Proposed Retirement for HEDIS®[1] MY 2020
Medication Management for People With Asthma (MMA)

NCQA seeks comments on the proposed retirement of the HEDIS *Medication Management for People with Asthma (MMA)* measure. Introduced to HEDIS in 2012, the measure assesses whether patients 5–64 years of age with persistent asthma were dispensed appropriate controller medications they remained on during the treatment period. Both a 50% and a 75% adherence rate are reported. The measure is reported by Medicaid and commercial product lines.

Update on Selected Topics in Asthma Management 2020, a recently released draft version of a report from the National Asthma Education and Prevention Program Coordinating Committee Expert Panel Report 4 Working Group, includes new recommendations for controller combination therapy for both daily and quick-relief use. This recommendation (its implementation) will likely impact interpretation of MMA performance rates.

Emerging evidence published in recent years also suggests that the MMA measure is not correlated with improved clinical outcomes. In general, stakeholders express support for retiring MMA from HEDIS.

Supporting documents for this measure include the current measure specification and performance data.

NCQA acknowledges the contributions of the Respiratory Measurement Advisory Panel, the Technical Measurement Advisory Panel and other stakeholders.

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Medication Management for People With Asthma (MMA)

SUMMARY OF CHANGES TO HEDIS MEASUREMENT YEAR 2020

- Retire measure.

Description

The percentage of members 5–64 years of age during the measurement year who were identified as having persistent asthma and were dispensed appropriate medications that they remained on during the treatment period. Two rates are reported:

1. The percentage of members who remained on an asthma controller medication for at least 50% of their treatment period.
2. The percentage of members who remained on an asthma controller medication for at least 75% of their treatment period.

Definitions

IPSD	Index prescription start date. The earliest prescription dispensing date for any asthma controller medication during the measurement year.
Treatment period	The period of time beginning on the IPSD through the last day of the measurement year.
PDC	Proportion of days covered. The number of days that a member is covered by at least one asthma controller medication, divided by the number of days in the treatment period.
Oral medication dispensing event	One prescription of an amount lasting 30 days or less. To calculate dispensing events for prescriptions longer than 30 days, divide the days supply by 30 and round down to convert. For example, a 100-day prescription is equal to three dispensing events (100/30 = 3.33, rounded down to 3). Allocate the dispensing events to the appropriate year based on the date when the prescription is filled.

Multiple prescriptions for different medications dispensed on the same day count as separate dispensing events. If multiple prescriptions for the same medication are dispensed on the same day, sum the days supply and divide by 30.

Use the medication lists to determine if drugs are the same or different. Drugs in different medication lists are considered different drugs.
- *Two prescriptions* for different medications dispensed on the same day, each with a 60-day supply, equals four dispensing events (two prescriptions with two dispensing events each).
- *Two prescriptions* for different medications dispensed on the same day, each with a 15-day supply, equals two dispensing events (two prescriptions with one dispensing event each).
- *Two prescriptions* for the same medication dispensed on the same day, each with a 15-day supply, equals one dispensing event (sum the days supply for a total of 30 days).

- *Two prescriptions* for the same medication dispensed on the same day, each with a 60-day supply, equals four dispensing events (sum the days supply for a total of 120 days).

Inhaler dispensing event

When *identifying the eligible population*, use the definition below to count inhaler dispensing events.

All inhalers (i.e., canisters) of the same medication dispensed on the same day count as one dispensing event. Different inhaler medications dispensed on the same day are counted as different dispensing events. For example, if a member received three canisters of Medication A and two canisters of Medication B on the same date, it would count as two dispensing events.

Allocate the dispensing events to the appropriate year based on the date when the prescription was filled.

Use the medication lists to determine if drugs are the same or different. Drugs in different medication lists are considered different drugs.

Injection or intravenous dispensing event

Each injection or intravenous infusion counts as one dispensing event. Multiple dispensed injections of the same or different medications count as separate dispensing events. For example, if a member received two injections of Medication A and one injection of Medication B on the same date, it would count as three dispensing events.

Use the medication lists to determine if drugs are the same or different. Drugs in different medication lists are considered different drugs.

Allocate the dispensing events to the appropriate year based on the date when the prescription was filled.

Calculating number of days covered for the numerator

If multiple prescriptions for different medications are dispensed on the same day, calculate number of days covered by a controller medication using the prescriptions with the longest days supply. For multiple different prescriptions dispensed on different days with overlapping days supply, count each day within the treatment period only once toward the numerator.

