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MassHealth Managed Care HEDIS[®] 2008 Final Report

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Executive Summary

The MassHealth Managed Care HEDIS® 2008 Report presents information on the quality of care provided by the five health plans serving the MassHealth managed care population (Boston Medical Center HealthNet Plan, Fallon Community Health Plan, Neighborhood Health Plan, Network Health, and the Primary Care Clinician Plan). This assessment was conducted by the MassHealth Office of Clinical Affairs (OCA), the MassHealth Office of Acute and Ambulatory Care (OAAC), the Center for Health Policy and Research (CHPR), and the MassHealth Behavioral Health Program (MHBH). The data presented represent a subset of the Health-care Effectiveness Data and Information Set (HEDIS) measures. HEDIS was developed by the National Committee for Quality Assurance (NCQA) and is the most widely used set of standardized performance measures to evaluate and report on the quality of care delivered by health care organizations. Through this collaborative project, OCA, OAAC, CHPR, and MHBH have evaluated a broad range of clinical and service areas that are of importance to MassHealth members, policy makers and program staff.

Measures Selected for HEDIS 2008

The MassHealth measurement set for 2008 focused on three domains: “staying healthy” (i.e., childhood immunization status, well child visits for infants and young children, adolescent well-care visits, and children and adolescents’ access to primary care physicians), “living with illness” (i.e., use of appropriate medications for people with asthma, antidepressant medication management, and follow-up after hospitalization for mental illness), “getting better” (i.e., appropriate use of antibiotics for upper respiratory infection), and the utilization of mental health services.

Summary of Overall Results

Results from the MassHealth Managed Care HEDIS 2008 project demonstrate that MassHealth plans performed well overall when compared to the 2008 rates for other Medicaid plans around the country. Throughout this report, we will give results of tests of statistical significance comparing the performance of individual MassHealth plans with that of the top 25% of all Medicaid plans reporting HEDIS data for 2008 (represented by the 2008 national Medicaid 75th percentile, obtained from NCQA’s Quality Compass® database.)

MassHealth plans performed best, relative to this national benchmark, on measures in the “staying healthy” domain. At least four of the five MassHealth plans reported rates that were significantly better than the 2008 national Medicaid 75th percentile for the measures assessing well-child visits in the first 15 months of life; well-child visits in the 3rd, 4th, 5th, and 6th years of life; adolescent well-care visits; and for three of the four age groupings in the children and adolescents’ access to primary care physicians measure. MassHealth plan performance was also strong on the childhood immunization measure. All five plans met the national benchmark, with one plan exceeding it for the Combination 2 vaccine, and two plans exceeding the benchmark for Combination 3.

MassHealth plans’ results were mixed for several other measures, with some plans performing above the benchmark, some below, and others with no statistically significant difference from the benchmark. The antidepressant medication management, follow-up after hospitalization for mental illness, and appropriate treatment for children with upper respiratory infection measures follow this pattern, along with one age grouping (12 to 24 months) in the chil-

dren and adolescents’ access to primary care physicians measure.

MassHealth plans’ performance on the use of appropriate medications for people with asthma measure was also mixed. In this case, none of the five plans exceeded the national benchmark for any of the asthma measures, while several plans were significantly below the benchmark for at least one of the age groupings in the measures.

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Quality Compass® is a registered trademark of the National Committee for Quality Assurance (NCQA).*

Executive Summary (*continued*)

Childhood Immunization Status

- For Combination 2 (4 diphtheria-tetanus-pertussis, 3 injectable polio, 1 measles-mumps-rubella, 3 H influenza type B, 3 hepatitis B and 1 chicken pox vaccine by age 2), the overall MassHealth rate (i.e., the MassHealth weighted mean) was 81.2%.
- One MassHealth plan (FCHP) performed significantly better than the 2008 national Medicaid 75th percentile for Combination 2.
- One plan (PCC Plan) reported Combination 2 rates that were significantly better than its HEDIS 2006 rate. (NCQA has made several changes to this measure that should be considered when comparing HEDIS 2008 and HEDIS 2006 rates. See page 17 for more information.)
- The MassHealth rate for Combination 3 (all Combination 2 immunizations plus 4 pneumococcal conjugate vaccines) was 76.8%.
- Two plans (NHP and FCHP) performed statistically better than the 2008 national Medicaid 75th percentile for Combination 3.
- All five plans had 2008 rates that represented a statistically significant improvement on their HEDIS 2006 rates for Combination 3.

Well-Child Visits in the First Fifteen Months of Life (0, 1, 2, 3, 4, 5, and 6 or more visits)

- Eighty-one percent (81.1%) of MassHealth members who turned 15 months of age during 2007 had six or more well-child visits.
- For the six or more visit rate, all five MassHealth plans performed significantly better than the 2008 national Medicaid 75th percentile.
- One plan (NH) reported a rate of six or more visits that was significantly better than its HEDIS 2006 rate.

Well-Child Visits in the Third, Fourth, Fifth, and Sixth Years of Life (at least one visit during 2007)

- The MassHealth rate of members aged three through six receiving at least one well-child visit was 84.5%.
- Four MassHealth plans (PCC Plan, NHP, NH and BMCHP) performed significantly better than the 2008 national Medicaid 75th percentile.
- For all five plans, there was no statistical difference when the 2008 rates were compared to the 2006 rates.

Adolescent Well-Care Visits (at least one visit during 2007)

- Sixty-one percent (61.1%) of MassHealth members aged 12-21 had at least one well-care visit.
- Four MassHealth plans (PCC Plan, NHP, NH and BMCHP) performed significantly better than the 2008 national Medicaid 75th percentile.
- All five plans reported rates that were not significantly different than their 2006 rates.

Children and Adolescents' Access to Primary Care Practitioners (at least one visit during 2007 for the 12-24 month and 25 month-6 year age groups; at least one visit during 2006 or 2007 for the 7-11 and 12-19 age groups)

- Ninety-seven percent (97.3%) of all MassHealth members aged 12 to 24 months had a visit with a primary care practitioner. One plan (PCC Plan) had a rate that was significantly better than the 2008 benchmark rate. Two plans (NH and BMCHP) had 2008 rates that were significantly better than their 2006 rates.
- Ninety-four percent (93.6%) of all MassHealth members aged 25 months to 6 years of age had a visit with a primary care practitioner. Four plans (PCC Plan, NHP, NH and BMCHP) had rates that were significantly better than the

2008 benchmark rate. Two plans (NH and BMCHP) had 2008 rates that were significantly better than their 2006 rates.

- Ninety-seven percent (97.0%) of all MassHealth members aged 7 to 11 years of age had a visit with a primary care practitioner. All five plans had rates that were significantly better than the 2008 benchmark rate. Three plans (NHP, NH, and BMCHP) had 2008 rates that were significantly better than their 2006 rates.
- Ninety-five percent (94.7%) of all MassHealth adolescent members 12 to 19 years of age had a visit with a primary care practitioner. All five plans had rates that were significantly better than the 2008 benchmark rate. Two plans (NH and BMCHP) had 2008 rates that were significantly better than their 2006 rates.

Use of Appropriate Medications for People with Asthma

- Eighty-seven percent (87.2%) of MassHealth members 5-56 years of age with persistent asthma were appropriately prescribed asthma control medication.
- None of the MassHealth plans performed significantly better than the 2008 national Medicaid 75th percentile for any of the measure's age stratified rates (5-9 years, 10-17 years, and 18-56 years), or for the combined age group rate (18-56 years).
- One plan (NHP) had a 2008 rate that was significantly better than its 2006 rate for the combined age group (5 to 56 years).

Executive Summary (*continued*)

Antidepressant Medication Management

- The MassHealth managed care rate for optimal practitioner contacts during the 84-day acute treatment phase was 29.2%. One MassHealth plan (NH) had a rate that was significantly better than the 2008 national Medicaid 75th percentile. This plan also had a 2008 rate that was significantly better than its 2007 rate.
- The MassHealth managed care rate for effective acute phase treatment was 44.4%. None of the five plans scored significantly higher than either the national Medicaid 75th percentile, or their previous (2007) individual plan rates.
- The MassHealth managed care rate for effective continuation phase treatment was 28.9%. None of the five MassHealth plans significantly exceeded either the national benchmark, or their own previous plan rate from 2007.

national Medicaid 75th percentile. All five plans had 2008 rates that were significantly better than their 2007 rates.

Follow-up After Hospitalization for Mental Illness

- The MassHealth managed care 7-day follow-up rate was 55.9%. Two plans (NHP and FCHP) had rates that were significantly better than the 2008 national Medicaid 75th percentile. Four plans (PCC Plan, NH, FCHP and BMCHP) had 2008 rates that were not significantly different than their 2007 rates.
- The MassHealth managed care 30-day follow-up rate was 75.8%. Three plans (NHP, NH, and FCHP) had rates that were significantly better than the 2008 national Medicaid 75th percentile. Four plans (PCC Plan, NH, FCHP and BMCHP) had 2008 rates that were not significantly different than their 2007 rates.

Appropriate Treatment for Children with Upper Respiratory Infection

- The overall MassHealth rate of appropriate use of antibiotics in children with upper respiratory infection was 90.6%. Three MassHealth plans (NHP, FCHP, and BMCHP) had rates that were significantly better than the 2008

Summary of MassHealth Managed Care HEDIS 2008 Results

HEDIS 2008 Measure	2008 National Medicaid 75 th Percentile	PCC Plan	NHP	NH	FCHP	BMCHP
Childhood Immunization						
Combination 2	80.1%	81.5%	83.1%	78.6%	87.1%↑	80.8%
Combination 3	74.2%	75.2%	78.9%↑	74.2%	84.0%↑	77.6%
Well-Child Visits for Infants and Young Children						
Well-Child Visits in First 15 Months of Life (6+ visits)	65.5%	87.1%↑	81.7%↑	79.3%↑	76.1%↑	77.6%↑
Well-Child Visits in the 3rd, 4th, 5th and 6th Years of Life	74.0%	83.0%↑	82.1%↑	83.0%↑	74.9%	88.3%↑
Adolescent Well-Care Visits						
Adolescent Well-Care Visits	51.4%	60.8%↑	58.2%↑	58.5%↑	53.8%	65.5%↑
Children and Adolescents' Access to Primary Care Physicians						
Age 12 to 24 Months	97.4%	98.1%↑	97.5%	95.6%↓	96.5%	97.8%
Age 25 Months to 6 Years	89.6%	95.6%↑	92.9%↑	91.3%↑	91.3%	93.7%↑
Age 7 to 11 Years	91.6%	98.0%↑	96.6%↑	95.3%↑	96.3%↑	96.8%↑
Age 12 to 19 Years	90.1%	96.3%↑	94.3%↑	92.8%↑	94.4%↑	93.6%↑
Use of Appropriate Medications for People with Asthma						
Age 5 to 9 Years	94.5%	94.5%	94.4%	92.8%	n/a	95.9%
Age 10 to 17 Years	91.4%	88.6%↓	93.0%	90.7%	n/a	92.8%
Age 18 to 56 Years	88.7%	81.1%↓	86.0%	86.3%	77.6%↓	86.2%↓
Combined Ages (5 to 56 Years)	90.7%	84.5%↓	90.8%	89.4%	80.2%↓	90.5%

Key: PCC Plan—Primary Care Clinician Plan FCHP—Fallon Community Health Plan
NHP—Neighborhood Health Plan BMCHP—Boston Medical Center HealthNet Plan
NH—Network Health

↑ Indicates a rate that is significantly better than the 2008 national Medicaid 75th percentile.
↓ Indicates a rate that is significantly worse than the 2008 national Medicaid 75th percentile.

Summary of MassHealth Managed Care HEDIS 2008 Results (continued)

HEDIS 2008 Measure	2008 National Medicaid 75 th Percentile	PCC Plan	NHP	NH	FCHP	BMCHP
Antidepressant Medication Management						
Optimal Practitioner Contacts	28.9%	27.3%	31.1%	40.3%↑	25.3%	26.4%
Effective Acute Phase	48.3%	48.7%	45.1%	46.9%	49.4%	34.9%↓
Effective Continuation Phase	31.3%	33.1%	28.1%	32.7%	35.4%	19.7%↓
Follow-up After Hospitalization for Mental Illness						
7 Day	57.4%	55.0%↓	62.4%↑	57.9%	70.2%↑	53.9%↓
30 Day	75.0%	74.4%	80.2%↑	79.3%↑	91.2%↑	76.4%
Appropriate Treatment for Children with Upper Respiratory Infection						
Appropriate Treatment for URI	90.4%	86.3%↓	94.8%↑	90.7%	96.3%↑	93.8%↑

Key: PCC Plan—Primary Care Clinician Plan FCHP—Fallon Community Health Plan
NHP—Neighborhood Health Plan BMCHP—Boston Medical Center HealthNet Plan
NH—Network Health

↑ Indicates a rate that is significantly better than the 2008 national Medicaid 75th percentile.
↓ Indicates a rate that is significantly worse than the 2008 national Medicaid 75th percentile.

