every SNP benefit package submission underwent a HEDIS Compliance Audit™. The audit consisted of an overall assessment of information systems capabilities (IS standards), followed by an evaluation of a plan's ability to comply with HEDIS specifications (HD standards). NCQA-Certified HEDIS Auditors reviewed systems, policies and procedures and final data results to ensure that measures were correctly calculated and reported.

## **Appendix B: HEDIS 2017 Technical Specifications**

This appendix contains the HEDIS 2017 technical specifications for the HEDIS measures that SNPs were required to report.

HEDIS® is a registered trademark of the National Committee for Quality Assurance (NCQA). The HEDIS measures and specifications were developed by and are owned by the National Committee for Quality Assurance (“NCQA”). NCQA holds a copyright in the HEDIS measures and specifications and may rescind or alter these measures and specifications at any time. Users of the HEDIS measures and specifications shall not have the right to alter, enhance or otherwise modify the HEDIS measures and specifications, and shall not disassemble, recompile or reverse engineer the HEDIS measures and specifications. Anyone desiring to use or reproduce the materials without modification for a noncommercial purpose may do so without obtaining any approval from NCQA. All commercial uses or requests for alteration of the HEDIS measures and specifications must be approved by NCQA and are subject to a license at the discretion of NCQA.

HEDIS measures and specifications are not clinical guidelines, do not establish a standard of medical care and have not been tested for all potential applications. The measures and specifications are provided “as is” without warranty of any kind. NCQA makes no representations, warranties or endorsements about the quality of any product, test or protocol identified as numerator compliant or otherwise identified as meeting the requirements of a HEDIS measure or specification. NCQA also makes no representations, warranties or endorsements about the quality of any organization or clinician who uses or reports performance measures. NCQA has no liability to anyone who relies on HEDIS measures and specifications or data reflective of performance under such measures and specifications.

## Colorectal Cancer Screening (COL)

### Summary of Changes to HEDIS 2017

- Clarified when pathology reports may be used for the numerator.

### Description

The percentage of members 50–75 years of age who had appropriate screening for colorectal cancer.

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. If an organization reports this measure using the Hybrid method, and a member is found to be in hospice or using hospice services during medical record review, the member is removed from the sample and replaced by a member from the oversample. Refer to General Guideline 20: Members in Hospice.

<b>Product lines</b>	Commercial, Medicare (report each product line separately).
<b>Ages</b>	51–75 years as of December 31 of the measurement year.
<b>Continuous enrollment</b>	The measurement year and the year prior to the measurement year.
<b>Allowable gap</b>	No more than one gap in continuous enrollment of up to 45 days during each year of continuous enrollment.
<b>Anchor date</b>	December 31 of the measurement year.
<b>Benefit</b>	Medical.
<b>Event/diagnosis</b>	None.

### Administrative Specification

<b>Denominator</b>	The eligible population.
<b>Numerator</b>	One or more screenings for colorectal cancer. Any of the following meet criteria: <ul style="list-style-type: none"> <li>• Fecal occult blood test (<u>FOBT Value Set</u>) during the measurement year. For administrative data, assume the required number of samples were returned, regardless of FOBT type.</li> <li>• Flexible sigmoidoscopy (<u>Flexible Sigmoidoscopy Value Set</u>) during the measurement year or the four years prior to the measurement year.</li> <li>• Colonoscopy (<u>Colonoscopy Value Set</u>) during the measurement year or the nine years prior to the measurement year.</li> </ul>

## Exclusion (optional)

Either of the following any time during the member's history through December 31 of the measurement year:

- Colorectal cancer (Colorectal Cancer Value Set).
- Total colectomy (Total Colectomy Value Set).

## Hybrid Specification

**Denominator** A systematic sample drawn from the eligible population for each product line. Organizations may reduce the sample size using the current year's administrative rate or the prior year's audited, product line-specific rate. Refer to the *Guidelines for Calculations and Sampling* for information on reducing the sample size.

**Numerator** One or more screenings for colorectal cancer. Appropriate screenings are defined by one of the following:

- FOBT during the measurement year.
- Flexible sigmoidoscopy during the measurement year or the four years prior to the measurement year.
- Colonoscopy during the measurement year or the nine years prior to the measurement year.

**Administrative** Refer to *Administrative Specification* to identify positive numerator hits from the administrative data.

**Medical record** Documentation in the medical record must include a note indicating the date when the colorectal cancer screening was performed. A result is not required if the documentation is clearly part of the "medical history" section of the record; if this is not clear, the result or finding must also be present (this ensures that the screening was performed and not merely ordered).

A pathology report that indicates the type of screening (e.g., colonoscopy, flexible sigmoidoscopy) and the date when the screening was performed meets criteria.

For pathology reports that do not indicate the type of screening and for incomplete procedures:

- Evidence that the scope advanced beyond the splenic flexure meets criteria for a completed colonoscopy.
- Evidence that the scope advanced into the sigmoid colon meets criteria for a completed flexible sigmoidoscopy.

There are two types of FOBT tests: guaiac (gFOBT) and immunochemical (iFOBT). Depending on the type of FOBT test, a certain number of samples are required for numerator compliance. Follow the instructions below to determine member compliance.

- If the medical record does not indicate the type of test and there is no indication of how many samples were returned, assume the required

number was returned. The member meets the screening criteria for inclusion in the numerator.

- If the medical record does not indicate the type of test and the number of returned samples is specified, the member meets the screening criteria only if the number of samples specified is greater than or equal to three samples. If there are fewer than three samples, the member does not meet the screening criteria for inclusion.
- iFOBT tests may require fewer than three samples. If the medical record indicates that an iFOBT was done, the member meets the screening criteria, regardless of how many samples were returned
- If the medical record indicates that a gFOBT was done, follow the scenarios below.
  - *If the medical record does not indicate the number of returned samples, assume the required number was returned. The member meets the screening criteria for inclusion in the numerator.*
  - *If the medical record indicates that three or more samples were returned, the member meets the screening criteria for inclusion in the numerator.*
  - *If the medical record indicates that fewer than three samples were returned, the member does not meet the screening criteria.*

*Do not count digital rectal exams (DRE), FOBT tests performed in an office setting or performed on a sample collected via DRE.*

### **Exclusion (optional)**

---

Refer to *Administrative Specification* for exclusion criteria. Exclusionary evidence in the medical record must include a note indicating colorectal cancer or total colectomy any time during the member's history through December 31 of the measurement year.

## Data Elements for Reporting

Organizations that submit HEDIS data to NCQA must provide the following data elements. Cells with a dash (—) indicate data are not required.

**Table COL-2/3: Data Elements for Colorectal Cancer Screening**

	Administrative	Hybrid
Measurement year	✓	✓
Data collection methodology (Administrative or Hybrid)	✓	✓
Eligible population	✓	✓
Number of numerator events by administrative data in eligible population (before exclusions)	—	✓
Current year's administrative rate (before exclusions)	—	✓
Minimum required sample size (MRSS) or other sample size	—	✓
Oversampling rate	—	✓
Final sample size (FSS)	—	✓
Number of numerator events by administrative data in FSS	—	✓
Administrative rate on FSS	—	✓
Number of original sample records excluded because of valid data errors	—	✓
Number of administrative data records excluded	—	✓
Number of medical records excluded	—	✓
Number of employee/dependent medical records excluded	—	✓
Records added from the oversample list	—	✓
Denominator	—	✓
Numerator events by administrative data	✓	✓
Numerator events by medical records	—	✓
Numerator events by supplemental data	✓	✓
Reported rate	✓	✓
Lower 95% confidence interval	✓	✓
Upper 95% confidence interval	✓	✓

## Care for Older Adults (COA)

### Summary of Changes to HEDIS 2017

- Added the Medicare-Medicaid (MMP) product line.
- Clarified in advance care plan examples that medical power of attorney is an advance directive.
- Clarified examples of an advance care planning discussion.
- Replaced “Each of the 4 rates” with a “✓” for the “Measurement year” row in Table COA-3.

### Description

The percentage of adults 66 years and older who had each of the following during the measurement year:

- Advance care planning.
- Medication review.
- Functional status assessment.
- Pain assessment.

### Definitions

<b>Medication list</b>	A list of the member’s medications in the medical record. The medication list may include medication names only or may include medication names, dosages and frequency, over-the-counter (OTC) medications and herbal or supplemental therapies.
<b>Medication review</b>	A review of all a member’s medications, including prescription medications, OTC medications and herbal or supplemental therapies.

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. If an organization reports this measure using the Hybrid method, and a member is found to be in hospice or using hospice services during medical record review, the member is removed from the sample and replaced by a member from the oversample. Refer to General Guideline 20: Members in Hospice.

<b>Product line</b>	Medicare SNP, MMP.
<b>Ages</b>	66 years and older as of December 31 of the measurement year.
<b>Continuous enrollment</b>	The measurement year.
<b>Allowable gap</b>	No more than one gap in continuous enrollment of up to 45 days during the measurement year.
<b>Anchor date</b>	December 31 of the measurement year.

**Benefit** Medical.

**Event/  
diagnosis** None.

### Administrative Specification

**Denominator** The eligible population.

#### Numerators

**Advance Care Planning** Evidence of advance care planning during the measurement year (Advance Care Planning Value Set).

**Medication Review** Any of the following meet criteria.

- Both of the following on the same date of service during the measurement year:
  - At least one medication review (Medication Review Value Set) conducted by a prescribing practitioner or clinical pharmacist.
  - The presence of a medication list in the medical record (Medication List Value Set).
- Transitional care management services (TCM 7 Day Value Set) where the reported date of service on the claim is on or between January 30 of the measurement year and January 22 of the year after the measurement year.
- Transitional care management services (TCM 14 Day Value Set) where the reported date of service on the claim is on or between January 30 of the measurement year and January 15 of the year after the measurement year.

*Transitional care management is a 30-day period that begins on the date of discharge and continues for the next 29 days. The date of service on the claim is 29 days after discharge and not the date of the face-to-face visit. Medication management must be furnished no later than the date of the face-to-face visit.*

**Functional Status Assessment** At least one functional status assessment (Functional Status Assessment Value Set) during the measurement year.

**Pain Assessment** At least one pain assessment (Pain Assessment Value Set) during the measurement year.

### Hybrid Specification

**Denominator** A systematic sample drawn from the eligible population. Organizations may reduce the sample size using the current year’s administrative rate or the prior year’s audited, product line-specific rate. Refer to the *Guidelines for Calculations and Sampling* for information on reducing the sample size.

## Numerators

**Advance Care Planning** Evidence of advance care planning as documented through either administrative data or medical record review.

**Administrative** Refer to *Administrative Specification* to identify positive numerator hits from administrative data.

### Medical record

**Advance care planning** is a discussion about preferences for resuscitation, life-sustaining treatment and end of life care. Evidence of advance care planning must include one of the following:

- The presence of an advance care plan in the medical record.
- Documentation of an advance care planning **discussion** with the provider **and** the date when it was discussed. The documentation of discussion must be noted during the measurement year.
- Notation that the member previously executed an advance care plan.

#### **Examples of an advance care plan**

- **Advance directive.** Directive about treatment preferences and the designation of a surrogate who can make medical decisions for a patient who is unable to make them (e.g., living will, health care power of attorney, health care proxy).
- **Actionable medical orders.** Written instructions regarding initiating, continuing, withholding or withdrawing specific forms of life-sustaining treatment (e.g., Physician Orders for Life Sustaining Treatment [POLST], Five Wishes).
- **Living will.** Legal document denoting preferences for life-sustaining treatment and end-of-life care.
- **Surrogate decision maker.** A written document designating someone other than the member to make future medical treatment choices.

#### **Examples of an advance care planning discussion**

- Notation in the medical record of a discussion with a provider or initiation of a discussion by a provider during the measurement year.
  - Documentation that a provider asked the member if an advance care plan was in place and the member indicated a plan was not in place is not considered a discussion or initiation of a discussion.
- **Oral statements.** Conversations with relatives or friends about life-sustaining treatment and end-of-life care, documented in the medical record. Patient designation of an individual who can make decisions on behalf of the patient. Evidence of oral statements must be noted in the medical record during the measurement year.

**Medication Review** At least one medication review conducted by a prescribing practitioner or clinical pharmacist during the measurement year **and** the presence of a medication list in the medical record, as documented through either administrative data or medical record review. A medication list, signed and dated during the measurement year by the appropriate practitioner type (prescribing practitioner or clinical pharmacist), meets criteria (the

practitioner’s signature is considered evidence that the medications were reviewed).

**Administrative** Refer to *Administrative Specification* to identify positive numerator hits from administrative data.

**Medical record** Documentation must come from the same medical record and must include one of the following:

- A medication list in the medical record, **and** evidence of a medication review by a prescribing practitioner or clinical pharmacist and the date when it was performed.
- Notation that the member is not taking any medication and the date when it was noted.

A review of side effects for a single medication at the time of prescription alone is not sufficient. An outpatient visit is not required to meet criteria.

***Functional Status Assessment*** At least one functional status assessment during the measurement year, as documented through either administrative data or medical record review.

**Administrative** Refer to *Administrative Specification* to identify positive numerator hits from administrative data.

**Medical record** Documentation in the medical record must include evidence of a complete functional status assessment and the date when it was performed.

***Notations for a complete functional status assessment must include one of the following:***

- Notation that Activities of Daily Living (ADL) were assessed or that at least five of the following were assessed: bathing, dressing, eating, transferring [e.g., getting in and out of chairs], using toilet, walking.
- Notation that Instrumental Activities of Daily Living (IADL) were assessed or at least four of the following were assessed: shopping for groceries, driving or using public transportation, using the telephone, meal preparation, housework, home repair, laundry, taking medications, handling finances.
- Result of assessment using a standardized functional status assessment tool, not limited to:
  - SF-36®.
  - Assessment of Living Skills and Resources (ALSAR).
  - Barthel ADL Index Physical Self-Maintenance (ADLS) Scale.
  - Bayer ADL (B-ADL) Scale.
  - Barthel Index.
  - Extended ADL (EADL) Scale.
  - Independent Living Scale (ILS).
  - Katz Index of Independence in ADL.
  - Kenny Self-Care Evaluation.
  - Klein-Bell ADL Scale.

- Kohlman Evaluation of Living Skills (KELS).
- Lawton & Brody's IADL scales.
- Patient Reported Outcome Measurement Information System (PROMIS) Global or Physical Function Scales.
- Notation that at least three of the following four components were assessed:
  - Cognitive status.
  - Ambulation status.
  - Hearing, vision and speech (i.e., sensory ability).
  - Other functional independence (e.g., exercise, ability to perform job).

A functional status assessment limited to an acute or single condition, event or body system (e.g., lower back, leg) does not meet criteria for a comprehensive functional status assessment. The components of the functional status assessment numerator may take place during separate visits within the measurement year.

***Pain Assessment*** At least one pain assessment during the measurement year, as documented through either administrative data or medical record review.

**Administrative** Refer to *Administrative Specification* to identify positive numerator hits from administrative data.

**Medical record** Documentation in the medical record must include evidence of a pain assessment and the date when it was performed.

***Notations for a pain assessment must include one of the following:***

- Documentation that the patient was assessed for pain (which may include positive or negative findings for pain).
- Result of assessment using a standardized pain assessment tool, not limited to:
  - Numeric rating scales (verbal or written).
  - Face, Legs, Activity, Cry Consolability (FLACC) scale.
  - Verbal descriptor scales (5–7 Word Scales, Present Pain Inventory).
  - Pain Thermometer.
  - Pictorial Pain Scales (Faces Pain Scale, Wong-Baker Pain Scale).
  - Visual analogue scale.
  - Brief Pain Inventory.
  - Chronic Pain Grade.
  - PROMIS Pain Intensity Scale.
  - Pain Assessment in Advanced Dementia (PAINAD) Scale.

**Note**

- Notation of a pain management plan alone does not meet criteria.
- Notation of a pain treatment plan alone does not meet criteria.
- Notation of screening for chest pain alone or documentation of chest pain alone does not meet criteria.
- Refer to Appendix 3 for the definition of clinical pharmacist and prescribing practitioner.

**Data Elements for Reporting**

Organizations that submit HEDIS data to NCQA must provide the following data elements. Cells with a dash (—) indicate data are not required.