If multiple prescriptions for the same medication are dispensed on the same or different day, sum the days supply and use the total to calculate the number of days covered by a controller medication. For example, three controller prescriptions for the same medication are dispensed on the same day, each with a 30-day supply, sum the days supply for a total of 90 days covered by a controller.

Subtract any days supply that extends beyond December 31 of the measurement year.
Use the medication lists to determine if drugs are the same or different. Drugs in different medication lists are considered different drugs.

Eligible Population

Note: Members in hospice are excluded from the eligible population. Refer to General Guideline 17: Members in Hospice.

Product lines	Commercial, Medicaid (report each product line separately).
Ages	Ages 5–64 as of December 31 of the measurement year. Report the following age stratifications and total rate:

- 5–11 years.
- 12–18 years.
- 19–50 years.
- 51–64 years.
- Total.

The total is the sum of the age stratifications for each product line.

Continuous enrollment	The measurement year and the year prior to the measurement year.
Allowable gap	No more than one gap in enrollment of up to 45 days during each year of continuous enrollment. 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 during each year of continuous enrollment.
Anchor date	December 31 of the measurement year.
Benefits	Medical. Pharmacy during the measurement year.
Event/diagnosis	Follow the steps below to identify the eligible population for the measure.

Step 1   Identify members as having persistent asthma who met at least one of the following criteria during both the measurement year and the year prior to the measurement year. Criteria need not be the same across both years.

- At least one ED visit (ED Value Set), with a principal diagnosis of asthma (Asthma Value Set).

- At least one acute inpatient encounter (Acute Inpatient Value Set), with a principal diagnosis of asthma (Asthma Value Set) **without** telehealth (Telehealth Modifier Value Set; Telehealth POS Value Set).

- At least one acute inpatient discharge with a principal diagnosis of asthma (Asthma Value Set). 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.

- At least four outpatient visits (Outpatient Value Set), observation visits (Observation Value Set), telephone visits (Telephone Visits Value Set) or online assessments (Online Assessments Value Set) on different dates of service, with any diagnosis of asthma (Asthma Value Set) **and** at least two asthma medication dispensing events for any controller or reliever medication. Visit type need not be the same for the four visits. Use all the medication lists in the tables below to identify asthma controller and reliever medications.

Only three of the four visits may be an outpatient telehealth visit, a telephone visit or an online assessment. Identify outpatient telehealth visits by the presence of a telehealth modifier (Telehealth Modifier Value Set) or the presence of a telehealth POS code (Telehealth POS Value Set) associated with the outpatient visit.

- At least four asthma medication dispensing events for any controller or reliever medication. Use all the medication lists in the tables below to identify asthma controller and reliever medications.

Asthma Controller Medications

Description	Prescriptions	Medication Lists	Route
Antiasthmatic combinations	• Dyphylline-guaifenesin	Dyphylline Guaifenesin Medications List	Oral
Antibody inhibitors	• Omalizumab	Omalizumab Medications List	Subcutaneous
Anti-interleukin-5	• Benralizumab	Benralizumab Medications List	Subcutaneous
Anti-interleukin-5	• Mepolizumab	Mepolizumab Medications List	Subcutaneous
Anti-interleukin-5	• Reslizumab	Reslizumab Medications List	Intravenous
Inhaled steroid combinations	• Budesonide-formoterol	Budesonide Formoterol Medications List	Inhalation
Inhaled steroid combinations	• Fluticasone-salmeterol	Fluticasone Salmeterol Medications List	Inhalation
Inhaled steroid combinations	• Fluticasone-vilanterol	Fluticasone Vilanterol Medications List	Inhalation
Inhaled steroid combinations	• Formoterol-mometasone	Formoterol Mometasone Medications List	Inhalation
Inhaled corticosteroids	• Beclomethasone	Beclomethasone Medications List	Inhalation
Inhaled corticosteroids	• Budesonide	Budesonide Medications List	Inhalation
Inhaled corticosteroids	• Ciclesonide	Ciclesonide Medications List	Inhalation
Inhaled corticosteroids	• Flunisolide	Flunisolide Medications List	Inhalation
Inhaled corticosteroids	• Fluticasone	Fluticasone Medications List	Inhalation
Inhaled corticosteroids	• Mometasone	Mometasone Medications List	Inhalation
Leukotriene modifiers	• Montelukast	Montelukast Medications List	Oral
Leukotriene modifiers	• Zafirlukast	Zafirlukast Medications List	Oral
Leukotriene modifiers	• Zileuton	Zileuton Medications List	Oral
Methylxanthines	• Theophylline	Theophylline Medications List	Oral

Asthma Reliever Medications

Description	Prescriptions	Medication Lists	Route
Short-acting, inhaled beta-2 agonists	• Albuterol	Albuterol Medications List	Inhalation
Short-acting, inhaled beta-2 agonists	• Levalbuterol	Levalbuterol Medications List	Inhalation

Step 2 A member identified as having persistent asthma because of at least four asthma medication dispensing events, where leukotriene modifiers or antibody inhibitors were the sole asthma medication dispensed in that year, must also have at least one diagnosis of asthma (Asthma Value Set), in any setting, in the same year as the leukotriene modifier or antibody inhibitor (i.e., the measurement year or the year prior to the measurement year).