Introduction

Introduction

Purpose of the Report

This report presents the results of the MassHealth Managed Care Healthcare Effectiveness Data and Information Set (HEDIS) 2008 project. This report was designed to be used by MassHealth program managers and by managed care organization (MCO) managers to identify plan performance with that of other MassHealth managed care plans and with national benchmarks, identify opportunities for improvement, and set quality improvement goals.

Project Background

The Center for Health Policy and Research (CHPR) collaborated with the MassHealth Office of Acute and Ambulatory Care (OAAC), the MassHealth Behavioral Health Program (MHBH), and the MassHealth Office of Clinical Affairs (OCA) to conduct an annual assessment of the performance of all MassHealth MCOs and the Primary Care Clinician Plan (PCC Plan), the primary care case management program administered by the Executive Office of Health and Human Services (EOHHS). CHPR, OAAC, MHBH and OCA conduct this annual assessment by using a subset of HEDIS measures. Developed by the National Committee for Quality Assurance (NCQA), HEDIS is the most widely used set of standardized performance measures for reporting on the quality of care delivered by health care organizations. HEDIS includes clinical measures of care, as well as measures of access to care and utilization of services.

The measures selected for the MassHealth Managed Care HEDIS 2008 project assess the performance of the five MassHealth plans that provided health care services to MassHealth man-

aged care members during the 2007 calendar year. The five MassHealth plans included in this report are the Primary Care Clinician Plan (PCC Plan), Neighborhood Health Plan (NHP), Network Health (NH), Fallon Community Health Plan (FCHP), and Boston Medical Center HealthNet Plan (BMCHP). Descriptive information about each health plan can be found in the Health Plan Profiles section, beginning on page 12.

MassHealth HEDIS 2008 Measures

MassHealth selected ten measures for the HEDIS 2008 project. The ten measures included in this report assess health care quality in three key areas: effectiveness of care, access and availability of care, and use of services.

The effectiveness of care measures included in this report provide information about preventive services and the management of chronic illness. The specific topics evaluated in this report are childhood immunization; appropriate treatment for children with upper respiratory infection; the use of appropriate medications for people with asthma; antidepressant medication management; and follow up after hospitalization for mental illness.

The access and availability of care measures included in this report provide information about the ability of members to get the basic and important services they need. The specific topics evaluated include well-child visits in the first fifteen months of life; well-child visits in the third, fourth, fifth and sixth years of life; adolescent well-care visits; and children and adolescents' access to primary care practitioners.

The use of services data included in this report are stratified by age and gender, but are not adjusted for any other member characteristics such as comorbidity. Use of services measures provide information about what services health plan members utilize. Health care utilization is affected by member characteristics such as age, sex, comorbidities, and socioeconomic status, all of which could vary across plans. The specific service evaluated in this report is Mental Health Utilization.

Note: MassHealth assesses member satisfaction through the biennial administration of a consumer survey. Member experiences in 2008 will be assessed through a survey administered by the Massachusetts Health Quality Partners (MHQP). Survey data is currently being collected, and MHQP will issue a report (jointly with CHPR) in 2009.

Organization of the MassHealth Managed Care HEDIS 2008 Report

This report presents the results of the MassHealth Managed Care HEDIS 2008 project in four sections. Three of the sections are based on the consumer reporting domains used in NCQA's Health Plan Report Cards (Staying Healthy, Living with Illness, and Getting Better). These three domains include a variety of HEDIS measures dealing with effectiveness of care, and with access to/availability of care. The fourth section (Use of Services) includes data on the utilization of mental health services.

REPORT SECTION	DEFINITION	MEASURES SELECTED BY MASSHEALTH FOR HEDIS 2008 REPORTING
Staying Healthy	These measures provide information about how well a plan provides services that maintain good health and prevent illness.	Childhood Immunization Status Well-Child Visits in the First 15 Months of Life Well-Child Visits in the 3rd, 4th, 5th and 6th Years of Life Adolescent Well-Care Visits Children and Adolescents' Access to Primary Care Practitioners
Living with Illness	These measures provide information about how well a plan helps people manage chronic illness.	Use of Appropriate Medications for People with Asthma Antidepressant Medication Management Follow-up After Hospitalization for Mental Illness
Getting Better	This measure provides information about how well a plan helps people recover from illness.	Appropriate Treatment for Children with URI
Use of Services	These measures provide information about what services health plan members utilize.	Mental Health Utilization

This report also includes several appendices that provide more detailed results:

- **Appendix A** includes a list of the MassHealth regions and the service areas the regions cover.
- **Appendix B** includes Childhood Immunization rates for individual immunizations (e.g., MMR, DTaP, hepatitis B, etc.).
- **Appendix C** includes the 0 visit, 1 visit, 2 visit, 3 visit, 4 visit and 5 visit rates for the Well-Child Visit in the First 15 Months of Life measure.
- **Appendix D** presents data for the Use of Appropriate Medications for People with Asthma measure for PCC Plan members with Essential coverage.
- **Appendix E** presents data for the Antidepressant Medication Management measure for PCC Plan members with Basic, Essential and Non-Basic/Non-Essential coverage.
- **Appendix F** presents data for the Follow-up After Hospitalization for Mental Illness measure for PCC Plan members with Basic, Essential and Non-Basic/Non-Essential coverage.
- **Appendix G** includes age stratified rates for the Mental Health Utilization measure (percentage of members using services, inpatient discharges, and average length of stay) measures for PCC Plan members with Basic, Essential, or Non-Basic/Non-Essential coverage.
- **Appendix H** presents age and gender stratified rates for the Mental Health Utilization measures (percentage of members using services).

Organization of the MassHealth Managed Care HEDIS 2008 Report

Name of measure

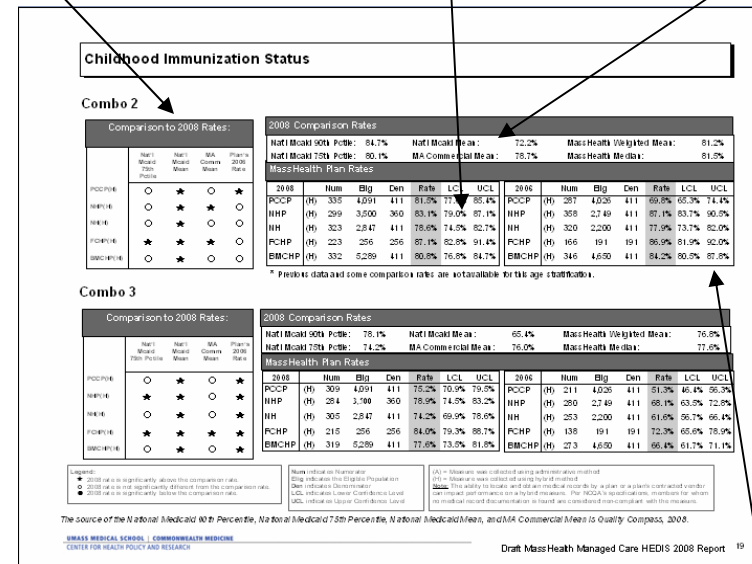
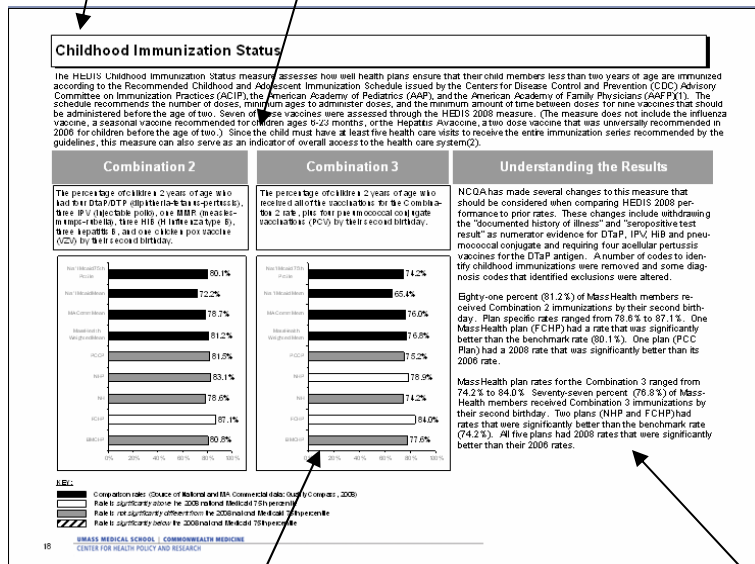
Information on the intent of each measure, including any clinical guidelines on which it is based

Statistical summary comparing plan rates to comparison rates named at the top of each column

- ★ 2008 rate is significantly above the comparison rate
- 2008 rate is not significantly different from the comparison rate
- 2008 rate is significantly below the comparison rate

Individual HEDIS 2008 plan data including numerator, eligible population (where applicable) denominator, reported rate, and upper and lower confidence intervals

The 2008 national Medicaid 75th percentile is listed as a benchmark. The 2008 national Medicaid 90th percentile, 2008 national Medicaid mean, 2008 Massachusetts Commercial mean, and 2008 MassHealth weighted mean and median are listed as comparison rates



Comparison of plan rates with the comparison and benchmark data

Analysis of results, including opportunities for improvement

Historical data from HEDIS 2006/2007

Health Plan Profiles

MassHealth managed care plans provided care to 657,644 Massachusetts residents as of December 31, 2007. The MassHealth Managed Care HEDIS 2008 report includes data from the five MassHealth plans serving members enrolled in Managed Care. This report does not reflect care provided to MassHealth members receiving their health care services outside of the five managed care plans. The following profiles provide some basic information about each plan and its members. The data chart on the next page provides a statistical summary of the demographic characteristics of each plan's population. Appendix A lists the service areas that are located within each MassHealth geographic region listed below. (NOTE: The term "MCOs" is used throughout the report to indicate the four capitated managed care plans serving MassHealth members —Neighborhood Health Plan, Network Health, Fallon Community Health Plan, and Boston Medical Center HealthNet Plan.)

Primary Care Clinician Plan (PCC Plan)

- Primary care case management program administered by the Executive Office of Health and Human Services (EOHHS).
- Statewide managed care option for MassHealth members eligible for managed care.
- 279,602 MassHealth members as of December 31, 2007.
- Provider network includes group practices, community health centers, hospital outpatient departments, hospital-licensed health centers, and individual practitioners.
- Behavioral health services are managed through a carve-out with the Massachusetts Behavioral Health Partnership (MBHP).
- HEDIS data for select measures were collected separately for PCC Plan members with Essential coverage. MassHealth Essential covers individuals ages 19-64 who are long-term unemployed and ineligible for MassHealth Basic (certain individuals with non-citizen status are also eligible). The PCC Plan is the only MassHealth plan serving members with Essential coverage. Approximately 18% of the PCC Plan's membership has MassHealth Essential

coverage.

Neighborhood Health Plan (NHP)

- Non-profit managed care organization that primarily serves Medicaid members, along with commercial and Commonwealth Care populations.
- 117,104 MassHealth members as of December 31, 2007.
- Service areas throughout the state (Western, Central, Northern and Southern Massachusetts as well as Greater Boston).
- Provider network includes mostly community health centers in addition to Harvard Vanguard Medical Associates, group practices, and hospital-based clinics.
- Behavioral health services are managed through a carve-out contract with Beacon Health Strategies.

Network Health (NH)

- Provider-sponsored health plan owned and operated by Cambridge Health Alliance that serves the Medicaid and Commonwealth Care populations.
- 89,018 MassHealth members as of December 31, 2007.
- Primary service areas in Western, Northern and Central Massachusetts, and Greater Boston.
- Provider network includes community health centers, group practices, hospital outpatient departments, and individual practitioners.
- Behavioral health services are provided by Network Health providers.

Fallon Community Health Plan (FCHP)

- Non-profit managed care organization that serves commercial, Medicare, Medicaid and Commonwealth Care populations.
- 10,824 MassHealth members as of December 31, 2007.
- Service area is in Central Massachusetts.

- Behavioral health services are managed through a carve-out contract with Beacon Health Services.
- Provider network for MassHealth members is exclusively through Fallon Clinic sites.

Boston Medical Center HealthNet Plan (BMCHP)

- Provider-sponsored health plan, owned and operated by Boston Medical Center, the largest public safety-net hospital in Boston, that serves the Medicaid and Commonwealth Care populations.
- 161,096 MassHealth members as of December 31, 2007.
- Primary service areas in Western and Southern Massachusetts and Greater Boston.
- Provider network includes community health centers, hospital outpatient departments, and group and individual practices.
- Behavioral health services are provided by Boston Medical Center HealthNet Plan providers.

Differences in Populations Served by MassHealth Plans

HEDIS measures are not designed for case-mix adjustment. Rates presented here do not take into account the physical and mental health status (including disability status) of the members included in the measures.

The data on the next page describe each plan's population in terms of age, gender, and disability status. It is important for readers to consider the differences in the characteristics of each plan's population when reviewing and comparing the HEDIS 2008 performance of the five plans.