**Table COA-3: Data Elements for Care for Older Adults**

	Administrative	Hybrid
Measurement year	✓	✓
Data collection methodology (Administrative or Hybrid)	Each of the 4 rates	Each of the 4 rates
Eligible population	Each of the 4 rates	Each of the 4 rates
Number of numerator events by administrative data in eligible population (before exclusions)	—	Each of the 4 rates
Current year's administrative rate (before exclusions)	—	Each of the 4 rates
Minimum required sample size (MRSS) or other sample size	—	Each of the 4 rates
Oversampling rate	—	Each of the 4 rates
Final sample size (FSS)	—	Each of the 4 rates
Number of numerator events by administrative data in FSS	—	Each of the 4 rates
Administrative rate on FSS	—	Each of the 4 rates
Number of original sample records excluded because of valid data errors	—	Each of the 4 rates
Number of employee/dependent medical records excluded	—	Each of the 4 rates
Records added from the oversample list	—	Each of the 4 rates
Denominator	—	Each of the 4 rates
Numerator events by administrative data	Each of the 4 rates	Each of the 4 rates
Numerator events by medical records	—	Each of the 4 rates
Numerator events by supplemental data	Each of the 4 rates	Each of the 4 rates
Reported rate	Each of the 4 rates	Each of the 4 rates
Lower 95% confidence interval	Each of the 4 rates	Each of the 4 rates
Upper 95% confidence interval	Each of the 4 rates	Each of the 4 rates

## Use of Spirometry Testing in the Assessment and Diagnosis of COPD (SPR)

### Summary of Changes to HEDIS 2017

- Clarified the allowable gap criteria for Medicaid beneficiaries whose enrollment is verified monthly.
- Clarified that the first admission date should be used (if the admission is followed by a direct transfer) when determining the negative diagnosis history in step 2.
- Added instructions to identify ED visits and observation visits that result in an inpatient stay.

### Description

The percentage of members 40 years of age and older with a new diagnosis of COPD or newly active COPD, who received appropriate spirometry testing to confirm the diagnosis.

### Definitions

<b>Intake Period</b>	A 12-month window that begins on July 1 of the year prior to the measurement year and ends on June 30 of the measurement year. The Intake Period captures the first COPD diagnosis.
<b>IESD</b>	<p>Index Episode Start Date. The earliest date of service for an eligible visit (outpatient, ED or acute inpatient) during the Intake Period with any diagnosis of COPD.</p> <p><i>For an outpatient, observation or ED visit, the IESD is the date of service.</i></p> <p><i>For an acute inpatient discharge, the IESD is the date of discharge.</i></p> <p><i>For an acute inpatient discharge with a direct transfer, the IESD is the discharge date of the original admission.</i></p>
<b>Negative Diagnosis History</b>	<p>The 730 days (2 years) prior to the IESD, when the member had no claims/encounters containing any diagnosis of COPD.</p> <p><i>For an acute inpatient IESD, use the IESD date of admission to determine the 730 days prior to the IESD.</i></p>

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. Refer to General Guideline 20: Members in Hospice.

<b>Product lines</b>	Commercial, Medicaid, Medicare (report each product line separately).
<b>Ages</b>	42 years or older as of December 31 of the measurement year.
<b>Continuous enrollment</b>	730 days (2 years) prior to the IESD through 180 days (6 months) after the IESD.

**Allowable gap** One gap in enrollment of up to 45 days is allowed in each of the 12-month periods prior to the IESD or in the 6-month period after the IESD, for a maximum of two gaps total. To determine continuous enrollment for a Medicaid beneficiary for whom enrollment is verified monthly, the member may not have more than a 1-month gap in coverage (i.e., a member whose coverage lapses for 2 months [60 days] is not considered continuously enrolled) in each of the 12-month periods prior to the IESD or in the 6-month period after the IESD, for a maximum of two gaps total.

**Anchor date** IESD.

**Benefit** Medical.

**Event/diagnosis** The first visit with a diagnosis of COPD during the Intake Period. Follow the steps below to identify the eligible population for the measure.

**Step 1** Identify all members who had any of the following during the Intake Period.

- An outpatient visit (Outpatient Value Set), an observation visit (Observation Value Set) or an ED visit (ED Value Set) with any diagnosis of COPD (COPD Value Set), emphysema (Emphysema Value Set) or chronic bronchitis (Chronic Bronchitis Value Set).
  - Do not include ED visits or observation visits that result in an inpatient stay (Inpatient Stay Value Set). An ED visit or observation visit results in an inpatient stay when the ED/observation date of service and the admission date for the inpatient stay are one calendar day apart or less.
- An acute inpatient discharge with any diagnosis of COPD (COPD Value Set), emphysema (Emphysema Value Set) or chronic bronchitis (Chronic Bronchitis Value Set). To identify acute inpatient discharges:
  1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
  2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
  3. Identify the discharge date for the stay.

If the member had more than one eligible visit, include only the first visit.

**Step 2** Test for Negative Diagnosis History. Exclude members who had any of the following during the 730 days prior to the IESD:

- An outpatient visit (Outpatient Value Set), an observation visit (Observation Value Set) or an ED visit (ED Value Set) with any diagnosis of COPD (COPD Value Set), emphysema (Emphysema Value Set) or chronic bronchitis (Chronic Bronchitis Value Set).
  - Do not include ED visits or observation visits that result in an inpatient stay (Inpatient Stay Value Set). An ED visit or observation visit results in an inpatient stay when the ED/observation date of service and the admission date for the inpatient stay are one calendar day apart or less.
- An acute inpatient discharge with any diagnosis of COPD (COPD Value Set), emphysema (Emphysema Value Set) or chronic bronchitis (Chronic Bronchitis Value Set). To identify acute inpatient discharges:

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
3. Identify the discharge date for the stay.

*For an acute inpatient IESD, use the IESD date of admission to determine the 730 days prior to the IESD. For direct transfers, use the admission date of the original admission to determine the 730 days prior to the IESD.*

**Step 3** Calculate continuous enrollment. Members must be continuously enrolled in the organization 730 days (2 years) prior to the IESD through 180 days (6 months) after the IESD.

### Administrative Specification

**Denominator** The eligible population.

**Numerator** At least one claim/encounter for spirometry (Spirometry Value Set) during the 730 days (2 years) prior to the IESD through 180 days (6 months) after the IESD.

### Data Elements for Reporting

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table SPR-1/2/3: Data Elements for Use of Spirometry Testing in the Assessment and Diagnosis of COPD**

	Administrative
Measurement year	✓
Data collection methodology (Administrative)	✓
Eligible population	✓
Numerator events by administrative data	✓
Numerator events by supplemental data	✓
Reported rate	✓
Lower 95% confidence interval	✓
Upper 95% confidence interval	✓

## Pharmacotherapy Management of COPD Exacerbation (PCE)

### Summary of Changes to HEDIS 2017

- Added instructions to identify ED visits that result in an inpatient stay (step 1).
- Deleted the direct transfer exclusion and added a requirement to use the discharge date from the last admission (step 3).
- Added instructions to identify direct transfers (step 3).
- Deleted the exclusion of Episode Dates when there was a readmission or an ED visits within 14 days (formerly step 4).

### Description

The percentage of COPD exacerbations for members 40 years of age and older who had an acute inpatient discharge or ED visit on or between January 1–November 30 of the measurement year and who were dispensed appropriate medications. Two rates are reported:

1. Dispensed a systemic corticosteroid (or there was evidence of an active prescription) within 14 days of the event.
2. Dispensed a bronchodilator (or there was evidence of an active prescription) within 30 days of the event.

**Note:** *The eligible population for this measure is based on acute inpatient discharges and ED visits, not on members. It is possible for the denominator to include multiple events for the same individual.*

### Definitions

<b>Intake Period</b>	An 11-month period that begins on January 1 of the measurement year and ends on November 30 of the measurement year. The Intake Period captures eligible episodes of treatment.
<b>Episode Date</b>	The date of service for any acute inpatient discharge or ED visit during the Intake Period with a principal diagnosis of COPD.  <i>For an acute inpatient discharge, the Episode Date is the date of discharge.</i> <i>For direct transfers (to acute or nonacute settings), the IESD is the discharge date from the transfer admission.</i> <i>For an ED visit, the Episode Date is the date of service.</i>
<b>Active prescription</b>	A prescription is considered active if the “days supply” indicated on the date the member filled the prescription is the number of days or more between that date and the relevant date.  <i>For an acute inpatient stay, the relevant date is the date of admission.</i> <i>For an ED visit, the relevant date is the date of service.</i>

## Eligible Population

**Note:** Members in hospice are excluded from the eligible population. Refer to General Guideline 20: Members in Hospice.

**Product lines** Commercial, Medicaid, Medicare (report each product line separately).

**Ages** 40 years or older as of January 1 of the measurement year.

**Continuous enrollment** Episode Date through 30 days after the Episode Date.

**Allowable gap** None.

**Anchor date** Episode Date.

**Benefits** Medical and pharmacy.

**Event/diagnosis** A COPD exacerbation as indicated by an acute inpatient discharge or ED encounter with a principal diagnosis of COPD.

Follow the steps below to identify the eligible population.

**Step 1** Identify all members who had either of the following during the Intake Period:

- An ED visit (ED Value Set) with a principal diagnosis of COPD (COPD Value Set), emphysema (Emphysema Value Set) or chronic bronchitis (Chronic Bronchitis Value Set).
  - Do not include ED visits that result in an inpatient stay (Inpatient Stay Value Set). An ED visit results in an inpatient stay when the ED date of service and the admission date for the inpatient stay are one calendar day apart or less.
- An acute inpatient discharge with a principal diagnosis of COPD (COPD Value Set), emphysema (Emphysema Value Set) or chronic bronchitis (Chronic Bronchitis Value Set). To identify acute inpatient discharges:
  1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
  2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
  3. Identify the discharge date for the stay.

**Step 2** Identify all COPD Episode Dates. For each member identified in step 1, identify all acute inpatient discharges and ED visits.

**Step 3** Test for direct transfers. For Episode Dates with a direct transfer (to an acute or nonacute setting for any diagnosis), the IESD is the discharge date from the last admission.

A **direct transfer** is when the discharge date from one inpatient setting and the admission date to a second inpatient setting are one calendar day apart or less. For example:

- An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 1, is a direct transfer.

- An inpatient discharge on June 1, followed by an admission to an inpatient setting on June 2, is a direct transfer.
- An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 3, is not a direct transfer; these are two distinct inpatient stays.

Use the following method to identify admissions to and discharges from inpatient settings.

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Identify the admission and discharge dates for the stay.

**Step 4** Calculate continuous enrollment. The member must be continuously enrolled without a gap in coverage from the Episode Date through 30 days after the Episode Date.

**Note:** All Episode Dates that were not excluded remain in the denominator. The denominator for this measure is based on acute inpatient discharges and ED visits, not members.

### Administrative Specification

**Denominator** The eligible population.

**Numerators**

**Systemic corticosteroid** Dispensed prescription for systemic corticosteroid (Table PCE-C) on or 14 days after the Episode Date. Count systemic corticosteroids that are active on the relevant date.

**Table PCE-C: Systemic Corticosteroids**

Description	Prescription			
Glucocorticoids	• Betamethasone	• Hydrocortisone	• Prednisolone	• Triamcinolone
	• Dexamethasone	• Methylprednisolone	• Prednisone	

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Bronchodilator** Dispensed prescription for a bronchodilator (Table PCE-D) on or 30 days after the Episode Date. Count bronchodilators that are active on the relevant date.

**Table PCE-D: Bronchodilators**

Description	Prescription		
Anticholinergic agents	<ul style="list-style-type: none"> <li>• Albuterol-ipratropium</li> <li>• Acclidinium-bromide</li> </ul>	<ul style="list-style-type: none"> <li>• Ipratropium</li> <li>• Tiotropium</li> </ul>	<ul style="list-style-type: none"> <li>• Umeclidinium</li> </ul>
Beta 2-agonists	<ul style="list-style-type: none"> <li>• Albuterol</li> <li>• Arformoterol</li> <li>• Budesonide-formoterol</li> <li>• Fluticasone-salmeterol</li> <li>• Fluticasone-vilanterol</li> </ul>	<ul style="list-style-type: none"> <li>• Formoterol</li> <li>• Indacaterol</li> <li>• Levalbuterol</li> <li>• Mometasone-formoterol</li> <li>• Metaproterenol</li> </ul>	<ul style="list-style-type: none"> <li>• Olodaterol hydrochloride</li> <li>• Olodaterol-tiotropium</li> <li>• Pirbuterol</li> <li>• Salmeterol</li> <li>• Umeclidinium-vilanterol</li> </ul>
Methylxanthines	<ul style="list-style-type: none"> <li>• Aminophylline</li> <li>• Dyphylline-guaifenesin</li> <li>• Guaifenesin-theophylline</li> </ul>	<ul style="list-style-type: none"> <li>• Dyphylline</li> <li>• Theophylline</li> </ul>	

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

### Data Elements for Reporting

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table PCE-1/2/3: Data Elements for Pharmacotherapy Management of COPD Exacerbation**

	Administrative
Measurement year	✓
Data collection methodology (Administrative)	✓
Eligible population	✓
Numerator events by administrative data	Each of the 2 rates
Numerator events by supplemental data	Each of the 2 rates
Reported rate	Each of the 2 rates
Lower 95% confidence interval	Each of the 2 rates
Upper 95% confidence interval	Each of the 2 rates

## Controlling High Blood Pressure (CBP)

### Summary of Changes to HEDIS 2017

- Added a *Note* clarifying the intent when confirming the diagnosis of hypertension.
- Revised Table CBP-1/2/3 to include the medical record data elements only.

### Description

The percentage of members 18–85 years of age who had a diagnosis of hypertension (HTN) and whose BP was adequately controlled during the measurement year based on the following criteria:

- Members 18–59 years of age whose BP was <140/90 mm Hg.
- Members 60–85 years of age with a diagnosis of diabetes whose BP was <140/90 mm Hg.
- Members 60–85 years of age without a diagnosis of diabetes whose BP was <150/90 mm Hg.

**Note:** Use the Hybrid Method for this measure. A single rate is reported and is the sum of all three groups.

### Definitions

#### Adequate control

Adequate control is defined as meeting any of the following criteria:

- Members 18–59 years of age whose BP was <140/90 mm Hg.
- Members 60–85 years of age with a diagnosis of diabetes whose BP was <140/90 mm Hg.
- Members 60–85 years of age without a diagnosis of diabetes whose BP was <150/90 mm Hg.

#### Representative BP

The most recent BP reading during the measurement year (as long as it occurred after the diagnosis of hypertension). If multiple BP measurements occur on the same date, or are noted in the chart on the same date, use the lowest systolic and lowest diastolic BP reading. If no BP is recorded during the measurement year, assume that the member is “not controlled.”

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. If a member is found to be in hospice or using hospice services during medical record review, the member is removed from the sample and replaced by a member from the oversample. Refer to General Guideline 20: Members in Hospice.

<b>Product lines</b>	Commercial, Medicaid, Medicare (report each product line separately).
<b>Ages</b>	18–85 years as of December 31 of the measurement year.
<b>Continuous enrollment</b>	The measurement year.

**Allowable gap** No more than one gap in continuous enrollment of up to 45 days during the measurement year. To determine continuous enrollment for a Medicaid beneficiary for whom enrollment is verified monthly, the member may not have more than a 1-month gap in coverage (i.e., a member whose coverage lapses for 2 months [60 days] is not considered continuously enrolled).

**Anchor date** December 31 of the measurement year.

**Benefit** Medical.

**Event/diagnosis** Members are identified as hypertensive if there is at least one outpatient visit (Outpatient Without UBREV Value Set) with a diagnosis of hypertension (Essential Hypertension Value Set) during the first six months of the measurement year.

**Diabetes flag for numerator assessment** After the Eligible Population is identified, assign each member either a **diabetic** or **not diabetic** flag using only administrative data and the steps below. The flag is used to determine the appropriate BP threshold to use during numerator assessment (the threshold for members with diabetes is different than the threshold for members without diabetes).

**Step 1** Assign a flag of **diabetic** to members identified as diabetic using claim/encounter data or pharmacy data. The organization must use both methods to assign the diabetes flag, but a member only needs to be identified by one method. Members may be identified as having diabetes during the measurement year or the year prior to the measurement year.