Step 3: Required exclusions Exclude members who met any of the following criteria:

- Members who had any diagnosis from any of the following value sets, any time during the member's history through December 31 of the measurement year:
  - Emphysema Value Set.
  - Other Emphysema Value Set.
  - COPD Value Set.
  - Obstructive Chronic Bronchitis Value Set.
  - Chronic Respiratory Conditions Due to Fumes or Vapors Value Set.
  - Cystic Fibrosis Value Set.
  - Acute Respiratory Failure Value Set.
- Members who had no asthma controller medications dispensed during the measurement year. Use all the medication lists in the Asthma Controller Medications table above to identify asthma controller medications.

Administrative Specification

Denominator The eligible population.

Numerators

Medication Compliance 50% The number of members who achieved a PDC of at least 50% for their asthma controller medications during the measurement year.

Medication Compliance 75% The number of members who achieved a PDC of at least 75% for their asthma controller medications during the measurement year. Follow the steps below to identify numerator compliance.
Use all the medication lists in the Asthma Controller Medications table above to identify asthma controller medications.

Step 1 Identify the IPSD. The IPSD is the earliest dispensing event for any asthma controller medication during the measurement year.

Step 2 To determine the treatment period, calculate the number of days beginning on the IPSD through the end of the measurement year.

Step 3   Count the days covered by at least one prescription for an asthma controller medication during the treatment period. To ensure that a days supply that extends beyond the measurement year is not counted, subtract any days supply that extends beyond December 31 of the measurement year.

Step 4   Calculate the member's PDC using the following equation. Multiply the equation by 100 and round (using the .5 rule) to the nearest whole number. For example, if a member has 291 total days covered by a medication during a 365-day treatment period, this calculates to 0.7972. Multiply this number by 100, convert it to 79.72% and round it to 80%, the nearest whole number.

$$\frac{\text{Total Days Covered by a Controller Medication in the Treatment Period (step 3)}}{\text{Total Days in Treatment Period (step 2)}}$$

Medication Compliance 50%   Sum the number of members whose PDC is ≥50% for their treatment period.

Medication Compliance 75%   Sum the number of members whose PDC is ≥75% for their treatment period.

Data Elements for Reporting

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

Table MMA-1/2/3: Data Elements for Medication Management for People With Asthma

Data Elements	Administrative
Measurement year	✓
Data collection methodology (Administrative)	✓
Eligible population	*For each age stratification and total*
Number of required exclusions	*For each age stratification and total*
Numerator events by administrative data	*Each rate, for each age stratification and total*
Numerator events by supplemental data	*Each rate, for each age stratification and total*
Reported rate	*Each rate, for each age stratification and total*

HEDIS Health Plan Performance Rates: Medication Management for People With Asthma

Commercial Results: Tables 1–10

Table 1. HEDIS MMA Measure Performance—Commercial Plans (50% Medication Compliance: Total)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	371 (91.6)	75.2	5.3	68.6	72.2	75.6	78.2	80.4
2017	406	384 (94.6)	74.2	5.8	67.4	71.1	74.6	77.6	80.1
2016	420	263 (62.6)	71.7	6.6	65.3	68.7	72.2	75.2	77.9

*For 2018 the average denominator across plans was 1,478 individuals, with a standard deviation of 2,676.

Table 2. HEDIS MMA Measure Performance—Commercial Plans (50% Medication Compliance: 5–11)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	255 (63.0)	65.8	7.7	55.7	60.6	65.9	70.9	73.9
2017	406	262 (64.5)	66.1	7.9	56.4	60.9	66.3	71.6	75.4
2016	420	273 (65.0)	63.6	7.7	54.1	59.1	64.0	68.9	72.7

*For 2018 the average denominator across plans was 249 individuals, with a standard deviation of 390.