Health Plan Profiles: Demographic Characteristics of the Plan Populations

MassHealth Plan	Total MassHealth Managed Care Members as of 12/31/07	Female	Disabled	Mean Age	0-11 yrs	12-17 yrs	18-39 yrs	40-64 yrs	65+ yrs**
Primary Care Clinician Plan									
Without Essential population*	229,666	56.7%	30.9%	25.8	29.0%	15.9%	26.6%	28.5%	0.0%
Essential population only	49,936	32.9%	0.0%	38.8	0.0%	0.0%	51.9%	48.1%	0.0%
Neighborhood Health Plan	117,104	59.7%	4.3%	17.4	44.3%	18.3%	26.0%	11.4%	0.0%
Network Health	89,018	57.5%	7.7%	17.0	47.0%	16.1%	25.1%	11.8%	0.0%
Fallon Community Health Plan	10,824	58.8%	9.5%	20.1	37.7%	16.6%	30.5%	15.2%	0.0%
Boston Medical Center HealthNet Plan	161,096	58.5%	10.4%	17.4	45.8%	16.9%	25.3%	11.9%	0.0%
Total for MassHealth Managed Care Program	657,644	56.0%	15.3%	21.9	36.2%	15.4%	28.0%	20.4%	0.0%

Source: MMIS

* HEDIS results based on this PCC Plan population are compared to MCO results throughout the main body of the report.

** MassHealth managed care plans generally serve members under the age of 65. In previous years, a small number of MassHealth managed care members were 65 years of age or older as of December 31st of the measurement year, and had not yet had their coverage terminated. For HEDIS 2008, no such members were identified through enrollment data, which was used to generate these health plan profiles. However, as a rule, any MassHealth members 65 years and older would be included in the eligible populations for the HEDIS 2008 measures whenever the specifications for the measure included the 65 and older population, the members' coverage was not yet terminated, and the members met all eligible population criteria such as the continuous enrollment and enrollment anchor date requirements.

Statistically Significant Differences Among the Plans

Female Members: All four MCOs had a significantly higher proportion of female members than PCC Plan ($p < .0001$). NHP had a significantly higher proportion of female members than BMCHP and NH, while BMCHP had a higher proportion than NH (all $p < .0001$).

Disabled Members: PCC Plan had a significantly higher proportion of disabled members than any of the four MCOs ($p < .0001$). All differences among the MCOs are significant, with $p < .0001$, except for the difference between BMCHP and FCHP.

Mean Age of Members: All four MCOs had a population whose mean age was significantly lower than that of PCC Plan ($p < .0001$). FCHP's population had a mean age that was significantly higher than that of BMCHP, NHP, and NH ($p < .0001$).

Data Collection and Analysis Methods

Data Collection and Submission

In November 2007, the MassHealth Office of Acute and Ambulatory Care (OAAC) provided plans with a list of measures to be collected for HEDIS 2008. The list of measures was developed by key stakeholders within MassHealth, including stakeholders within OAAC, the Office of Clinical Affairs (OCA), and the MassHealth Behavioral Health Program (MHBH). In general, each plan was responsible for collecting the measures according to the HEDIS 2008 Technical Specifications and for reporting the results using NCQA's Interactive Data Submission System (IDSS). Each plan submitted its results to both NCQA and CHPR.

MassHealth does not require plans to undergo an NCQA HEDIS Compliance Audit™. NCQA HEDIS Compliance Audits are independent reviews conducted by organizations or individuals licensed or certified by NCQA. The purpose of the audit is to validate a plan's HEDIS results by verifying the integrity of the plan's data collection and calculation processes. All plans undergoing NCQA Accreditation must have their HEDIS data audited. FCHP and NHP have achieved NCQA accreditation for their MassHealth plans, while BMCHP and NH are working toward it. NCQA reports only audited data in the Quality Compass, a database of regional and national Medicaid, Medicare and Commercial performance benchmarks.

Eligible Population

For each HEDIS measure, NCQA specifies the eligible population by defining the age, continuous enrollment, enrollment gap, and diagnosis or

event criteria that a member must meet to be eligible for a measure.

Age: The age requirements for Medicaid HEDIS measures vary by measure. The MassHealth managed care programs serves members under the age of 65. Occasionally, members 65 and older may appear in the denominator of a MassHealth plan's HEDIS rate. This may occur for several valid reasons, including instances where a member turns 65 during the measurement year and did not yet have their coverage terminated as of the measure's anchor date. MassHealth plans are responsible for a member's care until his or her coverage is terminated. Therefore, MassHealth members 65 years and older were included in the eligible populations for the HEDIS 2008 measures whenever the specifications for the measure included the 65 and older population, the members' coverage had not yet been terminated and the members met all eligible criteria such as continuous enrollment and enrollment anchor date requirements.

Continuous enrollment: The continuous enrollment criteria varies for each measure and specifies the minimum amount of time that a member must be enrolled in a MassHealth plan before becoming eligible for that plan's HEDIS measure. Continuous enrollment ensures that a plan has had adequate time to deliver services to the member before being held accountable for providing those services.

Enrollment gap: The specifications for most measures allow members to have a gap in enrollment during the continuous enrollment period and still be eligible for the measure. The allowable gap is specified for each measure but is

generally defined for the Medicaid population as one gap of up to 45 days.

Diagnosis/event criteria: Some measures require a member to have a specific diagnosis or health care event to be included in the denominator. Diagnoses are defined by specific administrative codes (e.g., ICD-9, CPT). Other health care events may include prescriptions, hospitalizations, or outpatient visits.

The measure descriptions included in this report do not include every requirement for the eligible populations (e.g., enrollment gaps). For complete specifications for each measure included in this report, please see *HEDIS 2008 Volume 2: Technical Specifications*.

MassHealth Coverage Types Included in HEDIS 2008

MassHealth has several Medicaid coverage types whose members are eligible to enroll in any of the five MassHealth plans including Basic, Standard, CommonHealth, and Family Assistance. One coverage type, MassHealth Essential, may only enroll in the PCC Plan. MassHealth Essential covers individuals ages 19-64 who are long-term unemployed and ineligible for MassHealth Basic (certain individuals with non-citizen status are also eligible). Approximately 18 percent of the PCC Plan's membership has MassHealth Essential coverage.

During the planning for the MassHealth Managed Care HEDIS 2008 project, it was decided that the PCC Plan would submit two sets of HEDIS 2008 data — one submission for the PCC Plan population without members with Essential coverage

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Data Collection and Analysis Methods (*continued*)

and one submission for members with Essential coverage. The data for the PCC Plan population without members with Essential coverage is used in all tables and charts in the main body of the report. Separate rates for PCC Plan members with Essential coverage are included in the appendices for several adult measures (D, E, F, and G).

Administrative vs. Hybrid Data Collection

HEDIS measures are collected through one of two data collection methods—the administrative method or the hybrid method.

The **administrative method** requires plans to identify the denominator and numerator using claims or encounter data, or data from other administrative databases. Plans calculate the administrative measures using programs developed by plan staff or Certified HEDIS SoftwareSM purchased from a vendor. For measures collected through the administrative method, the denominator includes all members who satisfy all criteria specified in the measure including any age or continuous enrollment requirements (these members are known as the “eligible population”). The plan’s HEDIS rate is based on all members in the denominator who are found through administrative data to have received the service reported in the numerator (e.g., visit, treatment, etc.).

The **hybrid method** requires plans to identify the numerator through both administrative and medical record data. Plans may collect medical record data using plan staff and a plan-developed data collection tool. Plans may also contract with a vendor for the tool, staffing, or

both. For measures collected using the hybrid method, the denominator consists of a systematic sample of members drawn from the measure’s eligible population. This systematic sample generally consists of a minimum required sample size of 411 members plus an over sample determined by the plan to account for valid exclusions and contraindications. The measure’s rate is based on members in the sample (411) who are found through either administrative or medical record data to have received the service reported in the numerator. Plans may report data with denominators smaller than 411 for two reasons: 1) the plan had a small eligible population or 2) the plan reduced its sample size based on its current year’s administrative rate or the previous year’s audited rate, according to NCQA’s specifications.

Data Analysis

Throughout this report, HEDIS 2008 results from each plan are compared to several benchmarks and comparison rates, including the 2008 national Medicaid mean and the 2008 Massachusetts Commercial mean. In addition, MassHealth medians and weighted means were calculated from 2008 data.

2008 National Medicaid 75th Percentile

For this report, the 2008 national Medicaid 75th percentile serves as the primary benchmark to which plan performance is compared (including statistical significance).

CHPR obtained the 2008 national Medicaid data through NCQA’s Quality Compass. NCQA releases Quality Compass in July of each year with the rates for Commercial and Medicare plans.

NCQA provides the national Medicaid data in a supplement that is released in the fall.

Other Comparison Rates Included in this Report

The other comparison rates included in the data tables of this report are the 2008 national Medicaid mean, 2008 national Medicaid 90th percentile, 2008 Massachusetts Commercial mean, 2008 MassHealth weighted mean, and 2008 MassHealth median.

The 2008 national Medicaid mean is the average performance of all Medicaid plans that submitted HEDIS 2008 data. The 2008 national Medicaid 90th percentile represents a level of performance that was exceeded by only the top 10% of all Medicaid plans that submitted HEDIS 2008 data. The 2008 national Medicaid 90th percentile was included as a future goal for MassHealth plans. The 2008 Massachusetts Commercial mean is the average performance of all Massachusetts Commercial plans that submitted HEDIS 2008 data. Although the populations served by Massachusetts Commercial plans differ from the population served by MassHealth, the Massachusetts Commercial mean may be an appropriate future goal for measures where MassHealth plans are nearing or exceeding the national Medicaid 90th percentile.

The 2008 MassHealth weighted mean is a weighted average of the rates of the five MassHealth plans. The weighted average was calculated by multiplying the performance rate for each plan by the number of members who met the eligibility criteria for the measure. The values were then summed across plans and divided by the total eligible population for all the plans. The largest MassHealth plan (PCC Plan) serves

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Data Collection and Analysis Methods (*continued*)

42.5% of all MassHealth members, and the smallest (FCHP) serves only 1.6%. Because of the differences in the size of the populations served by the plans, the MassHealth weighted mean was not used for tests of statistical significance.

The 2008 MassHealth median is also provided and is the middle value of the set of values represented by the individual plan rates.

Caveats for the Interpretation of Results

All data analyses have limitations and those presented here are no exception.

Medical Record Procurement

A plan's ability (or that of its contracted vendor) to locate and obtain medical records as well as the quality of medical record documentation can affect performance on hybrid measures. Per NCQA's specifications, members for whom no medical record documentation was found were considered non-compliant with the measure. This applied to records that could not be located and obtained as well as for medical records that contained incomplete documentation (e.g., indication of a test but no date or result).

Lack of Case-Mix Adjustment

The specifications for collecting HEDIS measures do not allow case-mix adjustment or risk-adjustment for existing co-morbidities, disability (physical or mental), or severity of disease. Therefore, it is difficult to determine whether differences among plan rates were due to differences in the quality of care or use of services, or differences in the health of the populations served by the plans.

Demographic Differences in Plan membership

In addition to disability status, the populations

served by each plan may have differed in other demographic characteristics such as age, gender, and geographic residence. As shown in the plan profile chart on page 12, the PCC Plan has a higher proportion of members who are male or disabled, as well as an older mean member age. Other differences among the plans are noted on page 12. The impact of these differences on MassHealth HEDIS 2008 rates is unknown.

Overlapping Provider Networks

Many providers caring for MassHealth members have contracts with multiple plans. Overlapping provider networks may affect the ability of any one plan to influence provider behavior.

Variation in Data Collection Procedures

Each plan collects and reports its own HEDIS data. Although there are standard specifications for collecting HEDIS measures, MassHealth does not audit the plans' data collection methods. Factors that may influence the collection of HEDIS data by plan include:

- Use of software to calculate the administrative measures,
- Use of a tool and/or abstractors from an external medical record review vendor,
- Completeness of administrative data due to claims lags,
- Amount of time in the field collecting medical record data,
- The overall sample size for medical record review (plans with small eligible populations could have samples smaller than 411 members),
- Staffing changes among the plan's HEDIS team,
- Voluntary review by an NCQA-Certified HEDIS auditor,

- Choice of administrative or hybrid data collection method for measures that allow either method.

Limitation of Certain HEDIS Measures

One measure collected in 2008, Mental Health Utilization, provides information on the services MassHealth members utilized and not on the content or quality of the care the members received. MassHealth HEDIS mental health utilization data are not case-mix or risk adjusted. Differences in plan utilization rates cannot be interpreted as a measure of quality (i.e., it cannot be determined whether a plan with a higher discharge rate or longer average length of stay is providing either good or bad quality of care). Therefore, readers are cautioned against using utilization data to make judgments about the quality of the care delivered by a plan or its providers.

In addition, MassHealth HEDIS mental health utilization data differ from utilization data calculated through other methods used by MassHealth. Readers are cautioned against making direct comparisons between HEDIS mental health utilization data and mental health utilization data obtained from other sources.