*Claim/encounter data.* Members who met any of the following criteria during the measurement year or the year prior to the measurement year (count services that occur over both years):

- At least two outpatient visits (Outpatient Value Set), observation visits (Observation Value Set), ED visits (ED Value Set) or nonacute inpatient encounters (Nonacute Inpatient Value Set) on different dates of service, with a diagnosis of diabetes (Diabetes Value Set). Visit type need not be the same for the two visits.
- At least one acute inpatient encounter (Acute Inpatient Value Set) with a diagnosis of diabetes (Diabetes Value Set).

*Pharmacy data.* Members who were dispensed insulin or hypoglycemics/antihyperglycemics on an ambulatory basis during the measurement year or the year prior to the measurement year (Table CDC-A).

**Step 2** From the members identified in step 1, assign a flag of **not diabetic** to members who do not have a diagnosis of diabetes (Diabetes Value Set), in any setting, during the measurement year or year prior to the measurement year **and** who had a diagnosis of gestational diabetes or steroid-induced diabetes (Diabetes Exclusions Value Set), in any setting, during the measurement year or the year prior to the measurement year.

**Note:** Members classified as **diabetic** in step 1 based on pharmacy data alone and who had a diagnosis of gestational or steroid-induced diabetes as specified above are re-classified as **not diabetic** in this step.

- Step 3** Assign a flag of *not diabetic* to members who were not assigned a flag in step 1 or step 2.

### Hybrid Specification

**Denominator** A systematic sample drawn from the eligible population for each product line whose diagnosis of hypertension is confirmed by chart review. The organization may reduce the sample size using the prior year’s audited, product line-specific rate. Refer to the *Guidelines for Calculations and Sampling* for information on reducing the sample size.

To confirm the diagnosis of hypertension, the organization must find notation of one of the following in the medical record anytime during the member’s history on or before June 30 of the measurement year:

- Hypertension.
- HTN.
- High BP (HBP).
- Elevated BP (↑BP).
- Borderline HTN.
- Hypertension.
- HTN.
- High BP (HBP).
- Hyperpiesia.
- Hyperpiesis.

It does not matter if hypertension was treated or is currently being treated. The notation indicating a diagnosis of hypertension may be recorded in any of the following documents:

- Problem list (this may include a diagnosis prior to June 30 of the measurement year or an undated diagnosis that is not part of the office visit note; see the **Note** at the end of this section).
- Office note.
- Subjective, Objective, Assessment, Plan (SOAP) note.
- Encounter form.
- Diagnostic report.
- Hospital discharge summary.

Statements such as “rule out HTN,” “possible HTN,” “white-coat HTN,” “questionable HTN” and “consistent with HTN” are not sufficient to confirm the diagnosis if such statements are the *only* notations of hypertension in the medical record.

If the diagnosis of hypertension cannot be confirmed, the member is excluded and replaced by the next member from the oversample.

**Identifying the medical record**

Use one medical record for both the confirmation of the diagnosis of hypertension and the representative BP. All eligible BP measurements recorded in the record must be considered. If an organization cannot find the medical record, the member remains in the measure denominator and is considered noncompliant for the numerator.

Use the following steps to find the appropriate medical record to review.

**Step 1** Identify the member's PCP.

If the member had more than one PCP for the time period, identify the PCP who most recently provided care to the member.

If the member did not visit a PCP for the time period or does not have a PCP, identify the practitioner who most recently provided care to the member.

If a practitioner other than the member's PCP manages the hypertension, the organization may use the medical record of that practitioner.

**Step 2** Use one medical record to both confirm the diagnosis for the denominator and identify the representative BP level for the numerator. There are circumstances in which the organization may need to go to a second medical record to either confirm the diagnosis or obtain the BP reading, as in the following two examples.

*If a member sees one PCP during the denominator confirmation period (on or before June 30 of the measurement year) and another PCP after June 30, the diagnosis of hypertension and the BP reading may be identified through two different medical records.*

*If a member has the same PCP for the entire measurement year, but it is clear from claims or medical record data that a specialist (e.g., cardiologist) manages the member's hypertension after June 30, the organization may use the PCP's chart to confirm the diagnosis and use the specialist's chart to obtain the BP reading. For example, if all recent claims coded with 401 came from the specialist, the organization may use this chart for the most recent BP reading. If the member did not have any visit with the specialist prior to June 30 of the measurement year, the organization must go to another medical record to confirm the diagnosis.*

**Numerator** The number of members in the denominator whose most recent BP (both systolic and diastolic) is adequately controlled during the measurement year based on the following criteria:

- Members 18–59 years of age as of December 31 of the measurement year whose BP was <140/90 mm Hg.
- Members 60–85 years of age as of December 31 of the measurement year who were flagged with a diagnosis of diabetes and whose BP was <140/90 mm Hg.
- Members 60–85 years of age as of December 31 of the measurement year who were flagged as not having a diagnosis of diabetes and whose BP was <150/90 mm Hg.

To determine if the member's BP is adequately controlled, the representative BP must be identified.

**Administrative** None.

**Medical record** Follow the steps below to determine representative BP.

**Step 1** Identify the most recent BP reading noted during the measurement year. The reading must occur after the date when the diagnosis of hypertension was confirmed.

Do not include BP readings:

- Taken during an acute inpatient stay or an ED visit.
- Taken during an outpatient visit which was for the sole purpose of having a diagnostic test or surgical procedure performed (e.g., sigmoidoscopy, removal of a mole).
- Obtained the same day as a major diagnostic or surgical procedure (e.g., EKG/ ECG, stress test, administration of IV contrast for a radiology procedure, endoscopy).
- Reported by or taken by the member.

If multiple readings were recorded for a single date, use the lowest systolic and lowest diastolic BP on that date as the representative BP. The systolic and diastolic results do not need to be from the same reading.

**Step 2** Determine numerator compliance based on the following criteria:

- Members 18–59 years of age as of December 31 of the measurement year whose BP was <140/90 mm Hg.
- Members 60–85 years of age as of December 31 of the measurement year who were flagged with a diagnosis of diabetes and whose BP was <140/90 mm Hg.
- Members 60–85 years of age as of December 31 of the measurement year who were flagged as not having a diagnosis of diabetes and whose BP was <150/90 mm Hg.

The member is not compliant if the BP reading does not meet the specified threshold or is missing, if there is no BP reading during the measurement year or if the reading is incomplete (e.g., the systolic or diastolic level is missing).

**Step 3** A single rate is reported for all three groups. Sum the numerator events from step 2 to obtain the rate.

### **Exclusions (optional)**

- Exclude from the eligible population all members with evidence of end-stage renal disease (ESRD) (ESRD Value Set; ESRD Obsolete Value Set) or kidney transplant (Kidney Transplant Value Set) on or prior to December 31 of the measurement year. Documentation in the medical record must include a dated note indicating evidence of ESRD, kidney transplant or dialysis.
- Exclude from the eligible population all members with a diagnosis of pregnancy (Pregnancy Value Set) during the measurement year.

- Exclude from the eligible population all members who had a nonacute inpatient admission during the measurement year. To identify nonacute inpatient admissions:
  1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
  2. Confirm the stay was for nonacute care based on the presence of a nonacute code (Nonacute Inpatient Stay Value Set) on the claim.
  3. Identify the admission date for the stay.

**Note**

---

- *When confirming the diagnosis of hypertension, the intent is to identify the date when the provider became aware of the hypertension diagnosis and documented the diagnosis of hypertension in the medical record (versus the time the patient acquired hypertension).*
- *Problem lists generally indicate established conditions; to discount undated entries might hinder confirmation of the denominator. If a problem list is found in an office visit note, it would be considered a dated problem list and the date of the visit must be used.*
- *Organizations generally require an oversample of 10–15 percent to meet the MRSS for confirmed cases of hypertension.*
- *Only administrative data should be used to assign the diabetes flag. The intent of the flag is to determine the appropriate BP threshold to use for the member during numerator assessment. The only exception is if the member is flagged as a diabetic but medical record evidence contains information that classifies the member as a valid data error. To meet criteria as a valid data error, the medical record must contain no evidence of diabetes and include a notation that refutes the diagnosis, as described in *Substituting Medical Records in the Guidelines for Calculations and Sampling*. In this case, the diabetes flag may be changed to “not diabetic,” but the member may not be removed from the sample.*

## Data Elements for Reporting

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table CBP-1/2/3: Data Elements for Controlling High Blood Pressure**

	Hybrid
Measurement year	✓
Data collection methodology (Hybrid)	✓
Eligible population	✓
Minimum required sample size (MRSS) or other sample size	✓
Oversampling rate	✓
Final sample size (FSS)	✓
Number of original sample records excluded because of valid data errors	✓
Number of records excluded because of false-positive diagnoses	✓
Number of administrative data records excluded	✓
Number of medical record data records excluded	✓
Number of employee/dependent medical records excluded	✓
Records added from the oversample list	✓
Denominator	✓
Numerator events by medical records	✓
Reported rate	✓
Lower 95% confidence interval	✓
Upper 95% confidence interval	✓

**Note:** Because this is a hybrid only measure and medical record review is required, only the medical record data elements are included in the data reporting table and IDSS.

## Persistence of Beta-Blocker Treatment After a Heart Attack (PBH)

### Summary of Changes to HEDIS 2017

- Removed language instructing organizations to use only facility claims to identify discharges and diagnoses for denominator events. This is now addressed in *General Guideline 46*.
- Added instructions to identify direct transfers.

### Description

The percentage of members 18 years of age and older during the measurement year who were hospitalized and discharged from July 1 of the year prior to the measurement year to June 30 of the measurement year with a diagnosis of AMI and who received persistent beta-blocker treatment for six months after discharge.

### Definition

<b>Treatment days (covered days)</b>	The actual number of calendar days covered with prescriptions within the specified 180-day measurement interval (i.e., a prescription of a 90-day supply dispensed on the 100th day will have 80 days counted in the 180-day interval).
<b>180-day measurement interval</b>	The 180-day period that includes the discharge date and the 179 days after discharge.

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. Refer to *General Guideline 20: Members in Hospice*.

<b>Product lines</b>	Commercial, Medicaid, Medicare (report each product line separately).
<b>Ages</b>	18 years and older as of December 31 of the measurement year.
<b>Continuous enrollment</b>	Discharge date through 179 days after discharge.
<b>Allowable gap</b>	No more than one gap in enrollment of up to 45 days within the 180 days of the event. To determine continuous enrollment for a Medicaid beneficiary for whom enrollment is verified monthly, the member may not have more than a 1-month gap in coverage (i.e., a member whose coverage lapses for 2 months [60 days] is not continuously enrolled).
<b>Anchor date</b>	Discharge date.
<b>Benefit</b>	Medical and pharmacy.

- Event/diagnosis** An acute inpatient discharge with any diagnosis of AMI (AMI Value Set) from July 1 of the year prior to the measurement year through June 30 of the measurement year. To identify an acute inpatient discharge:
1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
  2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
  3. Identify the discharge date for the stay.

If a member has more than one episode of AMI that meets the event/diagnosis criteria, from July 1 of the year prior to the measurement year through June 30 of the measurement year, include only the first discharge.

*Direct transfers to an acute inpatient care setting.* If the member had a direct transfer to an acute inpatient setting (for any diagnosis), use the discharge date from the transfer setting, not the initial discharge. Exclude both the initial discharge and the direct transfer discharge if the transfer discharge occurs after June 30 of the measurement year. Use the instructions below to identify direct transfers and exclude nonacute inpatient stays using the Nonacute Inpatient Stay Value Set (step 2).

*Direct transfers to a nonacute inpatient care setting.* Exclude from the denominator, hospitalizations in which the member had a direct transfer to a nonacute inpatient care setting for any diagnosis. Use the instructions below to identify direct transfers and confirm the stay was for nonacute inpatient care based on the presence of a nonacute code (Nonacute Inpatient Stay Value Set) on the claim.

A **direct transfer** is when the discharge date from one inpatient setting and the admission date to a second inpatient setting are one calendar day apart or less. For example: An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 1, is a direct transfer.

- An inpatient discharge on June 1, followed by an admission to an inpatient setting on June 2, is a direct transfer.
- An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 3, is not a direct transfer; these are two distinct inpatient stays.

Use the following method to identify admissions to and discharges from inpatient settings.

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. If needed, identify nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
3. Identify the admission and discharge dates for the stay.

**Administrative Specification**

**Denominator** The eligible population.

**Numerator** A 180-day course of treatment with beta-blockers (Table PBH-B).

Identify all members in the denominator population whose dispensed days supply is ≥135 days in the 180-day measurement interval. Persistence of treatment for this measure is defined as at least 75 percent of the days supply filled.

To determine continuity of treatment during the 180-day period, identify all prescriptions filled within 180-day measurement interval, and add the number of allowed gap days to the number of treatment days for a maximum of 180 days (i.e., 135 treatment days + 45 gap days = 180 days).

To account for members who are on beta-blockers prior to admission, factor those prescriptions into adherence rates if the actual treatment days fall within the 180-day measurement interval.

**Table PBH-B: Beta-Blocker Medications**

Description	Prescription
Noncardioselective beta-blockers	<ul style="list-style-type: none"> <li>• Carvedilol</li> <li>• Labetalol</li> <li>• Nadolol</li> <li>• Penbutolol</li> <li>• Pindolol</li> <li>• Propranolol</li> <li>• Timolol</li> <li>• Sotalol</li> </ul>
Cardioselective beta-blockers	<ul style="list-style-type: none"> <li>• Acebutolol</li> <li>• Atenolol</li> <li>• Betaxolol</li> <li>• Bisoprolol</li> <li>• Metoprolol</li> <li>• Nebivolol</li> </ul>
Antihypertensive combinations	<ul style="list-style-type: none"> <li>• Atenolol-chlorthalidone</li> <li>• Bendroflumethiazide-nadolol</li> <li>• Bisoprolol-hydrochlorothiazide</li> <li>• Hydrochlorothiazide-metoprolol</li> <li>• Hydrochlorothiazide-propranolol</li> </ul>

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Exclusion (optional)**

Members identified as having an intolerance or allergy to beta-blocker therapy. Any of the following anytime during the member’s history through the end of the continuous enrollment period meet criteria:

- Asthma (Asthma Value Set).
- COPD (COPD Value Set).
- Obstructive chronic bronchitis (Obstructive Chronic Bronchitis Value Set).
- Chronic respiratory conditions due to fumes and vapors (Chronic Respiratory Conditions Due to Fumes/Vapors Value Set).
- Hypotension, heart block >1 degree or sinus bradycardia (Beta-Blocker Contraindications Value Set).
- A medication dispensing event indicative of a history of asthma (Table PBH-D).
- Intolerance or allergy to beta-blocker therapy.

**Table PBH-D: Medications to Identify Exclusions (History of Asthma)**

Description	Prescription	
Bronchodilator combinations	<ul style="list-style-type: none"> <li>• Albuterol-ipratropium</li> <li>• Budesonide-formoterol</li> </ul>	<ul style="list-style-type: none"> <li>• Fluticasone-salmeterol</li> <li>• Mometasone-formoterol</li> </ul>
Inhaled corticosteroids	<ul style="list-style-type: none"> <li>• Beclomethasone</li> <li>• Budesonide</li> <li>• Ciclesonide</li> </ul>	<ul style="list-style-type: none"> <li>• Flunisolide</li> <li>• Fluticasone</li> <li>• Fluticasone CFC free</li> <li>• Mometasone</li> </ul>

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

### Data Elements for Reporting

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table PBH-1/2/3: Data Elements for Persistence of Beta-Blocker Treatment After a Heart Attack**

	Administrative
Measurement year	✓
Data collection methodology (Administrative)	✓
Eligible population	✓
Number of optional exclusions	✓
Numerator events by administrative data	✓
Numerator events by supplemental data	✓
Reported rate	✓
Lower 95% confidence interval	✓
Upper 95% confidence interval	✓

## Annual Monitoring for Patients on Persistent Medications (MPM)

### Summary of Changes to HEDIS 2017

- No changes to this measure.

### Description

The percentage of members 18 years of age and older who received at least 180 treatment days of ambulatory medication therapy for a select therapeutic agent during the measurement year and at least one therapeutic monitoring event for the therapeutic agent in the measurement year. For each product line, report each of the three rates separately and as a total rate.

- Annual monitoring for members on angiotensin converting enzyme (ACE) inhibitors or angiotensin receptor blockers (ARB).
- Annual monitoring for members on digoxin.
- Annual monitoring for members on diuretics.
- Total rate (the sum of the three numerators divided by the sum of the three denominators).

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. Refer to General Guideline 20: Members in Hospice.