Table 3. HEDIS MMA Measure Performance—Commercial Plans (50% Medication Compliance: 12–18)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	249 (61.5)	63.9	7.3	54.5	59.5	63.6	68.3	72.7
2017	406	251 (61.8)	63.2	7.8	54.1	58.2	63.5	68.3	71.7
2016	420	263 (62.6)	61.9	7.2	52.6	58.0	62.1	66.7	70.4

*For 2018 the average denominator across plans was 228 individuals, with a standard deviation of 315.

Table 4. HEDIS MMA Measure Performance—Commercial Plans (50% Medication Compliance: 19–50)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	348 (85.9)	74.3	6.2	66.7	70.6	74.8	78.3	81.4
2017	406	362 (89.2)	73.2	6.2	65.2	69.5	73.8	76.8	80.1
2016	420	367 (87.4)	70.0	6.0	62.5	66.7	70.2	74.2	76.8

*For 2018 the average denominator across plans was 672 individuals, with a standard deviation of 1,157.

Table 5. HEDIS MMA Measure Performance—Commercial Plans (50% Medication Compliance: 51–64)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	344 (84.9)	82.5	5.0	76.7	79.7	82.7	85.3	88.4
2017	406	353 (87.0)	81.6	5.2	75.7	78.6	81.9	84.8	87.2
2016	420	354 (84.3)	79.3	5.5	72.8	76.1	79.5	82.7	85.5

*For 2018 the average denominator across plans was 551 individuals, with a standard deviation of 966.

Table 6. HEDIS MMA Measure Performance—Commercial Plans (75% Medication Compliance: Total)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	375 (92.6)	52.8	7.2	44.5	48.3	53.1	57.3	60.8
2017	406	388 (95.6)	51.5	7.5	43.1	47.0	51.8	56.2	59.7
2016	420	401 (95.5)	49.0	7.2	40.6	44.7	48.5	53.3	57.1

*For 2018 the average denominator across plans was 1,492 individuals, with a standard deviation of 2,674.

Table 7. HEDIS MMA Measure Performance—Commercial Plans (75% Medication Compliance: 5–11)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	255 (63.0)	40.8	8.3	31.1	34.4	40.6	45.7	52.8
2017	406	265 (65.3)	40.8	8.7	30.4	34.2	40.0	46.1	52.4
2016	420	273 (65.0)	38.2	8.0	28.8	32.8	37.1	43.3	49.1

*For 2018 the average denominator across plans was 251 individuals, with a standard deviation of 388.

Table 8. HEDIS MMA Measure Performance—Commercial Plans (75% Medication Compliance: 12–18)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	252 (62.2)	39.6	8.0	29.8	34.3	39.4	44.5	49.3
2017	406	254 (62.6)	38.8	8.4	28.7	33.1	38.2	44.3	48.6
2016	420	263 (62.6)	37.0	7.6	27.3	31.8	36.6	42.2	47.0

*For 2018 the average denominator across plans was 699 individuals, with a standard deviation of 757.

Table 9. HEDIS MMA Measure Performance—Commercial Plans (75% Medication Compliance: 19–50)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	351 (86.4)	51.5	8.2	41.2	46.2	51.7	56.3	61.0
2017	406	365 (89.9)	49.9	8.2	39.7	44.7	50.3	54.9	59.1
2016	420	367 (87.4)	46.6	7.5	37.7	41.8	46.7	51.4	55.7

*For 2018 the average denominator across plans was 168 individuals, with a standard deviation of 1,157.

Table 10. HEDIS MMA Measure Performance—Commercial Plans (75% Medication Compliance: 51–64)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	405	347 (85.7)	63.1	7.5	54.2	58.2	63.4	67.6	71.4
2017	406	353 (87.0)	61.7	7.3	53.7	57.3	61.6	66.3	69.8
2016	420	354 (84.3)	58.5	7.6	49.4	53.6	58.7	62.9	66.7

*For 2018 the average denominator across plans was 557 individuals, with a standard deviation of 966.

Medicaid Results: Tables 11-20

Table 11. HEDIS MMA Measure Performance—Medicaid Plans (50% Medication Compliance: Total)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	206 (80.5)	61.6	7.8	52.4	56.0	61.4	65.7	72.1
2017	275	216 (78.6)	60.9	9.0	50.1	54.8	60.0	66.3	73.4
2016	282	220 (78.0)	59.1	9.8	47.2	51.8	57.8	65.0	72.1

*For 2018 the average denominator across plans was 2,439 individuals, with a standard deviation of 2,963.