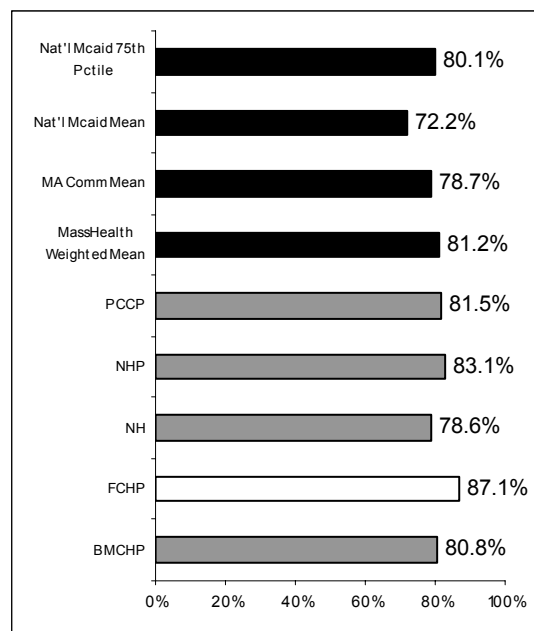
Staying Healthy

Childhood Immunization Status

The HEDIS Childhood Immunization Status measure assesses how well health plans ensure that their child members less than two years of age are immunized, following the Recommended Childhood and Adolescent Immunization Schedule issued by the Centers for Disease Control and Prevention (CDC) Advisory Committee on Immunization Practices (ACIP).¹ The schedule recommends the number of doses, minimum ages to administer doses, and the minimum amount of time between doses for nine vaccines that should be administered before the age of two. Seven of those vaccines were assessed through the HEDIS 2008 measure. (The measure does not include the influenza vaccine, a seasonal vaccine recommended for children ages 6-23 months, or the Hepatitis A vaccine, a two dose vaccine that was universally recommended in 2006 for children before the age of two.) Since the child must have at least five health care visits to receive the entire immunization series recommended by the guidelines, this measure can also serve as an indicator of overall access to the health care system.²

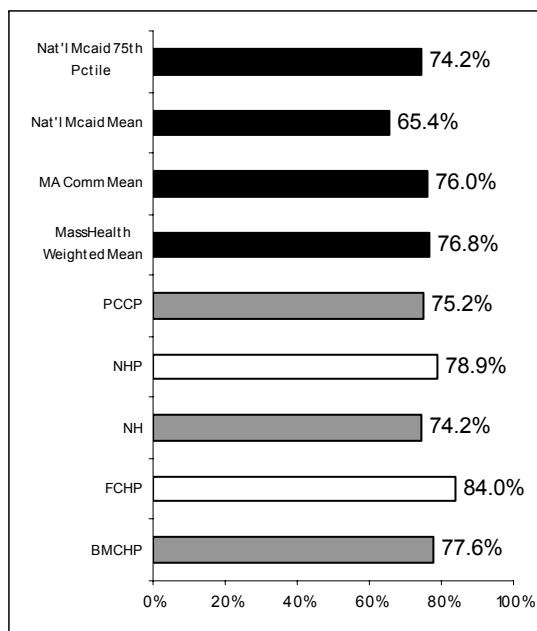
Combination 2

The percentage of children 2 years of age who had four DTaP/DTP (diphtheria-tetanus-pertussis), three IPV (injectable polio), one MMR (measles-mumps-rubella), three HiB (H influenza type B), three hepatitis B, and one VZV (chicken pox) by their second birthday.



Combination 3

The percentage of children 2 years of age who received all of the vaccinations for the Combination 2 rate, plus four pneumococcal conjugate vaccinations (PCV) by their second birthday.



Understanding the Results

NCQA has made several changes to this measure that should be considered when comparing HEDIS 2008 performance to prior rates. These changes include withdrawing the "documented history of illness" and "seropositive test result" as numerator evidence for DTaP, IPV, HiB and pneumococcal conjugate and requiring four acellular pertussis vaccines for the DTaP antigen. A number of procedural and diagnostic codes to identify childhood immunizations were removed, and one diagnostic code that identified exclusions was edited (a fifth digit was added).

Eighty-one percent (81.2%) of MassHealth members received Combination 2 immunizations by their second birthday. Plan specific rates ranged from 78.6% to 87.1%. One MassHealth plan (FCHP) had a rate that was significantly better than the benchmark rate of 80.1%, which represents the national Medicaid 75th percentile. One plan (PCC Plan) had a 2008 rate that was significantly better than its 2006 rate.

MassHealth plan rates for the Combination 3 immunizations ranged from 74.2% to 84.0%. Seventy-seven percent (76.8%) of MassHealth members received Combination 3 immunizations by their second birthday. Two plans (NHP and FCHP) had rates that were significantly better than the benchmark rate (74.2%). All five plans had 2008 rates that were significantly better than their 2006 rates. (2006 was the first year that HEDIS measured Combination 3.)

KEY:

- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is significantly above the 2008 national Medicaid 75th percentile
- Rate is not significantly different from the 2008 national Medicaid 75th percentile
- Rate is significantly below the 2008 national Medicaid 75th percentile

Childhood Immunization Status

Combo 2

Comparison to Benchmarks:				
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate
PCCP(H)	○	★	○	★
NHP(H)	○	★	★	○
NH(H)	○	★	○	○
FCHP(H)	★	★	★	○
BMCHP(H)	○	★	○	○

2008 Comparison Rates																
Nat'l Mcaid 90th Pctile:			84.7%		Nat'l Mcaid Mean:			72.2%		MassHealth Weighted Mean:			81.2%			
Nat'l Mcaid 75th Pctile:			80.1%		MA Commercial Mean:			78.7%		MassHealth Median:			81.5%			
MassHealth Plan Rates																
2008		Num	Elig	Den	Rate	LCL	UCL		2006		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	335	4,091	411	81.5%	77.6%	85.4%		PCCP	(H)	287	4,026	411	69.8%	65.3%	74.4%
NHP	(H)	299	3,500	360	83.1%	79.0%	87.1%		NHP	(H)	358	2,749	411	87.1%	83.7%	90.5%
NH	(H)	323	2,847	411	78.6%	74.5%	82.7%		NH	(H)	320	2,200	411	77.9%	73.7%	82.0%
FCHP	(H)	223	256	256	87.1%	82.8%	91.4%		FCHP	(H)	166	191	191	86.9%	81.9%	92.0%
BMCHP	(H)	332	5,289	411	80.8%	76.8%	84.7%		BMCHP	(H)	346	4,650	411	84.2%	80.5%	87.8%

Combo 3

Comparison to Benchmarks:				
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate
PCCP(H)	○	★	○	★
NHP(H)	★	★	○	★
NH(H)	○	★	○	★
FCHP(H)	★	★	★	★
BMCHP(H)	○	★	○	★

2008 Comparison Rates															
Nat'l Mcaid 90th Pctile:			78.1%		Nat'l Mcaid Mean:			65.4%		MassHealth Weighted Mean:			76.8%		
Nat'l Mcaid 75th Pctile:			74.2%		MA Commercial Mean:			76.0%		MassHealth Median:			77.6%		
MassHealth Plan Rates															
2008		Num	Elig	Den	Rate	LCL	UCL	2006		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	309	4,091	411	75.2%	70.9%	79.5%	PCCP	(H)	211	4,026	411	51.3%	46.4%	56.3%
NHP	(H)	284	3,500	360	78.9%	74.5%	83.2%	NHP	(H)	280	2,749	411	68.1%	63.5%	72.8%
NH	(H)	305	2,847	411	74.2%	69.9%	78.6%	NH	(H)	253	2,200	411	61.6%	56.7%	66.4%
FCHP	(H)	215	256	256	84.0%	79.3%	88.7%	FCHP	(H)	138	191	191	72.3%	65.6%	78.9%
BMCHP	(H)	319	5,289	411	77.6%	73.5%	81.8%	BMCHP	(H)	273	4,650	411	66.4%	61.7%	71.1%

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator

Elig indicates the Eligible Population
Den indicates Denominator
LCL indicates Lower Confidence Level
UCL indicates Upper Confidence Level

(A) = Measure was collected using administrative method

(H) = Measure was collected using hybrid method

Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

The source of the National Medicaid 90th Percentile, National Medicaid 75th Percentile, National Medicaid Mean, and MA Commercial Mean is Quality Compass, 2008.

Childhood Immunization Status

Understanding the Results (continued)

Although the HEDIS childhood immunization measure is an important indicator of the quality of preventive care delivered by a health plan, the measure does have some weaknesses. For example, HEDIS does not assess the timeliness of immunization with regard to the recommended age intervals for vaccination. In fact, some research suggests that many children who are compliant with the HEDIS Childhood Immunization Status measure do not receive immunizations on-time.³ Another major criticism is that, in order to be included in the eligible population of the measure, members must be continuously enrolled in a plan for twelve months. Members who are excluded because they do not meet the continuous enrollment criteria were not captured by this measure and may have been at risk for low immunization rates and missed immunizations.⁴ Therefore, this measure may not be a good indicator of the quality of care delivered to MassHealth members who are at the greatest risk of poor immunization coverage.

HEDIS childhood immunization rates are usually lower than state and national childhood immunization rates reported through other data sources such as the National Immunization Survey (NIS) and National Health Information Survey (NHIS).⁵ The difference in rates is believed to be due in part to different continuous enrollment criteria and different requirements for the number and timing of doses. (For example, when HEDIS criteria are applied to NIS data, immunization coverage rates fall by approximately 20%).⁶

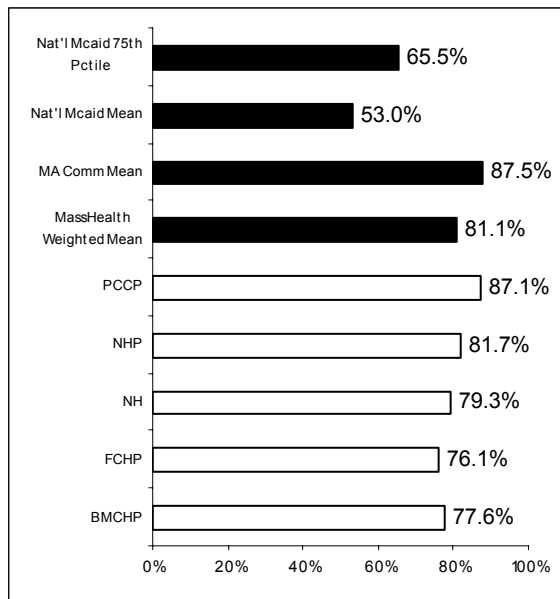
Although Massachusetts has some of the highest immunization coverage rates in the United States,⁷ opportunity for improvement still exists. The immunizations required by the Combination 2 rate are consistent with those defined by Healthy People 2010. The Healthy People 2010 childhood immunization goal of 90% may represent a target for continued improvement on this measure. It is important to note, however, that increased attention to areas measured by HEDIS at the expense of other non-measured preventive services, such as those addressed in other Healthy People 2010 goals, could have the unintended effect of reducing the overall quality of preventive care (i.e., if non-measured services are neglected).⁸ Nonetheless, since childhood and adolescent immunization are two of the most cost-effective practices of all areas assessed through HEDIS,⁹ increased attention to improving immunization rates could yield benefits to both plans and the members they serve.

Well-Child Visits for Infants and Young Children

The HEDIS Well-Child Visits measure assesses whether infants and young children receive the number of well-child visits recommended by current clinical guidelines. The American Academy of Pediatrics (AAP) recommends a schedule of at least eight well-child visits between birth and the first 15 months of life.¹⁰ The AAP also recommends a schedule of annual well-child visits during the 3rd, 4th, 5th and 6th years of life. These well-child visits offer the opportunity for evaluation of growth and development, the administration of vaccinations, the assessment of behavioral issues, and delivery of anticipatory guidance on such issues as injury prevention, violence prevention, sleep position and nutrition. The HEDIS well-child visit measures assess only the frequency of well-child visits. They provide no information on the content or quality of care received during those visits. However, compliance with the preventative care guidelines, including the recommended number of visits, can improve health outcomes; for example, Medicaid-enrolled children under the age of 2 who receive well-child visits according to the frequency prescribed by the AAP have fewer avoidable hospitalizations.¹¹

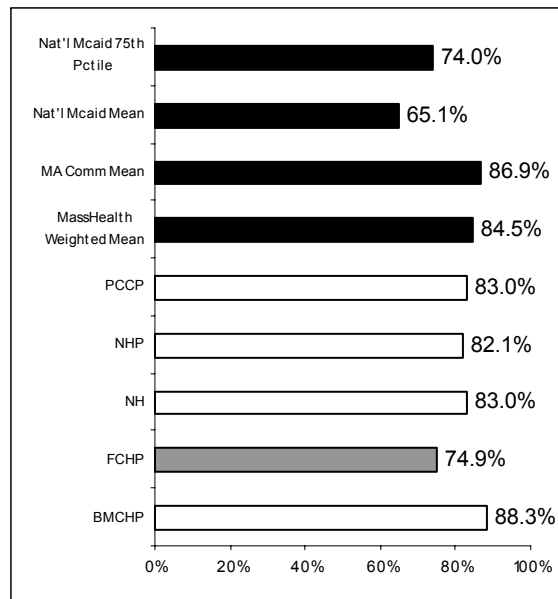
Well-Child Visits in the First 15 Months of Life (6+ visits)

The percentage of members who turned 15 months old during 2007 and who had six or more well-child visits with a primary care practitioner during the first 15 months of life.