<b>Product lines</b>	Commercial, Medicaid, Medicare (report each product line separately).
<b>Ages</b>	18 years and older as of December 31 of the measurement year.
<b>Continuous enrollment</b>	The measurement year.
<b>Allowable gap</b>	No more than one gap in enrollment of up to 45 days during the measurement year. To determine continuous enrollment for a Medicaid beneficiary for whom enrollment is verified monthly, the member may not have more than a 1-month gap in coverage (i.e., a member whose coverage lapses for 2 months [60 days] is not considered continuously enrolled).
<b>Anchor date</b>	December 31 of the measurement year.
<b>Benefits</b>	Medical and pharmacy.
<b>Event/ diagnosis</b>	Members on persistent medications (i.e., members who received at least 180 treatment days of ambulatory medication in the measurement year). Refer to <i>Additional Eligible Population Criteria</i> for each rate.  Treatment days are the actual number of calendar days covered with prescriptions within the measurement year (i.e., a prescription of 90 days supply dispensed on December 1 of the measurement year counts as 30 treatment days). Sum the days supply for all medications and subtract any days supply that extends beyond December 31 of the measurement year.

**Note:** Medications dispensed in the year prior to the measurement year must be counted toward the 180 treatment days.

### Administrative Specification

For each product line, report each of the three rates separately and as a combined rate. The total rate is the sum of the three numerators divided by the sum of the three denominators.

### Rate 1: Annual Monitoring for Members on ACE Inhibitors or ARBs

**Additional eligible population criteria**

Members who received at least 180 treatment days of ACE inhibitors or ARBs, during the measurement year. Refer to Table CDC-L to identify ACE inhibitors and ARBs.

**Note:** Members may switch therapy with any medication listed in Table CDC-L during the measurement year and have the days supply for those medications count toward the total 180 treatment days (i.e., a member who received 90 days of ACE inhibitors and 90 days of ARBs meets the denominator definition for rate 1).

**Numerator**

At least one serum potassium and a serum creatinine therapeutic monitoring test in the measurement year. Any of the following during the measurement year meet criteria:

- A lab panel test (Lab Panel Value Set).
- A serum potassium test (Serum Potassium Value Set) **and** a serum creatinine test (Serum Creatinine Value Set).

**Note:** The tests do not need to occur on the same service date, only within the measurement year.

### Rate 2: Annual Monitoring for Members on Digoxin

**Additional eligible population criteria**

Members who received at least 180 treatment days of digoxin (Table MPM-B) during the measurement year.

**Table MPM-B: Drugs to Identify Members on Digoxin**

Description	Prescription
Inotropic agents	Digoxin

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Numerator** At least one serum potassium, at least one serum creatinine **and** at least one serum digoxin therapeutic monitoring test in the measurement year. Any of the following during the measurement year meet criteria:

- A lab panel test (Lab Panel Value Set) **and** a serum digoxin test (Digoxin Level Value Set).
- A serum potassium test (Serum Potassium Value Set) **and** a serum creatinine test (Serum Creatinine Value Set) **and** a serum digoxin test (Digoxin Level Value Set).

**Note:** The tests do not need to occur on the same service date, only within the measurement year.

**Rate 3: Annual Monitoring for Members on Diuretics**

**Additional eligible population criteria** Members who received at least 180 treatment days of a diuretic (Table MPM-C), during the measurement year.

**Note:** Members may switch therapy with any medication listed in Table MPM-C during the measurement year and have the days supply for those medications count toward the total 180 treatment days.

**Table MPM-C: Drugs to Identify Members on Diuretics**

Description	Prescription
Antihypertensive combinations	<ul style="list-style-type: none"> <li>• Aliskiren-hydrochlorothiazide</li> <li>• Aliskiren-hydrochlorothiazide-amlodipine</li> <li>• Amiloride-hydrochlorothiazide</li> <li>• Amlodipine-hydrochlorothiazide-olmesartan</li> <li>• Amlodipine-hydrochlorothiazide-valsartan</li> <li>• Atenolol-chlorthalidone</li> <li>• Azilsartan-chlorthalidone</li> <li>• Benazepril-hydrochlorothiazide</li> <li>• Bendroflumethiazide-nadolol</li> <li>• Bisoprolol-hydrochlorothiazide</li> <li>• Candesartan-hydrochlorothiazide</li> <li>• Captopril-hydrochlorothiazide</li> <li>• Chlorthalidone-clonidine</li> <li>• Enalapril-hydrochlorothiazide</li> <li>• Eprosartan-hydrochlorothiazide</li> <li>• Fosinopril-hydrochlorothiazide</li> <li>• Hydrochlorothiazide-irbesartan</li> <li>• Hydrochlorothiazide-lisinopril</li> <li>• Hydrochlorothiazide-losartan</li> <li>• Hydrochlorothiazide-methyldopa</li> <li>• Hydrochlorothiazide-metoprolol</li> <li>• Hydrochlorothiazide-moexipril</li> <li>• Hydrochlorothiazide-olmesartan</li> <li>• Hydrochlorothiazide-propranolol</li> <li>• Hydrochlorothiazide-quinapril</li> <li>• Hydrochlorothiazide-spirolactone</li> <li>• Hydrochlorothiazide-telmisartan</li> <li>• Hydrochlorothiazide-triamterene</li> <li>• Hydrochlorothiazide-valsartan</li> </ul>
Loop diuretics	<ul style="list-style-type: none"> <li>• Bumetanide</li> <li>• Ethacrynic acid</li> <li>• Furosemide</li> <li>• Torsemide</li> </ul>
Potassium-sparing diuretics	<ul style="list-style-type: none"> <li>• Amiloride</li> <li>• Eplerenone</li> <li>• Spironolactone</li> <li>• Triamterene</li> </ul>
Thiazide diuretics	<ul style="list-style-type: none"> <li>• Chlorothiazide</li> <li>• Chlorthalidone</li> <li>• Hydrochlorothiazide</li> <li>• Indapamide</li> <li>• Methyclothiazide</li> <li>• Metolazone</li> </ul>

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Numerator**

At least one serum potassium *and* a serum creatinine therapeutic monitoring test in the measurement year. Any of the following during the measurement year meet criteria:

- A lab panel test (Lab Panel Value Set).
- A serum potassium test (Serum Potassium Value Set) **and** a serum creatinine test (Serum Creatinine Value Set).

**Note:** The tests do not need to occur on the same service date, only within the measurement year.

**Exclusion (optional)**

Exclude members from each eligible population who had an acute inpatient encounter (Acute Inpatient Value Set) or nonacute inpatient encounter (Nonacute Inpatient Value Set) during the measurement year.

**Data Elements for Reporting**

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table MPM-1/2/3: Data Elements for Annual Monitoring for Patients on Persistent Medications**

	Administrative
Measurement year	✓
Data collection methodology (Administrative)	✓
Eligible population	<i>For each of the 3 rates and total</i>
Number of optional exclusions	<i>For each of the 3 rates and total</i>
Numerator events by administrative data	<i>For each of the 3 rates and total</i>
Numerator events by supplemental data	<i>For each of the 3 rates and total</i>
Reported rate	<i>For each of the 3 rates and total</i>
Lower 95% confidence interval	<i>For each of the 3 rates and total</i>
Upper 95% confidence interval	<i>For each of the 3 rates and total</i>

## Medication Reconciliation Post-Discharge (MRP)

### Summary of Changes to HEDIS 2017

- Removed the anchor date requirement.
- Added value sets to identify direct transfers.
- Clarified medical record documentation requirements for medication reconciliation.

**Note:** For this measure, organizations are not required to differentiate between readmissions and direct transfers; therefore, the definition of direct transfer is not required.

### Description

The percentage of discharges from January 1–December 1 of the measurement year for members 18 years of age and older for whom medications were reconciled the date of discharge through 30 days after discharge (31 total days).

### Definition

**Medication reconciliation** A type of review in which the discharge medications are reconciled with the most recent medication list in the outpatient medical record.

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. If an organization reports this measure using the Hybrid method, and a member is found to be in hospice or using hospice services during medical record review, the member is removed from the sample and replaced by a member from the oversample. Refer to General Guideline 20: Members in Hospice.

<b>Product line</b>	Medicare.
<b>Ages</b>	18 years and older as of December 31 of the measurement year.
<b>Continuous enrollment</b>	Date of discharge through 30 days after discharge (31 total days).
<b>Allowable gap</b>	None.
<b>Anchor date</b>	None.
<b>Benefit</b>	Medical.
<b>Event/ diagnosis</b>	An acute or nonacute inpatient discharge on or between January 1 and December 1 of the measurement year. To identify acute and nonacute inpatient discharges: <ol style="list-style-type: none"> <li>1. Identify all acute and nonacute inpatient stays (<u>Inpatient Stay Value Set</u>).</li> <li>2. Identify the discharge date for the stay.</li> </ol>

The denominator for this measure is based on discharges, not members. If members have more than one discharge, include all discharges on or between January 1 and December 1 of the measurement year.

**Readmission or direct transfer** If the discharge is followed by a readmission or direct transfer to an acute or nonacute inpatient care setting on the date of discharge through 30 days after discharge (31 total days), count only the last discharge. To identify readmissions and direct transfers during the 31-day period:

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Identify the admission date for the stay (the admission date must occur during the 31-day period).
3. Identify the discharge date for the stay (the discharge date is the event date).

Exclude both the initial and the readmission/direct transfer discharges if the last discharge occurs after December 1 of the measurement year.

**Note:** *If a member remains in an acute or nonacute care setting through December 1 of the measurement year, a discharge is not included in the measure for this member, but the organization must have a method for identifying the member's status for the remainder of the measurement year, and may not assume the member remained admitted based only on the absence of a discharge before December 1. If the organization is unable to confirm the member remained in the acute or nonacute care setting through December 1, disregard the readmission or direct transfer and use the initial discharge date.*

### Administrative Specification

<b>Denominator</b>	The eligible population.
<b>Numerator</b>	Medication reconciliation ( <u>Medication Reconciliation Value Set</u> ) conducted by a prescribing practitioner, clinical pharmacist or registered nurse on the date of discharge through 30 days after discharge (31 total days).

### Hybrid Specification

<b>Denominator</b>	A systematic sample drawn from the eligible population. Organizations may reduce the sample size using the current year's administrative rate or the prior year's audited, product line-specific rate. Refer to the <i>Guidelines for Calculations and Sampling</i> for information on reducing the sample size.  The denominator is based on episodes, not on members. Members may appear more than once in the sample.
<b>Numerator</b>	Medication reconciliation conducted by a prescribing practitioner, clinical pharmacist or registered nurse, as documented through either administrative data or medical record review on the date of discharge through 30 days after discharge (31 total days).

**Administrative** Refer to *Administrative Specification* to identify positive numerator hits from administrative data.

**Medical record** Documentation in the medical record must include evidence of medication reconciliation and the date when it was performed. Any of the following meets criteria:

- Documentation that the provider reconciled the current and discharge medications.
- Documentation of the current medications with a notation that references the discharge medications (e.g., no changes in medications since discharge, same medications at discharge, discontinue all discharge medications).
- Documentation of the member's current medications with a notation that the discharge medications were reviewed.
- Documentation of a current medication list, a discharge medication list and notation that both lists were reviewed on the same date of service.
- Evidence that the member was seen for post-discharge hospital follow-up with evidence of medication reconciliation or review.
- Documentation in the discharge summary that the discharge medications were reconciled with the current medications. There must be evidence that the discharge summary was filed in the outpatient chart on the date of discharge through 30 days after discharge (31 total days).
- Notation that no medications were prescribed or ordered upon discharge.

Only documentation in the outpatient chart meets the intent of the measure, but an outpatient visit is not required.

**Note**

---

- *The denominator is based on the discharge date found in administrative/claims data, but organizations may use other systems (including data found during medical record review) to identify data errors and make corrections.*

## Data Elements for Reporting

Organizations that submit HEDIS data to NCQA must provide the following data elements. Cells with a dash (—) indicate data are not required.

**Table MRP-3: Data Elements for Medication Reconciliation Post-Discharge**

	Administrative	Hybrid
Measurement year	✓	✓
Data collection methodology (Administrative or Hybrid)	✓	✓
Eligible population	✓	✓
Number of numerator events by administrative data in eligible population (before exclusions)	—	✓
Current year's administrative rate (before exclusions)	—	✓
Minimum required sample size (MRSS) or other sample size	—	✓
Oversampling rate	—	✓
Final sample size (FSS)	—	✓
Number of numerator events by administrative data in FSS	—	✓
Administrative rate on FSS	—	✓
Number of original sample records excluded because of valid data errors	—	✓
Number of employee/dependent medical records excluded	—	✓
Records added from the oversample list	—	✓
Denominator	—	✓
Numerator events by administrative data	✓	✓
Numerator events by medical records		✓
Numerator events by supplemental data	✓	✓
Reported rate	✓	✓
Lower 95% confidence interval	✓	✓
Upper 95% confidence interval	✓	✓

## Potentially Harmful Drug-Disease Interactions in the Elderly (DDE)

### Summary of Changes to HEDIS 2017

- Updated the medications included in the measure to align with the 2015 American Geriatrics Society Beers Criteria.
- Removed delirium codes from the [Psychosis Value Set](#).
- Added a requirement to not include denied claims in the numerator for all rates.

### Description

The percentage of Medicare members 65 years of age and older who have evidence of an underlying disease, condition or health concern and who were dispensed an ambulatory prescription for a potentially harmful medication, concurrent with or after the diagnosis.

Report each of the three rates separately and as a total rate.

- A history of falls and a prescription for anticonvulsants, SSRIs, antipsychotics, benzodiazepines, nonbenzodiazepine hypnotics or tricyclic antidepressants.
- Dementia and a prescription for antipsychotics, benzodiazepines, nonbenzodiazepine hypnotics, tricyclic antidepressants, H<sub>2</sub> receptor antagonists or anticholinergic agents.
- Chronic kidney disease and prescription for Cox-2 selective NSAIDs or nonaspirin NSAIDs.
- Total rate (the sum of the three numerators divided by the sum of the three denominators).

Members with more than one disease or condition may appear in the measure multiple times (i.e., in each indicator for which they qualify). A lower rate represents better performance for all rates.

### Definitions

<b>IESD</b>	Index Episode Start Date. The earliest diagnosis, procedure or prescription between January 1 of the year prior to the measurement year and December 1 of the measurement year.  <i>For an outpatient, observation or ED visit, the IESD is the date of service.</i>  <i>For an inpatient stay, the IESD is the discharge date.</i>  <i>For dispensed prescriptions, the IESD is the dispense date.</i>
-------------	---

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. Refer to General Guideline 20: *Members in Hospice*.

<b>Product line</b>	Medicare.
<b>Age</b>	67 years and older as of December 31 of the measurement year.
<b>Continuous enrollment</b>	The measurement year and the year prior to the measurement year.

<b>Allowable gap</b>	No more than one gap in enrollment of up to 45 days during each year of continuous enrollment.
<b>Anchor date</b>	Enrolled as of December 31 of the measurement year.
<b>Benefit</b>	Medical and pharmacy.
<b>Event/ diagnosis</b>	Members with at least one disease, condition or procedure in the measurement year or the year prior to the measurement year. Refer to Additional Eligible Population Criteria for each rate.

### Administrative Specification

Report each rate separately and as a combined rate. The total rate is the sum of the three numerators divided by the sum of the three denominators.

### Rate 1: Drug-Disease Interactions—History of Falls and Anticonvulsants, SSRIs, Antipsychotics, Benzodiazepines, Nonbenzodiazepine Hypnotics or Tricyclic Antidepressants

**Additional eligible population criteria** An accidental fall or hip fracture\* on or between January 1 of the year prior to the measurement year and December 1 of the measurement year.  
\*Hip fractures are used as a proxy for identifying accidental falls.

Follow the steps below to identify the eligible population.

**Step 1** Identify members who had an accidental fall or a hip fracture. Members with any of the following on or between January 1 of the year prior to the measurement year and December 1 of the measurement year meet criteria:

- An accidental fall (Falls Value Set).
- An outpatient visit (Outpatient Value Set), an observation visit (Observation Value Set) or an ED visit (ED Value Set) with a hip fracture (Hip Fractures Value Set).
- An acute or nonacute inpatient discharge with a hip fracture (Hip Fractures Value Set). To identify acute and nonacute inpatient discharges:
  1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
  2. Identify the discharge date for the stay.
  3. Identify the IESD for each member.