Table 12. HEDIS MMA Measure Performance—Medicaid Plans (50% Medication Compliance: 5–11)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	182 (71.1)	56.7	8.2	46.9	51.3	56.4	61.3	67.9
2017	275	191 (69.5)	56.3	9.4	45.8	50.6	54.9	60.7	69.6
2016	282	191 (67.7)	54.5	10.4	44.4	47.5	52.6	59.7	68.3

*For 2018 the average denominator across plans was 974 individuals, with a standard deviation of 1,084.

Table 13. HEDIS MMA Measure Performance—Medicaid Plans (50% Medication Compliance: 12–18)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	183 (79.5)	55.4	8.5	45.4	49.6	55.0	60.9	66.7
2017	275	188 (68.4)	54.3	9.7	43.9	48.5	52.9	59.2	67.9
2016	282	189 (67.0)	52.7	9.9	42.6	46.4	51.0	57.7	64.3

*For 2018 the average denominator across plans was 702 individuals, with a standard deviation of 762.

Table 14. HEDIS MMA Measure Performance—Medicaid Plans (50% Medication Compliance: 19–50)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	191 (76.6)	65.0	6.5	57.5	60.4	65.1	68.9	73.1
2017	275	198 (72.0)	64.3	8.3	54.7	58.8	64.3	69.0	74.0
2016	282	199 (70.6)	62.4	8.6	52.3	57.0	62.4	66.7	73.8

*For 2018 the average denominator across plans was 718 individuals, with a standard deviation of 947.

Table 15. HEDIS MMA Measure Performance—Medicaid Plans (50% Medication Compliance: 51–64)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	164 (64.1)	75.9	6.3	68.5	71.9	76.7	80.2	82.6
2017	275	171 (62.2)	75.4	7.2	67.3	71.6	75.5	80.0	83.3
2016	282	168 (59.6)	73.7	7.9	62.5	69.4	73.9	78.4	83.3

*For 2018 the average denominator across plans was 354 individuals, with a standard deviation of 495.

Table 16. HEDIS MMA Measure Performance—Medicaid Plans (75% Medication Compliance: Total)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	209 (81.6)	31.8	8.8	22.3	25.9	30.6	35.9	42.8
2017	275	219 (79.6)	37.0	10.8	24.5	29.4	35.8	43.5	51.6
2016	282	223 (79.1)	35.0	11.0	22.6	27.6	33.5	41.1	51.2

*For 2018 the average denominator across plans was 2,442 individuals, with a standard deviation of 2,946.

Table 17. HEDIS MMA Measure Performance—Medicaid Plans (75% Medication Compliance: 5–11)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	185 (72.3)	31.8	8.8	22.3	25.9	30.6	35.9	42.8
2017	275	194 (70.6)	31.2	10.4	20.8	24.2	29.3	35.1	43.0
2016	282	194 (68.8)	29.6	11.0	19.1	22.2	27.2	34.2	43.6

*For 2018 the average denominator across plans was 972 individuals, with a standard deviation of 1,077.

Table 18. HEDIS MMA Measure Performance—Medicaid Plans (75% Medication Compliance: 12–18)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	186 (72.6)	31.0	8.5	21.0	25.1	29.8	36.7	42.7
2017	275	191(69.5)	30.0	10.5	19.4	23.1	28.0	34.8	43.4
2016	282	192 (68.1)	28.6	10.7	17.7	20.9	27.2	33.0	41.0

*For 2018 the average denominator across plans was 699 individuals, with a standard deviation of 757.

Table 19. HEDIS MMA Measure Performance—Medicaid Plans (75% Medication Compliance: 19–50)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	194 (86.7)	41.7	8.3	31.9	36.4	41.5	46.0	52.4
2017	275	201 (73.1)	41.2	9.9	29.5	34.5	40.4	46.2	53.7
2016	282	202 (71.6)	39.0	10.5	27.2	32.6	38.0	42.9	51.8

*For 2018 the average denominator across plans was 719 individuals, with a standard deviation of 941.

Table 20. HEDIS MMA Measure Performance—Medicaid Plans (75% Medication Compliance: 51–64)

Measurement Year	Total Number of Plans (N)	Number of Plans Reporting (N (%))	Performance Rates (%)						
			Mean	Standard Deviation	10th Percentile	25th Percentile	50th Percentile	75th Percentile	90th Percentile
2018*	256	167 (65.2)	54.6	8.5	43.1	49.8	55.1	60.2	66.0
2017	275	174 (63.3)	54.0	10.3	42.4	48.2	53.6	60.2	65.5
2016	282	171 (60.6)	51.8	9.7	40.4	45.8	51.4	56.7	62.7

*For 2018 the average denominator across plans was 356 individuals, with a standard deviation of 491.