Well-Child Visits in the 3rd, 4th, 5th, and 6th Years of Life

The percentage of members who were three, four, five or six years old during 2007 who received one or more well-child visits with a primary care practitioner during 2007.



Understanding the Results

The HEDIS rate for MassHealth members who turned 15 months during the measurement year and had six or more well-child visits was 81.1%. Plan-specific rates ranged from 76.1% to 87.1%. All five MassHealth plans had rates that were significantly better than the benchmark rate (65.5%). One plan (NH) had a 2008 rate that was significantly better than its 2006 rate.

Eighty-five percent (84.5%) of MassHealth members who were three, four, five, or six years of age had a well-child visit during 2007. Plan-specific rates ranged from 74.9% to 88.3%. Four plans (PCC Plan, NHP, NH, and BMCHP) had rates that were significantly better than the benchmark rate. All five plans had 2008 rates that were not significantly different than their 2006 rates.

While the MassHealth plans generally exceed national Medicaid benchmarks on both well-visit measures, none exceed the Massachusetts commercial plan mean for either measure. In addition, only NH scored significantly higher than its own previous score (for the first 15 months of life measure). Plans should seek to improve upon their scores where possible.

KEY:

- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is *significantly above* the 2008 national Medicaid 75th percentile
- Rate is *not significantly different* from the 2008 national Medicaid 75th percentile
- Rate is *significantly below* the 2008 national Medicaid 75th percentile

* Data for the zero through five visit rates are in Appendix C.

Well-Child Visits for Infants and Young Children

Statistical Summary—Well-Child Visits in the First 15 Months of Life (6+ visits)

Comparison to Benchmarks:				
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate
PCCP(H)	★	★	○	○
NHP(H)	★	★	●	○
NH(H)	★	★	●	★
FCHP(H)	★	★	●	○
BMCHP(H)	★	★	●	○

2008 Comparison Rates

Nat'l Mcaid 90th Pctile:	73.7%	Nat'l Mcaid Mean:	53.0%	MassHealth Weighted Mean:	81.1%
Nat'l Mcaid 75th Pctile:	65.5%	MA Commercial Mean:	87.5%	MassHealth Median:	79.3%

MassHealth Plan Rates

2008	Num	Elig	Den	Rate	LCL	UCL	2006	Num	Elig	Den	Rate	LCL	UCL
PCCP	(H) 209	3,251	240	87.1%	82.6%	91.5%	PCCP	(H) 236	2,838	260	90.8%	87.1%	94.5%
NHP	(H) 228	3,003	279	81.7%	77.0%	86.4%	NHP	(H) 235	2,285	296	79.4%	74.6%	84.2%
NH	(H) 326	2,587	411	79.3%	75.3%	83.4%	NH	(H) 284	1,512	411	69.1%	64.5%	73.7%
FCHP	(H) 159	212	209	76.1%	70.1%	82.1%	FCHP	(H) 130	184	184	70.7%	63.8%	77.5%
BMCHP	(H) 319	4,497	411	77.6%	73.5%	81.8%	BMCHP	(H) 343	3,630	411	83.5%	79.7%	87.2%

Statistical Summary—Well-Child Visits in the 3rd, 4th, 5th, and 6th Years of Life

Comparison to Benchmarks:				
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate
PCCP(A)	★	★	●	○
NHP(H)	★	★	○	○
NH(H)	★	★	○	○
FCHP(H)	○	★	●	○
BMCHP(H)	★	★	○	○

2008 Comparison Rates

Nat'l Mcaid 90th Pctile:	78.9%	Nat'l Mcaid Mean:	65.1%	MassHealth Weighted Mean:	84.5%
Nat'l Mcaid 75th Pctile:	74.0%	MA Commercial Mean:	86.9%	MassHealth Median:	83.0%

MassHealth Plan Rates

2008	Num	Elig	Den	Rate	LCL	UCL	2006	Num	Elig	Den	Rate	LCL	UCL
PCCP	(A) 12,685	15,279	15,279	83.0%	82.4%	83.6%	PCCP	(H) 200	15,209	229	87.3%	82.8%	91.9%
NHP	(H) 197	11,745	240	82.1%	77.0%	87.1%	NHP	(H) 217	10,536	260	83.5%	78.8%	88.2%
NH	(H) 239	9,305	288	83.0%	78.5%	87.5%	NH	(H) 282	7,188	348	81.0%	76.8%	85.3%
FCHP	(H) 209	837	279	74.9%	69.6%	80.2%	FCHP	(A) 605	764	764	79.2%	76.2%	82.1%
BMCHP	(H) 363	18,830	411	88.3%	85.1%	91.5%	BMCHP	(H) 334	15,272	411	81.3%	77.4%	85.2%

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator

Elig indicates the Eligible Population

Den indicates Denominator

LCL indicates Lower Confidence Level

UCL indicates Upper Confidence Level

(A) = Measure was collected using administrative method

(H) = Measure was collected using hybrid method

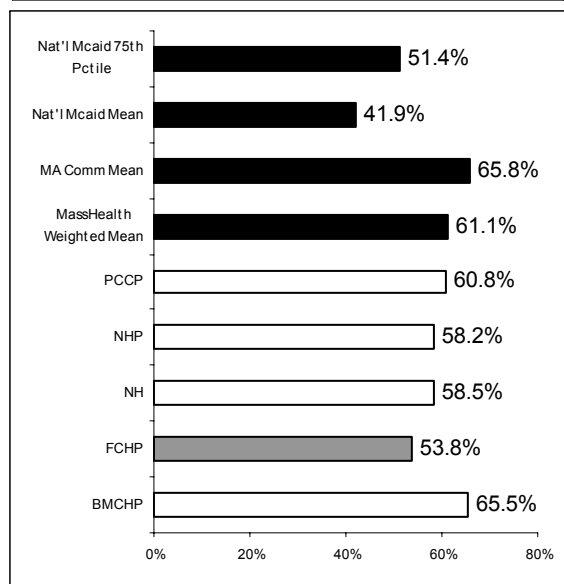
Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

Adolescent Well-Care Visits

The Adolescent Well-Care Visits measure assesses whether adolescents had at least one well-care visit with a primary care provider or OB/GYN during 2007, as recommended by clinical guidelines set forth by the American Medical Association (AMA), American Academy of Pediatrics (AAP), and Bright Futures.¹² Annual visits during adolescence allow providers to conduct physical examinations for growth, assess behavior, and deliver anticipatory guidance on issues related to violence, injury prevention and nutrition, as well as to screen for sexual activity, smoking and depression. Adolescents are more likely than younger children to have no well-care visits at all, and this gap is more pronounced for adolescents in publicly-funded managed care.¹³

Adolescent Well-Care Visits

The percentage of members who were 12-21 years of age during 2007 and who had at least one comprehensive well-care visit with a primary care practitioner or OB/GYN during 2007.



KEY:

- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is *significantly above* the 2008 national Medicaid 75th percentile
- Rate is *not significantly different* from the 2008 national Medicaid 75th percentile
- Rate is *significantly below* the 2008 national Medicaid 75th percentile

Understanding the Results

Sixty-one percent (61.1%) of MassHealth adolescent members who were 12 to 21 years of age had at least one well-care visit with a primary care practitioner or OB/GYN during 2007. Plan specific rates ranged from 53.8% to 65.5%. Four plans (PCC Plan, NHP, NH and BMCHP) had rates that were significantly better than the benchmark rate (51.4%), and two plans (PCCP and BMCHP) scored significantly higher than the National Medicaid 90th percentile. However, none of the plans had 2008 rates that were significantly better than their 2006 rates.

One caveat related to both this measure and the well-child measure is that the measures are calculated using administrative and/or medical record data, rather than through the use of surveys. Well-care rates generated from parent surveys and adolescent reported surveys yield higher rates of visits compared to the HEDIS well-care measures.¹⁴ In fact, the national rate of children meeting the AAP guidelines for the number of well-care visits is as high as 77% when calculated from parent surveys.¹⁵ However, whether administrative and medical record data actually under-report well-care visit rates or survey data over-report the occurrence of well-child visits is unknown. In addition, the miscoding of well-child visits for infants and young children and well-care visits for adolescents affects the result of this measure. Research comparing Medicaid administrative data with well-child medical records has documented substantial misclassification of well-child visits as sick visits.¹⁶

Adolescent Well-Care Visits

Comparison to Benchmarks:				
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate
PCCP(A)	★	★	●	○
NHP(H)	★	★	●	○
NH(H)	★	★	●	○
FCHP(A)	○	★	●	○
BMCHP(H)	★	★	○	○

2008 Comparison Rates					
Nat'l Mcaid 90th Pctile:	56.7%	Nat'l Mcaid Mean:	41.9%	MassHealth Weighted Mean:	61.1%
Nat'l Mcaid 75th Pctile:	51.4%	MA Commercial Mean:	65.8%	MassHealth Median:	58.5%

MassHealth Plan Rates													
2008	Num	Elig	Den	Rate	LCL	UCL	2006	Num	Elig	Den	Rate	LCL	UCL
PCCP	(A) 24,394	40,093	40,093	60.8%	60.4%	61.3%	PCCP	(H) 237	35,842	388	61.1%	56.1%	66.1%
NHP	(H) 219	20,066	376	58.2%	53.1%	63.4%	NHP	(H) 265	17,118	405	65.4%	60.7%	70.2%
NH	(H) 237	13,281	405	58.5%	53.6%	63.4%	NH	(H) 247	9,624	411	60.1%	55.2%	65.0%
FCHP	(A) 219	1,549	407	53.8%	48.8%	58.8%	FCHP	(A) 697	1,311	1,311	53.2%	50.4%	55.9%
BMCHP	(H) 269	27,174	411	65.5%	60.7%	70.2%	BMCHP	(H) 284	21,147	411	69.1%	64.5%	73.7%

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator
Elig indicates the Eligible Population
Den indicates Denominator
LCL indicates Lower Confidence Level
UCL indicates Upper Confidence Level

(A) = Measure was collected using administrative method
 (H) = Measure was collected using hybrid method
Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

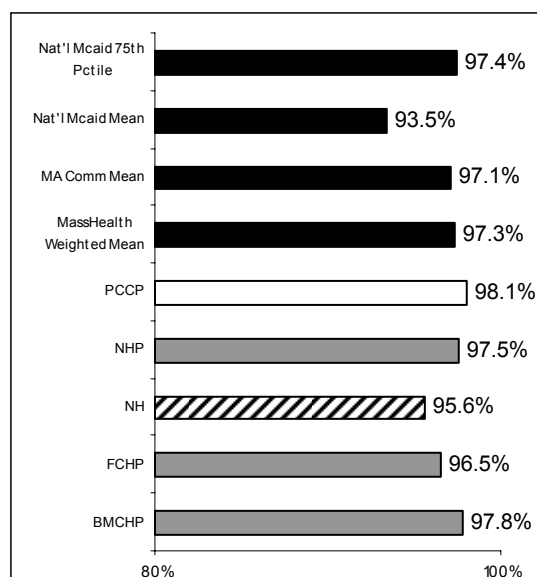
The source of the National Medicaid 90th Percentile, National Medicaid 75th Percentile, National Medicaid Mean, and MA Commercial Mean is Quality Compass, 2008.

Children and Adolescents' Access to Primary Care Physicians

The age-stratified rates for the Children and Adolescents' Access to Primary Care Practitioners measure reflect general access to care by indicating whether children had a preventative or ambulatory care visit with a primary care provider during 2007 (for children ages 12 to 24 months and 25 months to 6 years) or during 2006 and 2007 (for children ages 7 to 11 years and 12 to 19 years). Any type of visit with a primary care practitioner counts towards this measure. This measure does not assess whether children have the appropriate number of visits recommended by clinical guidelines (e.g., children ages 12 to 24 months should have 3-4 well-child visits during the measure's timeframe), and does not assess the quality or content of the well-care visits counted by the measure.

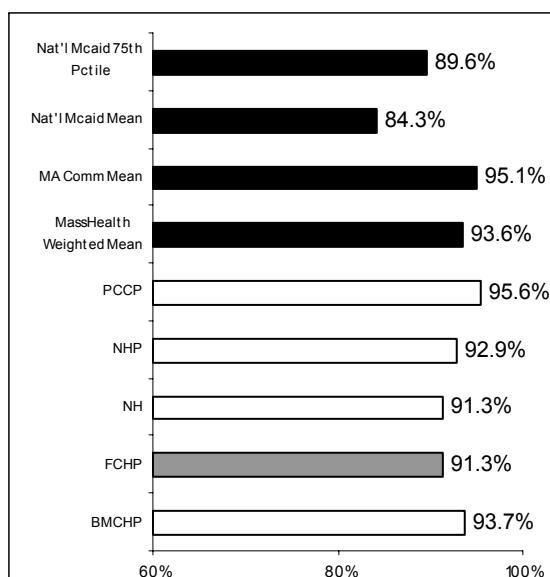
Age 12 to 24 Months

The percentage of members 12 to 24 months of age who had a visit with a primary care practitioner during 2007.