**Step 2: Required Exclusions** Exclude members with a diagnosis of psychosis (Psychosis Value Set), schizophrenia (Schizophrenia Value Set), bipolar disorder (Bipolar Disorder Value Set; Other Bipolar Disorder Value Set) or seizure disorder (Seizure Disorders Value Set) on or between January 1 of the year prior to the measurement year and December 1 of the measurement year.

**Numerator** Dispensed an ambulatory prescription for an anticonvulsant, or SSRI (Table DDE-A) or antipsychotic, benzodiazepine, nonbenzodiazepine hypnotic or tricyclic antidepressant (Table DDE-B) on or between the IESD and December 31 of the measurement year.

Do not include denied claims.

**Table DDE-A: Potentially Harmful Drugs—Rate 1**

Description	Prescription			
Anticonvulsants	<ul style="list-style-type: none"> <li>• Carbamazepine</li> <li>• Clobazam</li> <li>• Divalproex sodium</li> <li>• Ethosuximide</li> <li>• Ethotoin</li> <li>• Ezogabine</li> <li>• Felbamate</li> </ul>	<ul style="list-style-type: none"> <li>• Fosphenytoin</li> <li>• Gabapentin</li> <li>• Lacosamide</li> <li>• Lamotrigine</li> <li>• Levetiracetam</li> <li>• Mephobarbital</li> <li>• Methsuximide</li> </ul>	<ul style="list-style-type: none"> <li>• Oxcarbazepine</li> <li>• Phenobarbital</li> <li>• Phenytoin</li> <li>• Pregabalin</li> <li>• Primidone</li> <li>• Rufinamide</li> <li>• Tiagabine HCL</li> </ul>	<ul style="list-style-type: none"> <li>• Topiramate</li> <li>• Valproate sodium</li> <li>• Valproic acid</li> <li>• Vigabatrin</li> <li>• Zonisamide</li> </ul>
SSRIs	<ul style="list-style-type: none"> <li>• Citalopram</li> <li>• Escitalopram</li> </ul>	<ul style="list-style-type: none"> <li>• Fluoxetine</li> <li>• Fluvoxamine</li> </ul>	<ul style="list-style-type: none"> <li>• Paroxetine</li> <li>• Sertraline</li> </ul>	

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Table DDE-B: Potentially Harmful Drugs—Rate 1 and Rate 2**

Description	Prescription			
Antipsychotics	<ul style="list-style-type: none"> <li>• Aripiprazole</li> <li>• Asenapine</li> <li>• Brexpiprazole</li> <li>• Cariprazine</li> <li>• Chlorpromazine</li> <li>• Clozapine</li> <li>• Fluphenazine</li> <li>• Haloperidol</li> </ul>	<ul style="list-style-type: none"> <li>• Iloperidone</li> <li>• Loxapine</li> <li>• Lurasidone</li> <li>• Molindone</li> <li>• Olanzapine</li> <li>• Paliperidone</li> <li>• Perphenazine</li> <li>• Pimozide</li> </ul>	<ul style="list-style-type: none"> <li>• Quetiapine</li> <li>• Risperidone</li> <li>• Thioridazine</li> <li>• Thiothixene</li> <li>• Trifluoperazine</li> <li>• Ziprasidone</li> </ul>	
Benzodiazepines	<ul style="list-style-type: none"> <li>• Alprazolam</li> <li>• Chlordiazepoxide products</li> <li>• Clonazepam</li> <li>• Clorazepate-dipotassium</li> </ul>	<ul style="list-style-type: none"> <li>• Diazepam</li> <li>• Estazolam</li> <li>• Flurazepam HCL</li> <li>• Lorazepam</li> <li>• Midazolam HCL</li> </ul>	<ul style="list-style-type: none"> <li>• Oxazepam</li> <li>• Quazepam</li> <li>• Temazepam</li> <li>• Triazolam</li> </ul>	
Nonbenzodiazepine hypnotics	<ul style="list-style-type: none"> <li>• Eszopiclone</li> </ul>	<ul style="list-style-type: none"> <li>• Zaleplon</li> </ul>	<ul style="list-style-type: none"> <li>• Zolpidem</li> </ul>	
Tricyclic antidepressants	<ul style="list-style-type: none"> <li>• Amitriptyline</li> <li>• Amoxapine</li> <li>• Clomipramine</li> </ul>	<ul style="list-style-type: none"> <li>• Desipramine</li> <li>• Doxepin (&gt;6 mg)</li> <li>• Imipramine</li> </ul>	<ul style="list-style-type: none"> <li>• Nortriptyline</li> <li>• Protriptyline</li> <li>• Trimipramine</li> </ul>	

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Rate 2: Drug-Disease Interactions—Dementia and Antipsychotics, Benzodiazepines, Nonbenzodiazepine Hypnotics, Tricyclic Antidepressants, H<sub>2</sub> Receptor Antagonists or Anticholinergic Agents**

**Additional eligible population criteria**

Follow the steps below to identify the eligible population.

- Step 1** Identify members with a diagnosis of dementia (Dementia Value Set) or a dispensed dementia medication (Table DDE-C) on or between January 1 of the year prior to the measurement year and December 1 of the measurement year. Identify the IESD for each member.

**Table DDE-C: Prescriptions to Identify Members With Dementia**

Description	Prescription
Cholinesterase inhibitors	• Donepezil      • Galantamine      • Rivastigmine
Miscellaneous central nervous system agents	• Memantine

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

- Step 2: Required exclusions** Exclude members with a diagnosis of psychosis (Psychosis Value Set), schizophrenia (Schizophrenia Value Set) or bipolar disorder (Bipolar Disorder Value Set; Other Bipolar Disorder Value Set) on or between January 1 of the year prior to the measurement year and December 1 of the measurement year.

**Numerator**

Dispensed an ambulatory prescription for an antipsychotic, benzodiazepine, nonbenzodiazepine hypnotic or tricyclic antidepressant (Table DDE-B) or H<sub>2</sub> receptor antagonist, or anticholinergic agent (Table DDE-D) on or between the IESD and December 31 of the measurement year.

Do not include denied claims.

**Table DDE-D: Potentially Harmful Drugs—Rate 2**

Description	Prescription			
H <sub>2</sub> receptor antagonists	• Cimetidine	• Famotidine	• Nizatidine	• Ranitidine
Anticholinergic agents, antiemetics	• Prochlorperazine	Promethazine		
Anticholinergic agents, antihistamines	• Carbinoxamine • Chlorpheniramine • Hydroxyzine • Brompheniramine • Clemastine	• Triprolidine • Cyproheptadine • Dimenhydrinate • Diphenhydramine • Meclizine	• Dexbrompheniramine • Dexchlorpheniramine • Doxylamine	
Anticholinergic agents, antispasmodics	• Atropine • Homatropine • Belladonna alkaloids	• Dicyclomine • Hyoscyamine • Propantheline	• Scopolamine • Clidinium-chlordiazepoxide	
Anticholinergic agents, antimuscarinics (oral)	• Darifenacin • Fesoterodine • Solifenacin	• Trospium • Flavoxate	• Oxybutynin • Tolterodine	
Anticholinergic agents, anti-Parkinson agents	• Benztropine	• Trihexyphenidyl		
Anticholinergic agents, skeletal muscle relaxants	• Cyclobenzaprine	• Orphenadrine		
Anticholinergic agents, SSRIs	• Paroxetine			
Anticholinergic agents, antiarrhythmic	• Disopyramide			

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Rate 3: Drug-Disease Interactions—Chronic Kidney Disease and Cox-2 Selective NSAIDs or Nonaspirin NSAIDs**

**Additional eligible population criteria**

Chronic kidney disease as identified by a diagnosis of ESRD (ESRD Value Set), stage 4 chronic kidney disease (CKD Stage 4 Value Set) or kidney transplant (Kidney Transplant Value Set) on or between January 1 of the year prior to the measurement year and December 1 of the measurement year. Identify the IESD for each member.

**Numerator**

Dispensed an ambulatory prescription for a Cox-2 selective NSAID or nonaspirin NSAID (Table DDE-E) on or between the IESD and December 31 of the measurement year.

Do not include denied claims.

**Table DDE-E: Cox-2 Selective NSAIDs and Nonaspirin NSAIDs**

Description	Prescription			
Cox-2 Selective NSAIDs	• Celecoxib			
Nonaspirin NSAIDs	• Diclofenac potassium • Diclofenac sodium • Etodolac • Fenoprofen • Flurbiprofen	• Ibuprofen • Indomethacin • Ketoprofen • Ketorolac • Meclofenamate	• Mefenamic acid • Meloxicam • Nabumetone • Naproxen • Naproxen sodium	• Oxaprozin • Piroxicam • Sulindac • Tolmetin

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Note**

- Although denied claims are not included when assessing the numerators, all claims (paid, suspended, pending and denied) must be included when identifying the eligible population for each rate.

**Data Elements for Reporting**

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table DDE-3: Data Elements for Potentially Harmful Drug-Disease Interactions in the Elderly**

	Administrative
Measurement year	✓
Data collection methodology (Administrative)	✓
Eligible population	<i>For each of the 3 rates and total</i>
Number of required exclusions	<i>Rate 1, Rate 2 and total</i>
Numerator events by administrative data	<i>For each of the 3 rates and total</i>
Numerator events by supplemental data	<i>For each of the 3 rates and total</i>
Reported rate	<i>For each of the 3 rates and total</i>
Lower 95% confidence interval	<i>For each of the 3 rates and total</i>
Upper 95% confidence interval	<i>For each of the 3 rates and total</i>

## Use of High-Risk Medications in the Elderly (DAE)

### Summary of Changes to HEDIS 2017

- Updated the medications included in the measure to align with the 2015 American Geriatrics Society Beers Criteria
- Revised numerators 1 and 2 for high-risk medications with days supply criteria (Table DAE-B) and with average daily dose criteria (Table DAE-C).
- Revised numerator 2 to identify multiple dispensing events for the same high-risk medication.
- Added a requirement to not include denied claims in numerators 1 and 2.

### Description

- The percentage Medicare members 66 years of age and older who had at least one dispensing event for a high-risk medication.
- The percentage of Medicare members 66 years of age and older who had at least two dispensing events for the same high-risk medication.

For both rates, a lower rate represents better performance.

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. Refer to General Guideline 20: Members in Hospice.

<b>Product line</b>	Medicare.
<b>Age</b>	66 years and older as of December 31 of the measurement year.
<b>Continuous enrollment</b>	The measurement year.
<b>Allowable gap</b>	No more than one gap in enrollment of up to 45 days during the measurement year.
<b>Anchor date</b>	Enrolled as of December 31 of the measurement year.
<b>Benefits</b>	Medical and pharmacy.
<b>Event/ diagnosis</b>	None.

## Administrative Specification

**Denominator** The eligible population.

**Numerator 1** Members who received at least one dispensing event for a high-risk medication during the measurement year.

Follow the instructions for each medication table below to identify numerator compliance. If a member meets criteria for at least one of the following tables, they are compliant for Numerator 1. Include members who meet criteria for more than one table only once in the numerator.

Do not include denied claims.

**Table DAE-A** Identify members with at least one dispensing event (any days supply) during the measurement year for a medication in Table DAE-A.

**Table DAE-B** Identify members with a single dispensing event during the measurement year for a medication in Table DAE-B where days supply exceeds the days supply criteria listed for the medication.

For medications dispensed during the measurement year include any days supply that extends beyond December 31 of the measurement year. For example, a prescription of a 90-days supply dispensed on December 1 of the measurement year counts as a 90-days supply.

**Table DAE-C** Identify members with a single dispensing event during the measurement year for a medication in Table DAE-C where average daily dose exceeds the average daily dose criteria listed for the medication.

To calculate average daily dose, multiply the quantity of pills dispensed by the dose of each pill and divide by the days supply. For example, a prescription for a 30-days supply of digoxin containing 15 pills, .250 mg each pill, has an average daily dose of 0.125 mg.

To calculate average daily dose for elixirs and concentrates, multiply the volume dispensed by daily dose and divide by the days supply.

Do not round when calculating average daily dose.

**Numerator 2** Members who received at least two dispensing events for the same high-risk medication during the measurement year.

Follow the instructions for each medication table below to identify numerator compliance. If a member meets criteria for at least one of the following tables, they are compliant for Numerator 2. Include members who meet criteria for more than one table only once in the numerator.

Do not include denied claims.

**Table DAE-A** Identify members with two or more dispensing events (any days supply) on different dates of service during the measurement year for a medication in Table DAE-A. The dispensing events must be *for the same drug* as identified by the Drug ID in the NDC list.

**Table DAE-B** For each member, identify all dispensing events during the measurement year for medications in Table DAE-B. Identify members with two or more dispensing events on different dates of service *for medications in the same medication class (as identified in the Description column)*. For example, a prescription for zolpidem and a prescription for zaleplon are considered two dispensing events for medications in the same medication class (these drugs share the same description: Nonbenzodiazepine hypnotics).

Sum the days supply for prescriptions in the same medication class. Identify members with two or more dispensing events for medications of the same medication class where the summed days supply exceeds the days supply criteria listed for the medication.

For medications dispensed during the measurement year sum the days supply and include any days supply that extends beyond December 31 of the measurement year. For example, a prescription of a 90-days supply dispensed on December 1 of the measurement year counts as a 90-days supply.

**Note:** *The intent is to identify all members who had multiple dispensing events where the summed days supply exceeds the days supply criteria; there is no requirement that each dispensing event exceed the days supply criteria.*

**Table DAE-C** For each member, identify all dispensing events during the measurement year for medications in Table DAE-C where average daily dose exceeds the average daily dose criteria listed for the medication. Identify members with two or more dispensing events on different dates of service that exceed the average daily dose criteria *for the same drug* as identified by the Drug ID in the NDC list.

To calculate average daily dose for each dispensing event, multiply the quantity of pills dispensed by the dose of each pill and divide by the days supply. For example, a prescription for a 30-days supply of digoxin containing 15 pills, .250 mg each pill, has an average daily dose of 0.125 mg.

To calculate average daily dose for elixirs and concentrates, multiply the volume dispensed by daily dose and divide by the days supply.

Do not round when calculating average daily dose.

**Table DAE-A: High-Risk Medications**

Description	Prescription	
Anticholinergics, first-generation antihistamines	<ul style="list-style-type: none"> <li>• Brompheniramine</li> <li>• Carbinoxamine</li> <li>• Chlorpheniramine</li> <li>• Clemastine</li> <li>• Cyproheptadine</li> <li>• Dexbrompheniramine</li> <li>• Dexchlorpheniramine</li> </ul>	<ul style="list-style-type: none"> <li>• Diphenhydramine (oral)</li> <li>• Dimenhydrinate</li> <li>• Doxylamine</li> <li>• Hydroxyzine</li> <li>• Meclizine</li> <li>• Promethazine</li> <li>• Triprolidine</li> </ul>
Anticholinergics, anti-Parkinson agents	<ul style="list-style-type: none"> <li>• Benztropine (oral)</li> </ul>	<ul style="list-style-type: none"> <li>• Trihexyphenidyl</li> </ul>
Antispasmodics	<ul style="list-style-type: none"> <li>• Atropine (exclude ophthalmic)</li> <li>• Belladonna alkaloids</li> <li>• Clidinium-chlordiazepoxide</li> <li>• Dicyclomine</li> </ul>	<ul style="list-style-type: none"> <li>• Hyoscyamine</li> <li>• Propantheline</li> <li>• Scopolamine</li> </ul>
Antithrombotics	<ul style="list-style-type: none"> <li>• Dipyridamole, oral short-acting (does not apply to the extended-release combination with aspirin)</li> </ul>	<ul style="list-style-type: none"> <li>• Ticlopidine</li> </ul>
Cardiovascular, alpha agonists, central	<ul style="list-style-type: none"> <li>• Guanabenz</li> <li>• Guanfacine</li> </ul>	<ul style="list-style-type: none"> <li>• Methyldopa</li> </ul>
Cardiovascular, other	<ul style="list-style-type: none"> <li>• Disopyramide</li> </ul>	<ul style="list-style-type: none"> <li>• Nifedipine, immediate release</li> </ul>
Central nervous system, antidepressants	<ul style="list-style-type: none"> <li>• Amitriptyline</li> <li>• Clomipramine</li> <li>• Amoxapine</li> <li>• Desipramine</li> <li>• Imipramine</li> </ul>	<ul style="list-style-type: none"> <li>• Trimipramine</li> <li>• Nortriptyline</li> <li>• Paroxetine</li> <li>• Protriptyline</li> </ul>
Central nervous system, barbiturates	<ul style="list-style-type: none"> <li>• Amobarbital</li> <li>• Butabarbital</li> <li>• Butalbital</li> <li>• Mephobarbital</li> </ul>	<ul style="list-style-type: none"> <li>• Pentobarbital</li> <li>• Phenobarbital</li> <li>• Secobarbital</li> </ul>
Central nervous system, vasodilators	<ul style="list-style-type: none"> <li>• Ergot mesylates</li> </ul>	<ul style="list-style-type: none"> <li>• Isoxsuprine</li> </ul>
Central nervous system, other	<ul style="list-style-type: none"> <li>• Meprobamate</li> </ul>	
Endocrine system, estrogens with or without progestins; include only oral and topical patch products	<ul style="list-style-type: none"> <li>• Conjugated estrogen</li> <li>• Esterified estrogen</li> </ul>	<ul style="list-style-type: none"> <li>• Estradiol</li> <li>• Estropipate</li> </ul>
Endocrine system, sulfonylureas, long-duration	<ul style="list-style-type: none"> <li>• Chlorpropamide</li> </ul>	<ul style="list-style-type: none"> <li>• Glyburide</li> </ul>
Endocrine system, other	<ul style="list-style-type: none"> <li>• Desiccated thyroid</li> </ul>	<ul style="list-style-type: none"> <li>• Megestrol</li> </ul>
Pain medications, skeletal muscle relaxants	<ul style="list-style-type: none"> <li>• Carisoprodol</li> <li>• Chlorzoxazone</li> <li>• Cyclobenzaprine</li> </ul>	<ul style="list-style-type: none"> <li>• Metaxalone</li> <li>• Methocarbamol</li> <li>• Orphenadrine</li> </ul>
Pain medications, other	<ul style="list-style-type: none"> <li>• Indomethacin</li> <li>• Ketorolac, includes parenteral</li> </ul>	<ul style="list-style-type: none"> <li>• Meperidine</li> <li>• Pentazocine</li> </ul>

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1 2016. Combination drugs that include medications listed in Table DAE-A are included in the NDC list.

**Table DAE-B: High-Risk Medications With Days Supply Criteria**

Description	Prescription	Days Supply Criteria	
Anti-infectives, other	<ul style="list-style-type: none"> <li>• Nitrofurantoin</li> <li>• Nitrofurantoin macrocrystals</li> </ul>	<ul style="list-style-type: none"> <li>• Nitrofurantoin macrocrystals-monohydrate</li> </ul>	>90 days
Nonbenzodiazepine hypnotics	<ul style="list-style-type: none"> <li>• Eszopiclone</li> <li>• Zaleplon</li> </ul>	<ul style="list-style-type: none"> <li>• Zolpidem</li> </ul>	>90 days

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Table DAE-C: High-Risk Medications With Average Daily Dose Criteria**

Description	Prescription	Average Daily Dose Criteria
Alpha agonists, central	<ul style="list-style-type: none"> <li>• Reserpine</li> </ul>	>0.1 mg/day
Cardiovascular, other	<ul style="list-style-type: none"> <li>• Digoxin</li> </ul>	>0.125 mg/day
Tertiary TCAs (as single agent or as part of combination products)	<ul style="list-style-type: none"> <li>• Doxepin</li> </ul>	>6 mg/day

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

## Data Elements for Reporting

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table DAE-3: Data Elements for Use of High-Risk Medications in the Elderly**

	Administrative
Measurement year	✓
Data collection method (Administrative)	✓
Eligible population	✓
Numerator events by administrative data	For each of the 2 rates
Numerator events by supplemental data	For each of the 2 rates
Reported rate	For each of the 2 rates
Lower 95% confidence interval	For each of the 2 rates
Upper 95% confidence interval	For each of the 2 rates

## Osteoporosis Management in Women Who Had a Fracture (OMW)

### Summary of Changes to HEDIS 2017

- Added a requirement to not include ED visits and observation visits that result in an inpatient stay in steps 1 and 2 of the event/diagnosis.
- Added instructions to identify direct transfers.
- Clarified that for direct transfers, the first admission date should be used when determining the number of days prior to the IESD in step 4.

### Description

The percentage of women 67–85 years of age who suffered a fracture and who had either a bone mineral density (BMD) test or prescription for a drug to treat osteoporosis in the six months after the fracture.

### Definitions

<b>Intake Period</b>	A 12-month (1 year) window that begins on July 1 of the year prior to the measurement year and ends on June 30 of the measurement year. The Intake Period is used to capture the first fracture.
<b>IESD</b>	<p>Index Episode Start Date. The earliest date of service for any encounter during the Intake Period with a diagnosis of fracture.</p> <p><i>For an outpatient, observation or ED visit, the IESD is date of service.</i></p> <p><i>For an inpatient stay, the IESD is the date of discharge.</i></p> <p><i>For direct transfers, the IESD is the discharge date from the last admission.</i></p>
<b>Negative Diagnosis History</b>	<p>A period of 60 days (2 months) prior to the IESD when the member had no diagnosis of fracture.</p> <p><i>For fractures requiring an inpatient stay, use the date of admission to determine Negative Diagnosis History.</i></p> <p><i>For direct transfers, use the first admission date to determine the Negative Diagnosis History.</i></p>
<b>Direct transfer</b>	<p>A <b>direct transfer</b> is when the discharge date from one inpatient setting and the admission date to a second inpatient setting are one calendar day apart or less. For example:</p> <ul style="list-style-type: none"> <li>• An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 1, is a direct transfer.</li> <li>• An inpatient discharge on June 1, followed by an admission to an inpatient setting on June 2, is a direct transfer.</li> <li>• An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 3, is not a direct transfer; these are two distinct inpatient stays.</li> </ul>

Use the following method to identify admissions to and discharges from inpatient settings.

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Identify the admission and discharge dates for the stay.

**Active prescription** A prescription is considered active if the “days supply” indicated on the date the member filled the prescription is the number of days or more between that date and the relevant service date.

## Eligible Population

*Note: Members in hospice are excluded from the eligible population. Refer to General Guideline 20: Members in Hospice.*

<b>Product line</b>	Medicare.
<b>Age</b>	Women 67–85 years as of December 31 of the measurement year.
<b>Continuous enrollment</b>	12 months (1 year) before the IESD through 180 days (6 months) after the IESD.
<b>Allowable gap</b>	No more than one gap in enrollment of up to 45 days during the continuous enrollment period.
<b>Anchor date</b>	IESD.
<b>Benefits</b>	Medical and pharmacy.
<b>Event/ diagnosis</b>	The earliest fracture during the Intake Period. Follow the steps below to identify the eligible population.

- Step 1** Identify all members who had either of the following during the Intake Period.
- An outpatient visit (Outpatient Value Set), an observation visit (Observation Value Set) or an ED visit (ED Value Set), for a fracture (Fractures Value Set).
    - Do not include ED visits or observation visits that result in an inpatient stay (Inpatient Stay Value Set). An ED visit or observation visit results in an inpatient stay when the ED/observation date of service and the admission date for the inpatient stay are one calendar day apart or less.
  - An acute or nonacute inpatient discharge for a fracture (Fractures Value Set). To identify acute and nonacute inpatient discharges:
    1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
    2. Identify the discharge date for the stay.

If the member had more than one fracture, include only the first fracture.

**Step 2** Test for Negative Diagnosis History. Exclude members who had either of the following during the 60-day (2 months) period prior to the IESD.

- An outpatient visit (Outpatient Value Set), an observation visit (Observation Value Set) or an ED visit (ED Value Set) for a fracture (Fractures Value Set).
  - Do not include ED visits or observation visits that result in an inpatient stay (Inpatient Stay Value Set). An ED visit or observation visit that results in an inpatient stay is when the ED/observation date of service and the admission date are one calendar day apart or less.
- An acute or nonacute inpatient discharge for a fracture (Fractures Value Set). To identify acute and nonacute inpatient discharges:
  1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
  2. Identify the discharge date for the stay.

*For an acute or nonacute inpatient IESD, use the IESD date of admission to determine the 60-day period.*

*For direct transfers, use the first admission to determine the Negative Diagnosis History.*

**Step 3** Calculate continuous enrollment. Members must be continuously enrolled during the 12 months prior to the fracture through 180 days (6 months) post-fracture.

**Step 4:** Exclude members who met any of the following criteria:  
**Required exclusions**

- Members who had a BMD test (Bone Mineral Density Tests Value Set) during the 730 days (24 months) prior to the IESD.
- Members who had a claim/encounter for osteoporosis therapy (Osteoporosis Medications Value Set) during the 365 days (12 months) prior to the IESD.
- Members who received a dispensed prescription or had an active prescription to treat osteoporosis (Table OMW-C) during the 365 days (12 months) prior to the IESD.

*For an acute or nonacute inpatient IESD, use the IESD date of admission to determine the number of days prior to the IESD.*

*For direct transfers, use the first admission date to determine the number of days prior to the IESD.*

### Administrative Specification

**Denominator** The eligible population.

**Numerator** Appropriate testing or treatment for osteoporosis after the fracture defined by any of the following criteria:

- A BMD test (Bone Mineral Density Tests Value Set), in any setting, on the IESD or in the 180-day (6-month) period after the IESD.

- If the IESD was an inpatient stay, a BMD test (Bone Mineral Density Tests Value Set) during the inpatient stay.
- Osteoporosis therapy (Osteoporosis Medications Value Set) on the IESD or in the 180-day (6-month) period after the IESD.
- If the IESD was an inpatient stay, long-acting osteoporosis therapy (Long-Acting Osteoporosis Medications Value Set) during the inpatient stay.
- A dispensed prescription to treat osteoporosis (Table OMW-C) on the IESD or in the 180-day (6-month) period after the IESD

**Table OMW-C: Osteoporosis Therapies**

Description	Prescription
Biphosphonates	<ul style="list-style-type: none"> <li>• Alendronate</li> <li>• Alendronate-cholecalciferol</li> <li>• Ibandronate</li> <li>• Risedronate</li> <li>• Zoledronic acid</li> </ul>
Other agents	<ul style="list-style-type: none"> <li>• Calcitonin</li> <li>• Denosumab</li> <li>• Raloxifene</li> <li>• Teriparatide</li> </ul>

**Note:** NCQA will post a comprehensive list of medications and NDC codes to [www.ncqa.org](http://www.ncqa.org) by November 1, 2016.

**Note**

- Fractures of finger, toe, face and skull are not included in this measure.

**Data Elements for Reporting**

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table OMW-3: Data Elements for Osteoporosis Management in Women Who Had a Fracture**

	Administrative
Measurement year	✓
Data collection methodology (Administrative)	✓
Eligible population	✓
Number of required exclusions	✓
Numerator events by administrative data	✓
Numerator events by supplemental data	✓
Reported rate	✓
Lower 95% confidence interval	✓
Upper 95% confidence interval	✓

## Antidepressant Medication Management (AMM)

### Summary of Changes to HEDIS 2017

- Revised the required exclusion instructions for inpatient stays to search for admissions or discharges that occur during the 121-day period.
- Clarified the number of gap days allowed for each numerator.

### Description

The percentage of members 18 years of age and older who were treated with antidepressant medication, had a diagnosis of major depression and who remained on an antidepressant medication treatment. Two rates are reported.

1. *Effective Acute Phase Treatment.* The percentage of members who remained on an antidepressant medication for at least 84 days (12 weeks).
2. *Effective Continuation Phase Treatment.* The percentage of members who remained on an antidepressant medication for at least 180 days (6 months).

### Definitions

<b>Intake Period</b>	The 12-month window starting on May 1 of the year prior to the measurement year and ending on April 30 of the measurement year.
<b>IPSD</b>	Index Prescription Start Date. The earliest prescription dispensing date for an antidepressant medication where the date is in the Intake Period and there is a Negative Medication History.
<b>Negative Medication History</b>	A period of 105 days prior to the IPSD when the member had no pharmacy claims for either new or refill prescriptions for an antidepressant medication.
<b>Treatment days</b>	The actual number of calendar days covered with prescriptions within the specified 180-day (6-month) measurement interval. For Effective Continuation Phase Treatment, a prescription of 90 days (3 months) supply dispensed on the 151st day will have 80 days counted in the 231-day interval.

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. Refer to General Guideline 20: Members in Hospice.

<b>Product lines</b>	Commercial, Medicaid, Medicare (report each product line separately).
<b>Ages</b>	18 years and older as of April 30 of the measurement year.
<b>Continuous enrollment</b>	105 days prior to the IPSD through 231 days after the IPSD.

<b>Allowable gap</b>	One gap in enrollment of up to 45 days. To determine continuous enrollment for a Medicaid beneficiary for whom enrollment is verified monthly, the member may not have more than a 1-month gap in coverage (i.e., a member whose coverage lapses for 2 months [60 days] is not considered continuously enrolled).
<b>Anchor date</b>	IPSD.
<b>Benefits</b>	Medical and pharmacy.
<b>Event/ diagnosis</b>	Follow the steps below to identify the eligible population, which is used for both rates.  <b>Step 1</b> Determine the IPSD. Identify the date of the earliest dispensing event for an antidepressant medication (Table AMM-C) during the Intake Period.  <b>Step 2: Required exclusion</b> Exclude members who did not have a diagnosis of major depression in an inpatient, outpatient, ED, intensive outpatient or partial hospitalization setting during the 121-day period from 60 days prior to the IPSD, through the IPSD and the 60 days after the IPSD. Members who meet any of the following criteria remain in the eligible population: <ul style="list-style-type: none"><li>• An outpatient visit, intensive outpatient encounter or partial hospitalization with any diagnosis of major depression. Either of the following code combinations meets criteria:<ul style="list-style-type: none"><li>– <u>AMM Stand Alone Visits Value Set</u> <b>with</b> <u>Major Depression Value Set</u>.</li><li>– <u>AMM Visits Value Set</u> <b>with</b> <u>AMM POS Value Set</u> <b>and</b> <u>Major Depression Value Set</u>.</li></ul></li><li>• An ED visit (<u>ED Value Set</u>) with any diagnosis of major depression (<u>Major Depression Value Set</u>).</li><li>• An acute or nonacute inpatient stay with any diagnosis of major depression (<u>Major Depression Value Set</u>). To identify acute and nonacute inpatient stays:<ol style="list-style-type: none"><li>1. Identify all acute and nonacute inpatient stays (<u>Inpatient Stay Value Set</u>).</li><li>2. Identify the admission and discharge dates for the stay. Either an admission or discharge during the required time frame meets criteria.</li></ol></li></ul> <b>Step 3</b> Test for Negative Medication History. Exclude members who filled a prescription for an antidepressant medication 105 days prior to the IPSD.  <b>Step 4</b> Calculate continuous enrollment. Members must be continuously enrolled for 105 days prior to the IPSD to 231 days after the IPSD.

**Administrative Specification**

**Denominator** The eligible population.

**Numerators**

**Effective Acute Phase Treatment** At least 84 days (12 weeks) of treatment with antidepressant medication (Table AMM-C), beginning on the IPSD through 114 days after the IPSD (115 total days). This allows gaps in medication treatment up to a total of 31 days during the 115-day period. Gaps can include either washout period gaps to change medication or treatment gaps to refill the same medication.

**Table AMM-C: Antidepressant Medications**

Description	Prescription		
Miscellaneous antidepressants	• Bupropion	• Vilazodone	• Vortioxetine
Monoamine oxidase inhibitors	• Isocarboxazid • Phenelzine	• Selegiline • Tranylcypromine	
Phenylpiperazine antidepressants	• Nefazodone	• Trazodone	
Psychotherapeutic combinations	• Amitriptyline-chlordiazepoxide • Amitriptyline-perphenazine		• Fluoxetine-olanzapine
SNRI antidepressants	• Desvenlafaxine • Duloxetine	• Levomilnacipran • Venlafaxine	
SSRI antidepressants	• Citalopram • Escitalopram	• Fluoxetine • Fluvoxamine	• Paroxetine • Sertraline
Tetracyclic antidepressants	• Maprotiline	• Mirtazapine	
Tricyclic antidepressants	• Amitriptyline • Amoxapine • Clomipramine	• Desipramine • Doxepin (>6 mg) • Imipramine	• Nortriptyline • Protriptyline • Trimipramine

**Continuation Phase Treatment** At least 180 days (6 months) of treatment with antidepressant medication (Table AMM-C) beginning on the IPSD through 231 days after the IPSD (232 total days). This allows gaps in medication treatment up to a total of 52 days during the 232-day period. Gaps can include either washout period gaps to change medication or treatment gaps to refill the same medication.