Age 25 Months to 6 Years

The percentage of members 25 months to 6 years of age who had a visit with a primary care practitioner during 2007.



Understanding the Results

Ninety-seven percent (97.3%) of MassHealth members aged 12 to 24 months had a preventative or ambulatory care visit with a primary care provider in 2007. Plan-specific rates ranged from 95.6% to 98.1%. One MassHealth plan (PCC Plan) had a rate that was significantly better than the benchmark rate, while one plan's rate (NH) was significantly lower. Two plans (NH and BMCHP) had 2008 rates that were significantly better than their 2006 rate, while one (PCC Plan) was significantly lower.

Ninety-four percent (93.6%) of MassHealth members aged 25 months to 6 years had a preventative or ambulatory care visit with a primary care provider in 2007. Plan specific rates ranged from 91.3% to 95.6%. Four MassHealth plans (PCC Plan, NHP, NH and BMCHP) had 2008 rates that were significantly better than the benchmark rate. Two plans (NH and BMCHP) had 2008 rates that were significantly better than their 2006 rate. The PCC Plan's rate was significantly lower than in its rate for 2006.

In the most recent measurement cycles, some MassHealth plan rates for this access to care measure were nearing 100%, indicating little additional room for improvement. (A goal of 100% utilization is appropriate for this measure since children in this age group should be receiving annual well-care visits.) Opportunity for improvement may exist for any plan that performed below the benchmark or that had a 2008 rate that was significantly lower than its 2006 rate (possibly indicating reduced access).

KEY:

- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is significantly above the 2008 national Medicaid 75th percentile
- Rate is not significantly different from the 2008 national Medicaid 75th percentile
- Rate is significantly below the 2008 national Medicaid 75th percentile

Children and Adolescents' Access to Primary Care Physicians

Statistical Summary— Age 12 to 24 Months

Comparison to Benchmarks:					2008 Comparison Rates												
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate	Nat'l Mcaid 90th Pctile: 98.4% Nat'l Mcaid Mean: 93.5% MassHealth Weighted Mean: 97.3%												
					Nat'l Mcaid 75th Pctile: 97.4% MA Commercial Mean: 97.1% MassHealth Median: 97.5%												
					MassHealth Plan Rates												
PCCP(A)	★	★	★	●	2008	Num	Den	Rate	LCL	UCL		2006	Num	Den	Rate	LCL	UCL
NHP(A)	○	★	○	○	PCCP	(A) 4,549	4,638	98.1%	97.7%	98.5%		PCCP	(A) 3,967	3,981	99.6%	99.5%	99.8%
NH(A)	●	★	●	★	NHP	(A) 4,071	4,174	97.5%	97.0%	98.0%		NHP	(A) 3,322	3,400	97.7%	97.2%	98.2%
FCHP(A)	○	★	○	○	NH	(A) 3,732	3,903	95.6%	95.0%	96.3%		NH	(A) 2,518	2,802	89.9%	88.7%	91.0%
BMCHP(A)	○	★	★	★	FCHP	(A) 249	258	96.5%	94.1%	98.9%		FCHP	(A) 239	244	98.0%	96.0%	99.9%
					BMCHP	(A) 6,022	6,157	97.8%	97.4%	98.2%		BMCHP	(A) 5,013	5,223	96.0%	95.4%	96.5%

Statistical Summary— Age 25 Months to 6 Years

Comparison to Benchmarks:					2008 Comparison Rates												
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate	Nat'l Mcaid 90th Pctile: 92.0%					Nat'l Mcaid Mean: 84.3%		MassHealth Weighted Mean: 93.6%					
					Nat'l Mcaid 75th Pctile: 89.6%					MA Commercial Mean: 95.1%		MassHealth Median: 92.9%					
	MassHealth Plan Rates																
	2008	Num	Den	Rate	LCL	UCL		2006	Num	Den	Rate	LCL	UCL				
	PCCP(A)	★	★	★	●	PCCP	(A) 18,188	19,032	95.6%	95.3%	95.9%		PCCP	(A) 17,746	17,972	98.7%	98.6%
NHP(A)	★	★	●	○	NHP	(A) 13,779	14,838	92.9%	92.4%	93.3%		NHP	(A) 12,263	13,163	93.2%	92.7%	93.6%
NH(A)	★	★	●	★	NH	(A) 10,857	11,894	91.3%	90.8%	91.8%		NH	(A) 8,238	9,389	87.7%	87.1%	88.4%
FCHP(A)	○	★	●	○	FCHP	(A) 965	1057	91.3%	89.5%	93.0%		FCHP	(A) 882	939	93.9%	92.3%	95.5%
BMCHP(A)	★	★	●	★	BMCHP	(A) 22,113	23,600	93.7%	93.4%	94.0%		BMCHP	(A) 17,869	19,607	91.1%	90.7%	91.5%

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator

Elig indicates the Eligible Population

Den indicates Denominator

LCL indicates Lower Confidence Level

UCL indicates Upper Confidence Level

(A) = Measure was collected using administrative method

(H) = Measure was collected using hybrid method

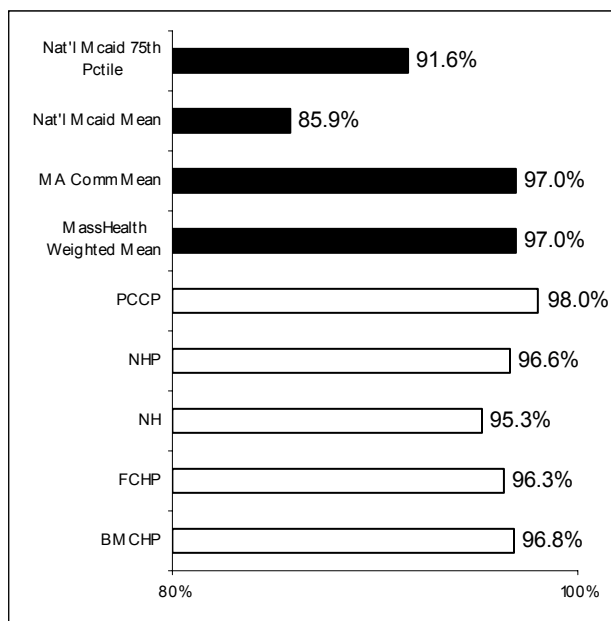
Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

The source of the National Medicaid 90th Percentile, National Medicaid 75th Percentile, National Medicaid Mean, and MA Commercial Mean is Quality Compass, 2008.

Children and Adolescents' Access to Primary Care Physicians

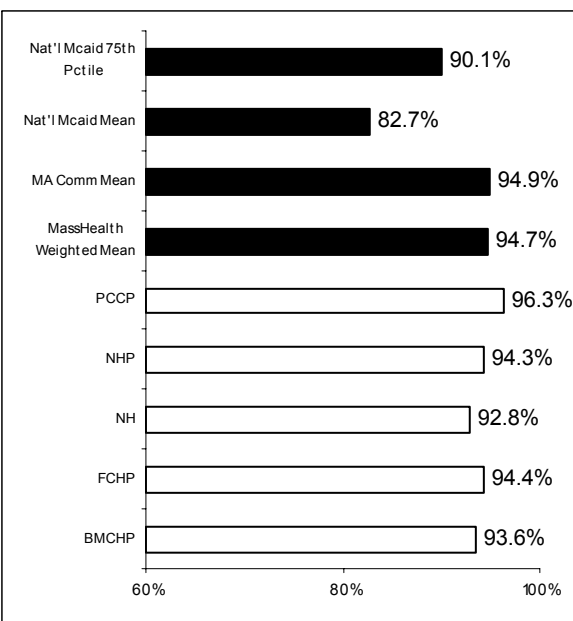
Age 7 to 11 Years

The percentage of members 7 to 11 years of age who had at least one visit with a primary care practitioner in 2006 or 2007.



Age 12 to 19 Years

The percentage of members 12 to 19 years of age who had at least one visit with a primary care practitioner in 2006 or 2007.



Understanding the Results

Ninety-seven percent (97.0%) of MassHealth members aged 7 to 11 had a visit with a primary care practitioner during 2006 or 2007. Plan specific rates ranged from 95.3 to 98.0. All five MassHealth plans had 2008 rates that were significantly better than the benchmark rate (91.6%). Three plans (NHP, NH and BMCHP) had 2008 rates that were significantly better than their 2006 rates.

Access to primary care practitioners for MassHealth members aged 12 to 19 was also high (94.7%). MassHealth plans rates ranged from 92.8% to 96.3%. Again, all five MassHealth plans had 2008 rates that were significantly better than both the benchmark rate (90.1%), and the National Medicaid 90th percentile (91.9%). Two plans (NH and BMCHP) had 2008 rates that were significantly better than their 2006 rates.

Plans with rates that are nearing 100% should focus on continued maintenance of the high rates. A goal of 100% access is appropriate for this measure since children in this age group should have visits with their primary care providers on an annual basis.

KEY:

- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is *significantly above* the 2008 national Medicaid 75th percentile
- Rate is *not significantly different from* the 2008 national Medicaid 75th percentile
- Rate is *significantly below* the 2008 national Medicaid 75th percentile

Children and Adolescents' Access to Primary Care Physicians

Statistical Summary— Age 7 to 11 Years

Comparison to Benchmarks:					2008 Comparison Rates												
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate	Nat'l Mcaid 90th Pctile: 94.1% Nat'l Mcaid Mean: 85.9% MassHealth Weighted Mean: 97.0%												
					Nat'l Mcaid 75th Pctile: 91.6% MA Commercial Mean: 97.0% MassHealth Median: 96.6%												
					MassHealth Plan Rates												
PCCP(A)	★	★	★	○	2008	Num	Den	Rate	LCL	UCL		2006	Num	Den	Rate	LCL	UCL
NHP(A)	★	★	○	★	PCCP	(A) 14,944	15,250	98.0%	97.8%	98.2%		PCCP	(A) 14,834	15,161	97.8%	97.6%	98.1%
NH(A)	★	★	●	★	NHP	(A) 9,198	9,519	96.6%	96.3%	97.0%		NHP	(A) 7,552	7,897	95.6%	95.2%	96.1%
FCHP(A)	★	★	○	○	NH	(A) 5,823	6,113	95.3%	94.7%	95.8%		NH	(A) 3,857	4,161	92.7%	91.9%	93.5%
BMCHP(A)	★	★	○	★	FCHP	(A) 628	652	96.3%	94.8%	97.8%		FCHP	(A) 617	632	97.6%	96.4%	98.9%
					BMCHP	(A) 13,789	14,241	96.8%	96.5%	97.1%		BMCHP	(A) 10,085	10,796	93.4%	92.9%	93.9%

Statistical Summary— Age 12 to 19 Years

Comparison to Benchmarks:					2008 Comparison Rates												
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate	Nat'l Mcaid 90th Pctile: 91.9%						Nat'l Mcaid Mean: 82.7%		MassHealth Weighted Mean: 94.7%				
					Nat'l Mcaid 75th Pctile: 90.1%						MA Commercial Mean: 94.9%		MassHealth Median: 94.3%				
					MassHealth Plan Rates												
					2008	Num	Den	Rate	LCL	UCL		2006	Num	Den	Rate	LCL	UCL
					PCCP	(A) 25,616	26,610	96.3%	96.0%	96.5%		PCCP	(A) 24,520	25,546	96.0%	95.7%	96.2%
NHP(A)	★	★	●	○	NHP	(A) 12,927	13,715	94.3%	93.9%	94.6%		NHP	(A) 10,774	11,491	93.8%	93.3%	94.2%
NH(A)	★	★	●	★	NH	(A) 7,542	8,127	92.8%	92.2%	93.4%		NH	(A) 4,928	5,418	91.0%	90.2%	91.7%
FCHP(A)	★	★	○	○	FCHP	(A) 929	984	94.4%	92.9%	95.9%		FCHP	(A) 847	882	96.0%	94.7%	97.4%
BMCHP(A)	★	★	●	★	BMCHP	(A) 17,665	18,877	93.6%	93.2%	93.9%		BMCHP	(A) 12,625	13,937	90.6%	90.1%	91.1%

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator

Elig indicates the Eligible Population

Den indicates Denominator

LCL indicates Lower Confidence Level

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(A) = Measure was collected using administrative method