**Note**

- Organizations may have different methods for billing intensive outpatient encounters and partial hospitalizations. Some methods may be comparable to outpatient billing, with separate claims for each date of service; others may be comparable to inpatient billing, with an admission date, a discharge date and units of service. Organizations whose billing methods are comparable to inpatient billing may count each unit of service as an individual visit. The unit of service must have occurred during the period specified.

## Data Elements for Reporting

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table AMM-1/2/3: Data Elements for Antidepressant Medication Management**

	Administrative
Measurement year	✓
Data collection methodology (Administrative)	✓
Eligible population	✓
Number of required exclusions	✓
Numerator events by administrative data	<i>Each of the 2 rates</i>
Numerator events by supplemental data	<i>Each of the 2 rates</i>
Reported rate	<i>Each of the 2 rates</i>
Lower 95% confidence interval	<i>Each of the 2 rates</i>
Upper 95% confidence interval	<i>Each of the 2 rates</i>

## Follow-Up After Hospitalization for Mental Illness (FUH)

### Summary of Changes to HEDIS 2017

- Removed language instructing organizations to use only facility claims to identify discharges and diagnoses for denominator events. This is now addressed in *General Guideline 46*.
- Added value sets to identify direct transfers.

**Note:** For this measure, organizations are not required to differentiate between readmissions and direct transfers; therefore, the definition of direct transfer is not required.

### Description

The percentage of discharges for members 6 years of age and older who were hospitalized for treatment of selected mental illness diagnoses and who had a follow-up visit with a mental health practitioner. Two rates are reported:

1. The percentage of discharges for which the member received follow-up within 30 days of discharge.
2. The percentage of discharges for which the member received follow-up within 7 days of discharge.

### Eligible Population

**Note:** Members in hospice are excluded from the eligible population. Refer to *General Guideline 20: Members in Hospice*.

<b>Product lines</b>	Commercial, Medicaid, Medicare (report each product line separately).
<b>Ages</b>	6 years and older as of the date of discharge.
<b>Continuous enrollment</b>	Date of discharge through 30 days after discharge.
<b>Allowable gap</b>	No gaps in enrollment.
<b>Anchor date</b>	None.
<b>Benefits</b>	Medical and mental health (inpatient and outpatient).
<b>Event/ diagnosis</b>	An acute inpatient discharge with a principal diagnosis of mental illness ( <u>Mental Illness Value Set</u> ) on or between January 1 and December 1 of the measurement year. To identify acute inpatient discharges: <ol style="list-style-type: none"> <li>1. Identify all acute and nonacute inpatient stays (<u>Inpatient Stay Value Set</u>).</li> <li>2. Exclude nonacute inpatient stays (<u>Nonacute Inpatient Stay Value Set</u>).</li> <li>3. Identify the discharge date for the stay.</li> </ol>

The denominator for this measure is based on discharges, not on members. If members have more than one discharge, include all discharges on or between January 1 and December 1 of the measurement year.

**Acute  
readmission or  
direct transfer**

If the discharge is followed by readmission or direct transfer to an acute inpatient care setting for a principal mental health diagnosis (Mental Health Diagnosis Value Set) within the 30-day follow-up period, count only the last discharge. Exclude both the initial discharge and the readmission/direct transfer discharge if the last discharge occurs after December 1 of the measurement year.

To identify readmissions and direct transfers to an acute inpatient care setting:

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
3. Identify the admission date for the stay.

**Exclusions**

Exclude discharges followed by readmission or direct transfer to a nonacute inpatient care setting within the 30-day follow-up period, regardless of principal diagnosis for the readmission. To identify readmissions and direct transfers to a nonacute inpatient care setting:

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Confirm the stay was for nonacute care based on the presence of a nonacute code (Nonacute Inpatient Stay Value Set) on the claim.
3. Identify the admission date for the stay.

Exclude discharges followed by readmission or direct transfer to an acute inpatient care setting within the 30-day follow-up period if the principal diagnosis was for non-mental health (any principal diagnosis code other than those included in the Mental Health Diagnosis Value Set). To identify readmissions and direct transfers to an acute inpatient care setting:

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
3. Identify the admission date for the stay.

These discharges are excluded from the measure because rehospitalization or direct transfer may prevent an outpatient follow-up visit from taking place.

## Administrative Specification

**Denominator** The eligible population.

### Numerators

**30-Day Follow-Up** A follow-up visit with a mental health practitioner within 30 days after discharge. Include visits that occur on the date of discharge.

**7-Day Follow-Up** A follow-up visit with a mental health practitioner within 7 days after discharge. Include visits that occur on the date of discharge.

For both indicators, any of the following meet criteria for a follow-up visit:

- A visit (FUH Stand Alone Visits Value Set) with a mental health practitioner.
- A visit (FUH Visits Group 1 Value Set **and** FUH POS Group 1 Value Set) with a mental health practitioner.
- A visit (FUH Visits Group 2 Value Set **and** FUH POS Group 2 Value Set) with a mental health practitioner.
- A visit in a behavioral healthcare setting (FUH RevCodes Group 1 Value Set).
- A visit in a nonbehavioral healthcare setting (FUH RevCodes Group 2 Value Set) with a mental health practitioner.
- A visit in a nonbehavioral healthcare setting (FUH RevCodes Group 2 Value Set) with a diagnosis of mental illness (Mental Illness Value Set).
- Transitional care management services (TCM 7 Day Value Set), where the date of service on the claim is 29 days after the eligible population event/diagnosis date of discharge.

The following meets criteria for only the 30-Day Follow-Up indicator:

- Transitional care management services (TCM 14 Day Value Set), where the date of service on the claim is 29 days after the event/diagnosis date of discharge.

**Transitional care management** is a 30-day period that begins on the date of discharge and continues for the next 29 days. The date of service on the claim is 29 days after discharge and not the date of the face-to-face visit.

### Note

- *Organizations may have different methods for billing intensive outpatient visits and partial hospitalizations. Some methods may be comparable to outpatient billing, with separate claims for each date of service; others may be comparable to inpatient billing, with an admission date, a discharge date and units of service. Organizations whose billing methods are comparable to inpatient billing may count each unit of service as an individual visit. The unit of service must have occurred during the required period for the rate (e.g., within 30 days after discharge or within 7 days after discharge).*
- *Refer to Appendix 3 for the definition of mental health practitioner.*

**Data Elements for Reporting**

Organizations that submit HEDIS data to NCQA must provide the following data elements.

**Table FUH-1/2/3: Data Elements for Follow-Up After Hospitalization for Mental Illness**

	<b>Administrative</b>
Measurement year	✓
Data collection methodology (Administrative)	✓
Eligible population	✓
Numerator events by administrative data	<i>Each of the 2 rates</i>
Numerator events by supplemental data	<i>Each of the 2 rates</i>
Reported rate	<i>Each of the 2 rates</i>
Lower 95% confidence interval	<i>Each of the 2 rates</i>
Upper 95% confidence interval	<i>Each of the 2 rates</i>

## Board Certification (BCR)

### Summary of Changes to HEDIS 2017

- No changes to this measure.

### Description

The percentage of the following physicians whose board certification is *active* as of December 31 of the measurement year:

- Family medicine physicians.
- Internal medicine physicians.
- Pediatricians.
- OB/GYN physicians.
- Geriatricians.
- Other physician specialists.

**Board certification** refers to the various specialty certification programs of the American Board of Medical Specialties and the American Osteopathic Association. Report each product separately as of December 31 of the measurement year.

**Product lines** Commercial, Medicaid, Medicare (report each product line separately).

**Physicians** This measure applies to independent physicians or group of physicians who provide care for members.

**Organizations must include:**

- Physicians who have an independent relationship with the organization. An **independent relationship** exists when an organization selects and directs its members to see a specific physician or group of physicians. An independent relationship is not synonymous with an “independent contract.” Physicians may contract with the organization directly or indirectly (e.g., physicians contract with an IPA).
- Physicians who are listed in the organization’s directory.
- Physicians who see members outside of the inpatient hospital setting or outside of free-standing facilities.
- Physicians who are hospital based and who see members as a result of their independent relationship with the organization; for example:
  - Anesthesiologists with pain management practices.
  - Hospital-based cardiologists.
  - Hospital-based faculty (who meet the criteria above).

**Organizations must exclude:**

- Physicians who practice exclusively within the inpatient hospital setting and who provide care for members only as a result of members being directed to the hospital; for example:
  - Pathologists.
  - Radiologists.
  - Anesthesiologists.
  - Hospitalists.
  - Neonatologists.
  - ED physicians.
- Chiropractors.
- Podiatrists.

- Physicians who practice exclusively within free-standing facilities and who provide care for members only as a result of members being directed to the facility; for example:
  - Mammography centers.
  - Urgent care centers.
  - Surgicenters.
- Dentists who do not provide care under the organization’s medical benefits; for example:
  - Endodontists.
  - Oral surgeons.
  - Periodontists.
- Dentists who provide primary dental care under a dental plan or rider.

**Categories** Use Table BCR-A to identify physicians.

**Table BCR-A: Identifying Physicians**

Product Line	Family Medicine	Internal Medicine	Pediatricians	OB/GYN	Geriatricians	Other Physician Specialists
Commercial	✓	✓	✓	✓	✓	✓
Medicaid	✓	✓	✓	✓	✓	✓
Medicare	✓	✓	✓	✓	✓	✓

**Definitions**

- Family medicine physician** A physician who provides preventive and diagnostic health care services for individuals and families. Report general practitioners in the *Family Medicine* category.
- Internal medicine physician** A physician who provides long-term and comprehensive care and manages common and complex illness of adolescents, adults and the elderly.
- Pediatrician** A physician who provides preventive and diagnostic health care services for infants, children and adolescents.
- OB/GYN physician** A physician who provides medical and surgical care relating to the female reproductive system and associated disorders.
- Geriatrician** A family medicine or internal medicine physician who has special knowledge of the aging process and special skills in the diagnostic, therapeutic, preventive and rehabilitative aspects of illness in the elderly.
- Other physician specialist** Any other physician specialist or physician subspecialist not mentioned above.

## Calculation of Board Certification

<b>Number of physicians in each practice area</b>	<p>Refer to Table BCR-1/2/3. For each product line, identify the number of physicians (with active or inactive board certification) in each practice area, by type and number, with whom the organization contracted as of December 31 of the measurement year.</p> <ul style="list-style-type: none"> <li>Physicians are assumed to practice in the clinical area or areas in which they are listed in an organization's <i>internal</i> directory or classification system. Count physicians listed under more than one category as many times as they are listed, and in each area of practice. For example, count a family medicine physician who also practices as a geriatrician in both the <i>Family Medicine</i> category and the <i>Geriatrician</i> category.</li> <li>Physicians do not have to be listed in the organization's external provider directory to be included in the measure.</li> </ul>
<b>Board certification number</b>	<p>Count the number of physicians in each practice area with active board certification. For example, to be reported as a board-certified geriatrician, a physician must have a specialty certification in geriatric medicine.</p> <ul style="list-style-type: none"> <li><i>Count as board certified:</i> A physician with recent board certification who has not completed a residency/fellowship.</li> <li><i>Do not count as board certified:</i> A physician for whom there is confirmation by the appropriate certifying body that the physician is eligible for and has applied to a board-certification program.</li> </ul>
<b>Board certification percentage</b>	<p>For each type of physician, calculate the percentage whose board certification is active by dividing the board certification number by the number of physicians in each practice area.</p> <p>First, determine the number of areas of specialization and board certification status for each physician; then determine how to count them in the denominator (i.e., number of physicians in each practice area) and the numerator (i.e., number of active board-certified physicians) of the calculation.</p> <p><i>A physician with only one specialty who is not board certified in the specialty counts as 1 in the denominator and 0 in the numerator.</i></p> <p><i>A physician with only one specialty whose board certification is active in the specialty counts as 1 in the denominator and 1 in the numerator.</i></p> <p><i>A physician with more than one specialty counts as 1 in the denominator for each specialty. Count in the numerator the number of specialty areas in which the physician has active board certification.</i></p> <p><b>Example</b></p> <ul style="list-style-type: none"> <li>A physician listed under both hematology and medical oncology counts as 2 in the denominator for <i>Other Physician Specialists</i>.</li> <li>A physician whose board certification is active in both hematology and medical oncology counts as 2 in the numerator.</li> </ul>

- A physician whose board certification is active in only one of these two areas counts as 1 in the numerator.
- A physician whose board certification is not active in either area counts as 0 in the numerator.

**Note**

---

- The physician definitions for this measure are based on the American Board of Medical Specialties (ABMS) definitions for physician specialties.
- The numbers in the column “Number of Physicians in Each Practice Area” might not be the same as the organization’s actual number of physicians because some physicians might practice in more than one area and will be counted in the denominators of several percentages.
- Reporting in the “Pediatrician” category is expected to be rare for the Medicare product line.

**Table BCR-1/2/3: Board Certification**

Type of Physician	Number of Physicians in Each Practice Area	Active Board Certification	
		Number	Percentage
Family medicine			
Internal medicine			
Pediatrician			
OB/GYN			
Geriatrician			
Other physician specialist			

## Plan All-Cause Readmissions (PCR)

### Summary of Changes to HEDIS 2017

- Moved the *Risk Adjustment Determination* section to the *Guidelines for Risk Adjusted Utilization Measures*.
- Clarified that organizations may not consolidate stays into a single stay if the discharge date from the first setting and the admission date of the second setting are two or more calendar days apart.
- Added instructions to identify direct transfers.
- Changed the reference of “discharges” to “admissions” in step 3 of the Numerator.

### Description

For members 18 years of age and older, the number of acute inpatient stays during the measurement year that were followed by an unplanned acute readmission for any diagnosis within 30 days and the predicted probability of an acute readmission. Data are reported in the following categories:

1. Count of Index Hospital Stays (IHS) (denominator).
2. Count of 30-Day Readmissions (numerator).
3. Average Adjusted Probability of Readmission.

**Note:** For commercial, report only members 18–64 years of age.

### Definitions

<b>IHS</b>	Index hospital stay. An acute inpatient stay with a discharge on or between January 1 and December 1 of the measurement year. Exclude stays that meet the exclusion criteria in the denominator section.
<b>Index Admission Date</b>	The IHS admission date.
<b>Index Discharge Date</b>	The IHS discharge date. The index discharge date must occur on or between January 1 and December 1 of the measurement year.
<b>Index Readmission Stay</b>	An acute inpatient stay for any diagnosis with an admission date within 30 days of a previous Index Discharge Date.
<b>Index Readmission Date</b>	The admission date associated with the Index Readmission Stay.
<b>Planned Hospital Stay</b>	A hospital stay is considered planned if it meets criteria as described in step 5 (required exclusions) of the <i>Eligible Population</i> .
<b>Classification Period</b>	365 days prior to and including an Index Discharge Date.

**Risk Adjustment Tables**

Table	Table Description
HCC-Surg	Surgery codes for Risk Adjustment Determination
PCR-DischCC	Discharge Clinical Condition category codes for Risk Adjustment Determination
CC-Comorbid	Comorbid Clinical Condition category codes for Risk Adjustment Determination step 2
HCC-Rank	HCC rankings for Risk Adjustment Determination step 3
HCC-Comb	Combination HCCs for Risk Adjustment Determination step 5
PCR-MA-DischCC-Weight-Under65	MA and SNP primary discharge weights for Risk Adjustment Weighting step 2 for ages under 65
PCR-MA-DischCC-Weight-65plus	MA and SNP primary discharge weights for Risk Adjustment Weighting step 2 for ages 65 and older
PCR-Comm-DischCC-Weight	Commercial primary discharge weights for Risk Adjustment Weighting step 2
PCR-MA-ComorbHCC-Weight-Under65	MA and SNP comorbidity weights for Risk Adjustment Weighting step 3 for ages under 65
PCR-MA-ComorbHCC-Weight-65plus	MA and SNP comorbidity weights for Risk Adjustment Weighting step 3 for ages 65 and older
PCR-Comm-ComorbHCC-Weight	Commercial comorbidity weights for Risk Adjustment Weighting step 3
PCR-MA-OtherWeights-Under65	MA and SNP base risk, surgery, age and gender weights for Risk Adjustment Weighting steps 1, 4, 5 for ages under 65
PCR-MA-OtherWeights-65plus	MA and SNP base risk, surgery, age and gender weights for Risk Adjustment Weighting steps 1, 4, 5 for ages 65 and older
PCR-Comm-OtherWeights	Commercial base risk, surgery, age and gender weights for Risk Adjustment Weighting steps 1, 4, 5

**Note:** The risk adjustment tables will be released on November 1, 2016, and posted to [www.ncqa.org](http://www.ncqa.org).

**Eligible Population**

**Note:** Members in hospice are excluded from the eligible population. Refer to General Guideline 20: Members in Hospice.

- Product line** Commercial, Medicare (report each product line separately).
- Ages** For commercial, ages 18–64 as of the Index Discharge Date.  
For Medicare, ages 18 and older as of the Index Discharge Date.
- Continuous enrollment** 365 days prior to the Index Discharge Date through 30 days after the Index Discharge Date.
- Allowable gap** No more than one gap in enrollment of up to 45 days during the 365 days prior to the Index Discharge Date and no gap during the 30 days following the Index Discharge date.
- Anchor date** Index Discharge Date.
- Benefit** Medical.

<b>Event/ diagnosis</b>	<p>An acute inpatient discharge on or between January 1 and December 1 of the measurement year.</p> <p>The denominator for this measure is based on discharges, not members. Include all acute inpatient discharges for members who had one or more discharges on or between January 1 and December 1 of the measurement year.</p> <p>Follow the steps below to identify acute inpatient stays.</p>
-----------------------------	---

### Administrative Specification

**Denominator** The eligible population.

- Step 1** Identify all acute inpatient discharges on or between January 1 and December 1 of the measurement year. To identify acute inpatient discharges:
1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
  2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
  3. Identify the discharge date for the stay.

Inpatient stays where the discharge date from the first setting and the admission date to the second setting are two or more calendar days apart must be considered distinct inpatient stays.

The measure includes acute discharges from any type of facility (including behavioral healthcare facilities).

- Step 2** **Acute-to-acute direct transfers:** Keep the original admission date as the Index Admission Date, but use the direct transfer's discharge date as the Index Discharge Date.

A **direct transfer** is when the discharge date from one inpatient setting and the admission date to a second inpatient setting are one calendar day apart or less. For example:

- An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 1, is a direct transfer.
- An inpatient discharge on June 1, followed by an admission to an inpatient setting on June 2, is a direct transfer.
- An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 3, is not a direct transfer; these are two distinct inpatient stays.

Use the following method to identify acute-to-acute direct transfers:

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
3. Identify the admission and discharge dates for the stay.

- Step 3** Exclude hospital stays where the Index Admission Date is the same as the Index Discharge Date.

- Step 4:** Exclude hospital stays for the following reasons:  
**Required exclusions**
- The member died during the stay.
  - A principal diagnosis of pregnancy (Pregnancy Value Set).
  - A principal diagnosis of a condition originating in the perinatal period (Perinatal Conditions Value Set).

**Note:** For hospital stays where there was an acute-to-acute direct transfer (identified in step 2), use both the original stay and the direct transfer stay to identify exclusions in this step.

- Step 5:** For all acute inpatient discharges identified using steps 1–4, determine if there was a planned hospital stay within 30 days after the acute inpatient discharge. To identify planned hospital stays: identify all acute inpatient discharges on or between January 3 and December 31 of the measurement year:  
**Required exclusions**
1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
  2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
  3. Identify the admission date for the stay.
  4. Exclude any hospital stay as an Index Hospital Stay if the admission date of the **first** stay within 30 days meets any of the following criteria:
    - A principal diagnosis of maintenance chemotherapy (Chemotherapy Value Set).
    - A principal diagnosis of rehabilitation (Rehabilitation Value Set).
    - An organ transplant (Kidney Transplant Value Set, Bone Marrow Transplant Value Set, Organ Transplant Other Than Kidney Value Set).
    - A potentially planned procedure (Potentially Planned Procedures Value Set) without a principal acute diagnosis (Acute Condition Value Set).

**Note:** For hospital stays where there was an acute-to-acute direct transfer (identified in step 2), use only the original stay to identify planned hospital stays in this step (i.e., do not use diagnoses and procedures from the direct transfer stay).

- Example 1** For a member with the following acute inpatient stays, exclude stay 1 as an Index Hospital Stay.
- Stay 1 (January 30–February 1 of the measurement year): Acute inpatient discharge with a principal diagnosis of COPD.
  - Stay 2 (February 5–7 of the measurement year): Acute inpatient discharge with a principal diagnosis of maintenance chemotherapy.

- Example 2** For a member with the following acute inpatient stays, exclude stays 2 and 3 as Index Hospital Stays in the following scenario.
- Stay 1 (January 15–17 of the measurement year): Acute inpatient discharge with a principal diagnosis of diabetes
  - Stay 2 (January 30–February 1 of the measurement year): Acute inpatient discharge with a principal diagnosis of COPD.

- *Stay 3 (February 5–7 of the measurement year):* Acute inpatient discharge with an organ transplant.
- *Stay 4 (February 10–15 of the measurement year):* Acute inpatient discharge with a principal diagnosis of rehabilitation.

**Step 6** Calculate continuous enrollment.

**Step 7** Assign each acute inpatient stay to an age category. Refer to Table PCR-A-2/3 and Table PCR-B-3.

## Risk Adjustment Determination

---

For each IHS, use the following steps to identify risk adjustment categories based on presence of surgeries, discharge condition, comorbidity, age and gender.

<b>Surgeries</b>	Determine if the member underwent surgery during the inpatient stay. Download the list of codes from the NCQA Web site (Table HCC-Surg) and use it to identify surgeries. Consider an IHS to include a surgery if at least one procedure code in Table HCC-Surg is present from any provider between the admission and discharge dates.
<b>Discharge Condition</b>	Assign a discharge Clinical Condition (CC) category code or codes to the IHS based on its primary discharge diagnosis, using Table PCR-DischCC. For acute-to-acute direct transfers, use the direct transfer's primary discharge diagnosis.  Exclude diagnoses that cannot be mapped to Table PCR-DischCC.
<b>Comorbidities</b>	Refer to the <i>Utilization Risk Adjustment Determination</i> in the <i>Guidelines for Risk Adjusted Utilization Measures</i> .

## Risk Adjustment Weighting

---

For each IHS, use the following steps to identify risk adjustment weights based on presence of surgeries, discharge condition, comorbidity, age and gender.

**Note:** *The final weights table will be released on November 1, 2016.*

**Step 1** For each IHS with a surgery, link the surgery weight.

- *For Medicare product lines ages 18–64:* Use Table PCR-MA-OtherWeights-Under65.
- *For Medicare product lines ages 65 and older:* Use Table PCR-MA-OtherWeights-65plus.
- *For commercial product lines:* Use Table PCR-Comm-OtherWeights.

**Step 2** For each IHS with a discharge CC Category, link the primary discharge weights.

- For Medicare product lines ages 18-64: Use Table PCR-MA-DischCC-Weight-Under65.
- For Medicare product lines ages 65 and older: Use Table PCR-MA-DischCC-Weight-65plus.
- For commercial product lines: Use Table PCR-Comm-DischCC-Weight.

**Step 3** For each IHS with a comorbidity HCC Category, link the weights.

- For Medicare product lines ages 18-64: Use Table PCR-MA-ComorbHCC-Weight-Under65.
- For Medicare product lines ages 65 and older: Use Table PCR-MA-ComorbHCC-Weight-65plus.
- For commercial product lines: Use Table PCR-Comm-ComorbHCC-Weight.

**Step 4** Link the age and gender weights for each IHS.

- For Medicare product lines ages 18-64: Use Table PCR-MA-OtherWeights-Under65.
- For Medicare product lines ages 65 and older: Use Table PCR-MA-OtherWeights-65plus.
- For commercial product lines: Use Table PCR-Comm-OtherWeights.

**Step 5** Identify the base risk weight.

- For Medicare product lines ages 18-64: Use Table PCR-MA-OtherWeights-Under65.
- For Medicare product lines ages 65 and older: Use Table PCR-MA-OtherWeights-65plus.
- For commercial product lines: Use Table PCR-Comm-OtherWeights to determine the base risk weight.

**Step 6** Sum all weights associated with the IHS (i.e., presence of surgery, primary discharge diagnosis, comorbidities, age, gender and base risk weight).

**Step 7** Use the formula below to calculate the adjusted probability of a readmission based on the sum of the weights for each IHS.

$$\text{Adjusted probability of readmission} = \frac{e^{(\sum \text{WeightsForIHS})}}{1 + e^{(\sum \text{WeightsForIHS})}}$$

**OR**

$$\text{Adjusted probability of readmission} = [\exp (\text{sum of weights for IHS } )] / [ 1 + \exp (\text{sum of weights for IHS } ) ]$$

**Note:** “Exp” refers to the exponential or antilog function.

**Step 8** Use the formula below and the adjusted probability of readmission calculated in step 7 to calculate the variance for each IHS.

$$\text{Variance} = \text{Adjusted probability of readmission} \times (1 - \text{Adjusted probability of readmission})$$

*Example:* If the adjusted probability of readmission is 0.1518450741 for an IHS, then the variance for this IHS is  $0.1518450741 \times 0.8481549259 = 0.1287881476$ .

**Note:** *The variance is calculated at the IHS level. Organizations must sum the variances for each age/gender and total category when populating the Total Variance cells in the reporting tables.*

Sample Table: PCR—Risk Adjustment Weighting

Member ID*	Admiss. Counter	Base Risk Weight	Age	Gender	Age and Gender Weight	Surgical Weight	ICD 9 Diagnosis Code	Discharge CC		HCC PCR		Sum of Weights	Adjusted Probability	Variance
								Category	Weight	Category	Weight			
1250	1	-1.08883	67	Female	0.1000	-0.2800	250.4	15	0.0700	20 25	0.1400 0.2000	-0.8600	0.2976	0.2090
4010	1	-1.08883	50.00	Male	0.1200	NA	007.4	5	0.0300	NA	NA	-0.9400	0.2811	0.2021
4010	2	-1.08883	50.00	Male	0.1200	NA	298.00	77	0.0600	5 47	0.0100 0.3300	-0.5700	0.3615	0.2308

\*Each Member ID field with a value represents a unique IHS.

**Numerator** At least one acute readmission for any diagnosis within 30 days of the Index Discharge Date.

**Step 1** Identify all acute inpatient stays with an admission date on or between January 3 and December 31 of the measurement year. To identify acute inpatient admissions:

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
3. Identify the admission date for the stay.

Inpatient stays where the discharge date from the first setting and the admission date to the second setting are two or more calendar days apart must be considered distinct inpatient stays. If an organization consolidates these stays into a single event (for any reason), the original distinct inpatient stays must be used.

**Step 2 Acute-to-acute direct transfers:** Keep the original admission date as the Index Admission Date, but use the direct transfer’s discharge date as the Index Discharge Date.

A **direct transfer** is when the discharge date from one inpatient setting and the admission date to a second inpatient setting are one calendar day apart or less. For example:

- An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 1, is a direct transfer.
- An inpatient discharge on June 1, followed by an admission to an inpatient setting on June 2, is a direct transfer.
- An inpatient discharge on June 1, followed by an admission to another inpatient setting on June 3, is not a direct transfer; these are two distinct inpatient stays.

Use the following method to identify acute-to-acute direct transfers:

1. Identify all acute and nonacute inpatient stays (Inpatient Stay Value Set).
2. Exclude nonacute inpatient stays (Nonacute Inpatient Stay Value Set).
3. Identify the admission and discharge dates for the stay.

**Step 3** Exclude acute inpatient hospital admissions with a principal diagnosis of pregnancy (Pregnancy Value Set) or a principal diagnosis for a condition originating in the perinatal period (Perinatal Conditions Value Set).

**Step 4** For each IHS, determine if any of the acute inpatient stays have an admission date within 30 days after the Index Discharge Date.

### **Reporting: Denominator**

---

Count the number of IHS for each age and enter these values into the reporting table.

### **Reporting: Risk Adjustment**

---

**Step 1** Calculate the average adjusted probability for each IHS for each age and the overall total.

Organizations must calculate the probability of readmission for each hospital stay within the applicable age group to calculate the average (which is reported to NCQA). For the total age category, the probability of readmission for all hospital stays in the age categories must be averaged together; organizations cannot take the average of the average adjusted probabilities reported for each age.

**Step 2** Round to four decimal places using the .5 rule and enter these values into the reporting table.

**Note:** Do not take the average of the cells in the reporting table.

**Example** For the “18–44” age category:

- Identify all IHS by 18–44 year-old males and calculate the average adjusted probability.
- Identify all IHS by 18–44 year-old females and calculate the average adjusted probability.
- Identify all IHS by all 18–44 year-olds and calculate the average adjusted probability.

Repeat for each subsequent group.

**Step 3** Calculate the total (sum) variance for each age and the overall total.

**Step 4** Round to four decimal places using the .5 rule and enter these values into the reporting table.

### **Reporting: Numerator**

---

Count the number of IHS with a readmission within 30 days for each age and enter these values into the reporting table.

**Table PCR-A-2/3: Plan All-Cause Readmissions Rates by Age and Risk Adjustment**

Age	Count of Index Stays (Denominator)	Count of 30 Day Readmissions (Numerator)	Observed Readmissions (Num/Den)	Average Adjusted Probability	Total Variance	O/E Ratio (Observed Readmissions/Average Adjusted Probability)	Lower Confidence Interval (O/E Ratio)	Upper Confidence Interval (O/E Ratio)
18-44	_____	_____	_____	_____	_____	_____	_____	_____
45-54	_____	_____	_____	_____	_____	_____	_____	_____
55-64	_____	_____	_____	_____	_____	_____	_____	_____
<b>Total</b>	_____	_____	_____	_____	_____	_____	_____	_____

**Table PCR-B-3: Plan All-Cause Readmissions Rates by Age and Risk Adjustment**

Age	Count of Index Stays (Denominator)	Count of 30 Day Readmissions (Numerator)	Observed Readmissions (Num/Den)	Average Adjusted Probability	Total Variance	O/E Ratio (Observed Readmissions/Average Adjusted Probability)	Lower Confidence Interval (O/E Ratio)	Upper Confidence Interval (O/E Ratio)
65-74	_____	_____	_____	_____	_____	_____	_____	_____
75-84	_____	_____	_____	_____	_____	_____	_____	_____
85+	_____	_____	_____	_____	_____	_____	_____	_____
<b>Total</b>	_____	_____	_____	_____	_____	_____	_____	_____

## Appendix C: Reporting Plan All-Cause Readmissions

For this year's report, we modified the display of the *Plan All-Cause Readmissions* measure. The change was made to enhance interpretability of results and put this measure on the same 0%–100% scale as other HEDIS measures. The new display—the calibrated risk-standardized rate—is directly linked to how we historically report data using observed-to-expected (O/E) ratios.

- *Calibration* sets the average O/E ratio as the reference point for each reporting unit to correct for aging of risk weights (i.e., NCQA calculates weights on a three-year schedule) and differences between the data sample used to generate risk weights and the population of reporting units (i.e., the sample NCQA uses to generate the weights is a non-random sample of all Medicare Advantage reporting units).
- *Risk standardization* rescales the measure from O/E performance to 30-day readmissions. In the example in Table C.1, the reporting unit has a risk-standardized rate of 16%, which is 11.1% better than the national average performance of 18%.

This approach lets us calculate significance testing for changes in measure performance.

**Table C.1. Calculating the calibrated risk-standardized rate for Plan All-Cause Readmissions.**

Step	Explanation	Example
Step 1	Obtain each reporting unit's O/E ratio.	Assume this unit is $(O/E)_{unit} = 0.8$
Step 2	Calibrate the O/E ratio to the national average O/E: $(O/E)_{calibrated} = (O/E)_{unit} / (O/E)_{Avg.}$	$(O/E)_{Avg.} = 0.9$ $(O/E)_{calibrated.} = 0.8 / 0.9$ $= 0.8889$
Step 3	Calculate the national average observed performance rate. $Observed_{Avg} = \sum Observed_i / N$	Assume the average of all units is: $Observed_{Avg} = 18.0\%$
Step 4	Convert to risk standardized rate. $Rate = (O/E)_{calibrated} \times Observed_{Avg}$	$Rate = 0.8889 \times 18.0\% = 16\%$