(H) = Measure was collected using hybrid method

Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

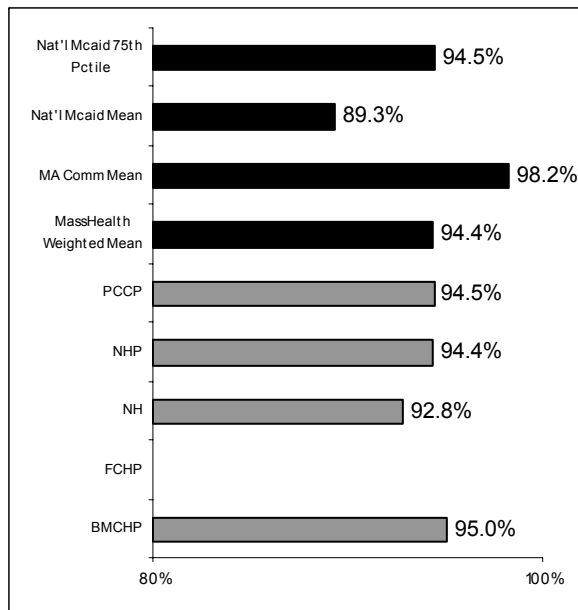
Living With Illness

Use of Appropriate Medications for People with Asthma

This measure assesses whether members with persistent asthma were appropriately prescribed medications deemed as preferred therapy for long-term asthma control. The National Heart, Lung, and Blood Institute's (NHLBI) *Guidelines for the Diagnosis and Management of Asthma*, updated in 2007, recommend daily long-term control therapy for patients experiencing persistent asthma symptoms.¹⁷ Medications that decrease airway inflammation, such as inhaled corticosteroids (ICS), are considered to be the most effective for controlling asthma.^{18,19} These medications reduce the severity of symptoms²⁰ and prevent exacerbations²¹ that can increase the risk of emergency department (ED) visits, hospitalizations, and death from asthma.²² Studies of Medicaid populations have reported underutilization of asthma control medications^{23,34,25} and lower prescription rates compared to privately insured patients.²⁶

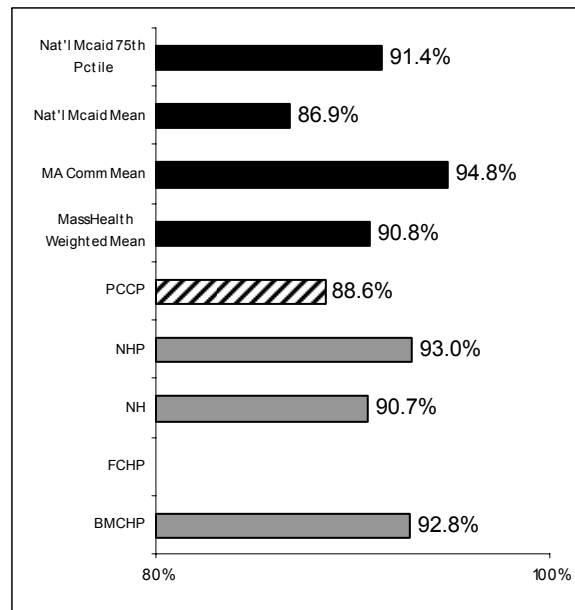
Age 5 to 9 Years

The percentage of members 5 to 9 years of age who were identified as having persistent asthma and who were appropriately prescribed medication during 2007.



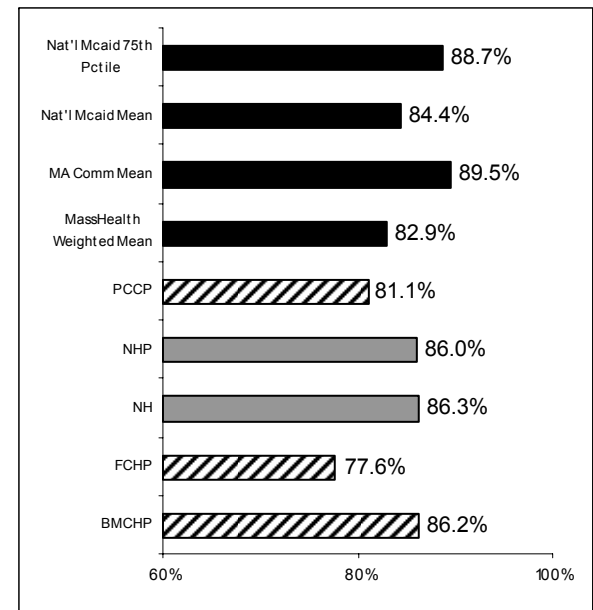
Age 10 to 17 Years

The percentage of members 10 to 17 years of age who were identified as having persistent asthma and who were appropriately prescribed medication during 2007.



Age 18 to 56 Years

The percentage of members 18 to 56 years of age who were identified as having persistent asthma and who were appropriately prescribed medication during 2007.



KEY:

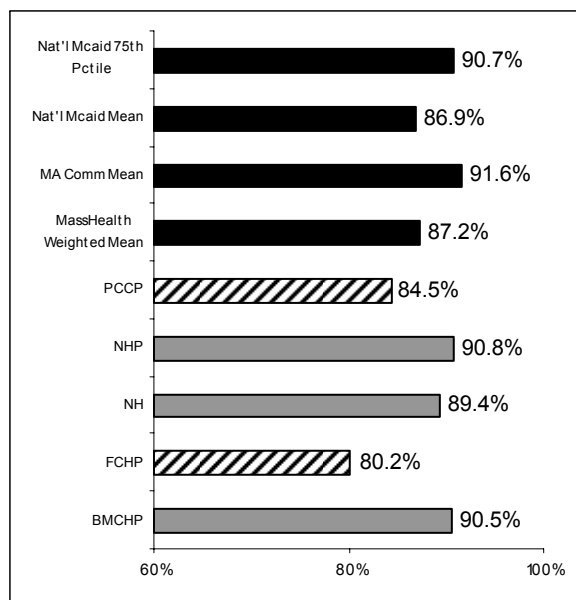
- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is *significantly above* the 2008 national Medicaid 75th percentile
- Rate is *not significantly different from* the 2008 national Medicaid 75th percentile
- Rate is *significantly below* the 2008 national Medicaid 75th percentile

Note: FCHP's denominators for the 5-9 and 10-17 year rates were less than 30. Per HEDIS specifications, any measure for which a plan has fewer than 30 members in the denominator is not reported as a rate. See page 34 for FCHP's numerator and denominator.

Use of Appropriate Medications for People with Asthma

Combined Ages (5 to 56 Years)

The percentage of members 5 to 56 years of age who were identified as having persistent asthma and who were appropriately prescribed medication during 2007.



KEY:

- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is *significantly above* the 2008 national Medicaid 75th percentile
- Rate is *not significantly different from* the 2008 national Medicaid 75th percentile
- Rate is *significantly below* the 2008 national Medicaid 75th percentile

Understanding the Results

Eighty-seven percent (87.2%) of members 5-56 years of age with persistent asthma were appropriately prescribed asthma control medication. Rates for three plans (NHP, NH and BMCHP) showed no significant difference compared to the benchmark rate (90.7%), while the rates for two (PCCP and FCHP) were significantly lower. One plan, NHP, significantly improved its rate, as compared to the previous reporting period.

MassHealth plan rates calculated for children (age 5-9 years) with persistent asthma did not differ significantly from the benchmark rate (94.5%). However, the rate reported by one plan (PCCP) for adolescents (age 10-17 years), and rates for adults (age 18-56 years) reported by three plans (PCCP, FCHP and BMCHP), were significantly lower than the benchmarks (91.4% and 88.7%, respectively).

Healthy People 2010 set a number of objectives related to asthma that are directly (e.g., increased rates of appropriate asthma care) and indirectly (e.g., reductions in deaths, hospitalizations, ED visits, activity restrictions, and missed school/work) associated with improved performance on the asthma HEDIS measure.²⁷ Appropriate asthma care emphasizes patient education and treatment with medication regimens that reduce excessive use of short-acting beta agonists for symptom relief. Use of the asthma medications assessed through the HEDIS measure (e.g., inhaled corticosteroids) can reduce the need for short-acting beta agonists and is associated with reduced risk of subsequent ED visits and hospitalizations among patients with persistent asthma.²⁸

Use of Appropriate Medications for People with Asthma

Statistical Summary—Age 5 to 9 Years

Comparison to Benchmarks:				
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate
PCCP(A)	○	★	●	○
NHP(A)	○	★	●	○
NH(A)	○	★	●	○
FCHP(A)	n/a	n/a	n/a	n/a
BMCHP(A)	○	★	●	○

2008 Comparison Rates															
Nat'l Mcaid 90th Pctile:			96.1%		Nat'l Mcaid Mean:			89.3%		MassHealth Weighted Mean:			94.4%		
Nat'l Mcaid 75th Pctile:			94.5%		MA Commercial Mean:			98.2%		MassHealth Median:			94.4%		
MassHealth Plan Rates															
2008		Num	Den	Rate	LCL	UCL		2006		Num	Den	Rate	LCL	UCL	
PCCP	(A)	988	1,046	94.5%	93.0%	95.9%		PCCP	(A)	918	977	94.0%	92.4%	95.5%	
NHP	(A)	485	514	94.4%	92.3%	96.4%		NHP	(A)	373	401	93.0%	90.4%	95.6%	
NH	(A)	389	419	92.8%	90.3%	95.4%		NH	(A)	222	247	89.9%	85.9%	93.8%	
FCHP	(A)	23	27	n/a*	n/a*	n/a*		FCHP	(A)	10	14	n/a*	n/a*	n/a*	
BMCHP	(A)	883	929	95.0%	93.6%	96.5%		BMCHP	(A)	582	613	94.9%	93.1%	96.8%	

Statistical Summary—Age 10 to 17 Years

Comparison to Benchmarks:					2008 Comparison Rates																		
		Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate	Nat'l Mcaid 90th Pctile: 93.3%			Nat'l Mcaid Mean: 86.9%			MassHealth Weighted Mean: 90.8%			Nat'l Mcaid 75th Pctile: 91.4%			MA Commercial Mean: 94.8%			MassHealth Median: 91.8%		
	MassHealth Plan Rates																						
	2008		Num	Den	Rate	LCL	UCL		2006		Num	Den	Rate	LCL	UCL								
	PCCP	(A)	1,231	1,389	88.6%	86.9%	90.3%	PCCP	(A)	1,151	1,296	88.8%	87.1%	90.6%									
	NHP	(A)	506	544	93.0%	90.8%	95.2%	NHP	(A)	446	493	90.5%	87.8%	93.2%									
NH	(A)	362	399	90.7%	87.8%	93.7%	NH	(A)	222	247	89.9%	85.9%	93.8%										
FCHP	(A)	22	27	n/a*	n/a*	n/a*	FCHP	(A)	18	23	n/a*	n/a*	n/a*										
BMCHP	(A)	870	937	92.8%	91.1%	94.6%	BMCHP	(A)	518	570	90.9%	88.4%	93.3%										

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator

Elig indicates the Eligible Population

Den indicates Denominator

LCL indicates Lower Confidence Level

UCL indicates Upper Confidence Level

(A) = Measure was collected using administrative method

(H) = Measure was collected using hybrid method

Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

Use of Appropriate Medications for People with Asthma

Statistical Summary—Age 18 to 56 Years

Comparison to Benchmarks:					2008 Comparison Rates												
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate	Nat'l Mcaid 90th Pctile: 90.7%			Nat'l Mcaid Mean: 84.4%			MassHealth Weighted Mean: 82.9%						
					Nat'l Mcaid 75th Pctile: 88.7%			MA Commercial Mean: 89.5%			MassHealth Median: 86.0%						
					MassHealth Plan Rates												
PCCP(A)	●	●	●	○	2008	Num	Den	Rate	LCL	UCL		2006	Num	Den	Rate	LCL	UCL
NHP(A)	○	○	●	○	PCCP	(A) 3,875	4,779	81.1%	80.0%	82.2%		PCCP	(A) 3,711	4,703	78.9%	77.7%	80.1%
NH(A)	○	○	●	○	NHP	(A) 553	643	86.0%	83.2%	88.8%		NHP	(A) 449	554	81.0%	77.7%	84.4%
FCHP(A)	●	○	●	○	NH	(A) 542	628	86.3%	83.5%	89.1%		NH	(A) 446	543	82.1%	78.8%	85.5%
BMCHP(A)	●	★	●	○	FCHP	(A) 52	67	77.6%	66.9%	88.3%		FCHP	(A) 45	60	75.0%	63.2%	86.8%
					BMCHP	(A) 1,306	1,515	86.2%	84.4%	88.0%		BMCHP	(A) 1,008	1,179	85.5%	83.4%	87.5%

Statistical Summary—Combined Ages (5 to 56 Years)

Comparison to Benchmarks:					2008 Comparison Rates																	
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2006 Rate	Nat'l Mcaid 90th Pctile: 91.9%			Nat'l Mcaid Mean: 86.9%			MassHealth Weighted Mean: 87.2%			Nat'l Mcaid 75th Pctile: 90.7%			MA Commercial Mean: 91.6%			MassHealth Median: 89.4%		
	MassHealth Plan Rates																					
	2006	Num	Den	Rate	LCL	UCL		2006	Num	Den	Rate	LCL	UCL									
	PCCP(A)	●	●	●	○	PCCP	(A)	6,094	7,214	84.5%	83.6%	85.3%		PCCP	(A)	5,780	6,976	82.9%	82.0%	83.7%		
	NHP(A)	○	★	○	★	NHP	(A)	1,544	1,701	90.8%	89.4%	92.2%		NHP	(A)	12,68	1,448	87.6%	85.8%	89.3%		
NH(A)	○	★	●	○	NH	(A)	1,293	1,446	89.4%	87.8%	91.0%		NH	(A)	890	1,037	85.8%	83.7%	88.0%			
FCHP(A)	●	○	●	○	FCHP	(A)	97	121	80.2%	72.6%	87.7%		FCHP	(A)	73	97	75.3%	66.2%	84.4%			
BMCHP(A)	○	★	●	○	BMCHP	(A)	3,059	3,381	90.5%	89.5%	91.5%		BMCHP	(A)	2,108	2,362	89.2%	88.0%	90.5%			

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator

Elig indicates the Eligible Population

Den indicates Denominator

LCL indicates Lower Confidence Level

UCL indicates Upper Confidence Level

(A) = Measure was collected using administrative method

(H) = Measure was collected using hybrid method

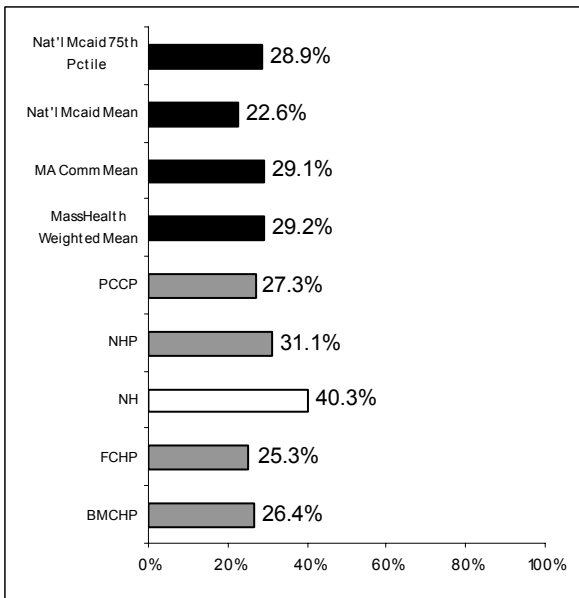
Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

Antidepressant Medication Management

The Antidepressant Medication Management (AMM) measure assesses the level of clinical and pharmacological management of depression for newly diagnosed MassHealth members 18 years of age and older. Antidepressants and psychosocial therapy are an effective combination for treating major depression.²⁹ However, discontinuation of prescribed antidepressants during the acute and continuous phase of treatment can increase the risk of relapse, the persistence of depressive symptoms, and new episodes of depression.³⁰ Recent studies using the HEDIS AMM measure have reported decreases in antidepressant adherence rates over the course of treatment; by the end of the continuation phase less than half of patients remained on prescribed medication.^{31,32} One study found that only 19% of depressed patients met the criteria for all three of the HEDIS measure indicators (optimal practitioner contacts, effective acute phase treatment and effective continual phase treatment).³³

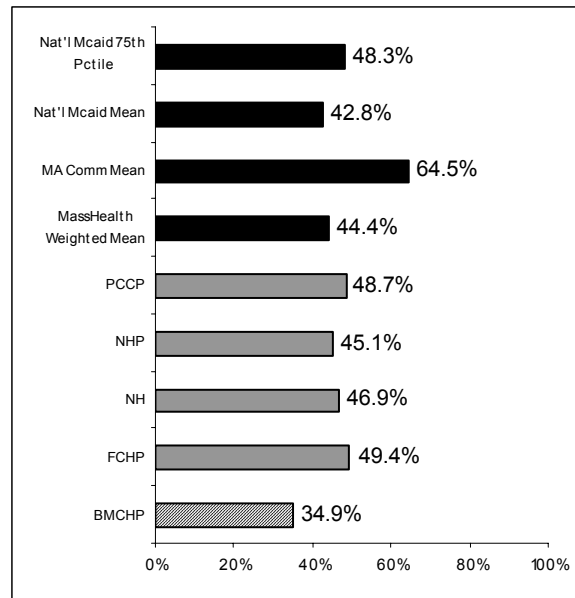
Optimal Practitioner Contacts

The percentage of members 18 years of age and older who were diagnosed with a new episode of depression and treated with antidepressant medication, and who had at least three follow-up contacts with a practitioner coded with a mental health diagnosis during the 84-day Acute Treatment Phase.



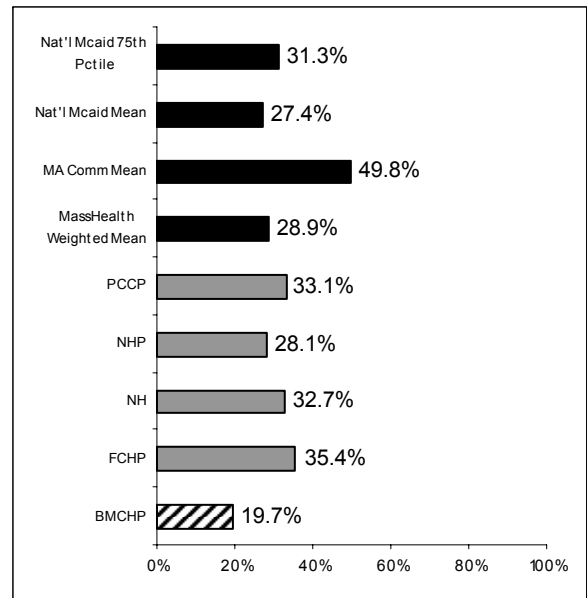
Effective Acute Phase

The percentage of members 18 years of age and older who were diagnosed with a new episode of depression, were treated with antidepressant medication and remained on an antidepressant drug during the entire 84-day Acute Treatment Phase.



Effective Continuation Phase

The percentage of members 18 years of age and older who were diagnosed with a new episode of depression and treated with antidepressant medication and who remained on an antidepressant drug for at least 180 days.



KEY:

- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is *significantly above* the 2008 national Medicaid 75th percentile
- Rate is *not significantly different from* the 2008 national Medicaid 75th percentile
- Rate is *significantly below* the 2008 national Medicaid 75th percentile

Antidepressant Medication Management

Statistical Summary—Optimal Practitioner Contacts

Comparison to Benchmarks:					2008 Comparison Rates														
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2007 Rate	Nat'l Mcaid 90th Pctile:			39.6%	Nat'l Mcaid Mean:			22.6%	MassHealth Weighted Mean:			29.2%			
					Nat'l Mcaid 75th Pctile:			28.9%	MA Commercial Mean:			29.1%	MassHealth Median:			27.3%			
					MassHealth Plan Rates														
					2008		Num	Den	Rate	LCL	UCL		2007		Num	Den	Rate	LCL	UCL
PCCP(A)	○	★	○	○	PCCP	(A)	528	1937	27.3%	25.2%	29.3%		PCCP	(A)	614	2,092	29.3%	27.4%	31.3%
NHP(A)	○	★	○	○	NHP	(A)	179	576	31.1%	27.2%	34.9%		NHP	(A)	199	564	35.3%	31.3%	39.3%
NH(A)	★	★	★	★	NH	(A)	221	548	40.3%	36.1%	44.5%		NH	(A)	140	459	30.5%	26.2%	34.8%
FCHP(A)	○	○	○	○	FCHP	(A)	20	79	25.3%	15.1%	35.5%		FCHP	(A)	22	81	27.2%	16.9%	37.5%
BMCHP(A)	○	★	●	●	BMCHP	(A)	296	1121	26.4%	23.8%	29.0%		BMCHP	(A)	343	998	34.4%	31.4%	37.4%

Statistical Summary—Effective Acute Phase

Comparison to Benchmarks:				
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2007 Rate
PCCP(A)	○	★	●	○
NHP(A)	○	○	●	○
NH(A)	○	○	●	○
FCHP(A)	○	○	●	○
BMCHP(A)	●	●	●	○

2008 Comparison Rates														
Nat'l Mcaid 90th Pctile:			49.9%		Nat'l Mcaid Mean:			42.8%		MassHealth Weighted Mean:			44.4%	
Nat'l Mcaid 75th Pctile:			48.3%		MA Commercial Mean:			64.5%		MassHealth Median:			46.9%	
MassHealth Plan Rates														
2008		Num	Den	Rate	LCL	UCL		2007		Num	Den	Rate	LCL	UCL
PCCP	(A)	944	1937	48.7%	46.5%	51.0%		PCCP	(A)	1,102	2,092	52.7%	50.5%	54.8%
NHP	(A)	260	576	45.1%	41.0%	49.3%		NHP	(A)	259	564	45.9%	41.7%	50.1%
NH	(A)	257	548	46.9%	42.6%	51.2%		NH	(A)	253	459	55.1%	50.5%	59.8%
FCHP	(A)	39	79	49.4%	37.7%	61.0%		FCHP	(A)	40	81	49.4%	37.9%	60.9%
BMCHP	(A)	391	1121	34.9%	32.0%	37.7%		BMCHP	(A)	353	998	35.4%	32.4%	38.4%

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator

Elig indicates the Eligible Population

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LCL indicates Lower Confidence Level

UCL indicates Upper Confidence Level

(A) = Measure was collected using administrative method

(H) = Measure was collected using hybrid method

Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

Antidepressant Medication Management

Statistical Summary—Effective Continuation Phase

Comparison to Benchmarks:					2008 Comparison Rates													
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2007 Rate	Nat'l Mcaid 90th Pctile:		33.7%	Nat'l Mcaid Mean:		27.4%	MassHealth Weighted Mean:		28.9%					
					Nat'l Mcaid 75th Pctile:		31.3%	MA Commercial Mean:		49.8%	MassHealth Median:		32.7%					
					MassHealth Plan Rates													
	2008		Num	Den	Rate	LCL	UCL		2007		Num	Den	Rate	LCL	UCL			
PCCP(A)	○	★	●	●	PCCP	(A)	641	1937	33.1%	31.0%	35.2%	PCCP	(A)	798	2,092	38.1%	36.0%	40.3%
NHP(A)	○	○	●	○	NHP	(A)	162	576	28.1%	24.4%	31.9%	NHP	(A)	151	564	26.8%	23.0%	30.5%
NH(A)	○	★	●	●	NH	(A)	179	548	32.7%	28.6%	36.7%	NH	(A)	200	459	43.6%	38.9%	48.2%
FCHP(A)	○	○	●	○	FCHP	(A)	28	79	35.4%	24.3%	46.6%	FCHP	(A)	30	81	37.0%	25.9%	48.2%
BMCHP(A)	●	●	●	○	BMCHP	(A)	221	1121	19.7%	17.3%	22.1%	BMCHP	(A)	200	998	20.0%	17.5%	22.6%

Understanding the Results

Twenty-nine percent (29.2%) of MassHealth members who were diagnosed with a new episode of major depression and were treated with antidepressant medication had at least three follow-up contacts with a practitioner during the 84-day Acute Treatment Phase. Rates for individual plans ranged from 25.3% to 40.3%. One plan (BMCHP) reported a significantly lower rate compared to its 2007 rate, while another (NH) reported a significantly higher rate. One plan (NH) had an optimal practitioner contact rate significantly above the benchmark rate (28.9%), while the difference in rates for the other four plans was not statistically significant.

Forty-four percent (44.4%) of members diagnosed with a new episode of major depression and treated with antidepressant medication remained on an antidepressant drug during the entire 84-day Acute Treatment Phase. Individual plan rates reported for HEDIS 2008 ranged from 34.9% to 49.4%. None of these values was statistically significantly different from 2007. There were no statistically significant differences between the plan rates of effective acute phase treatment compared to the benchmark (48.3%) except for one plan (BMCHP), which had a rate significantly lower than the benchmark.

Twenty-nine percent (28.9%) of members with a new episode of major depression who were treated with antidepressant medication remained on an antidepressant drug for at least 180 days. Individual plan rates of effective continuous phase treatment reported for 2008 ranged from 19.7% to 35.4%. Rates for two plans (PCCP and NH) decreased significantly from 2007, while the rates for the remaining three plans did not show a statistically significant change from the previous year. The rate for one plan (BMCHP) was significantly below the benchmark (31.3%).

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator
 Elig indicates the Eligible Population
 Den indicates Denominator
 LCL indicates Lower Confidence Level
 UCL indicates Upper Confidence Level

(A) = Measure was collected using administrative method
 (H) = Measure was collected using hybrid method
Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

Antidepressant Medication Management

Understanding the Results (continued)

Non-adherence with antidepressant regimens during the first 30 days of treatment is more likely among patients with certain sociodemographic characteristics: younger age, fewer than 12 years of education, and lower income status.^{34,35,36,37} Other factors associated with higher rates of non-adherence include: comorbid substance abuse or cardiovascular/metabolic conditions,³⁸ lower severity of perceived mental health symptoms^{39,40} and antidepressant side-effects such as weight gain, anxiety,⁴¹ and sexual dysfunction.⁴²

Access to mental health specialty care along with antidepressants is strongly associated with higher rates of acute and continuous phase adherence.⁴³ Patients are significantly more likely to continue taking their medication past 30 days if they receive care from a psychiatrist versus another specialist or general practitioner.^{44,45} Treatment with newer medications (e.g., selective serotonin reuptake inhibitors (SSRIs)/serotonin-norepinephrine reuptake inhibitors (SNRIs)) at higher than target doses is also associated with increased rates of longer term adherence compared to other antidepressants.^{46,47} A recent study found that psychiatrists are more likely than general medical providers to prescribe SSRIs at levels that approximate the maximum recommended dose.⁴⁸

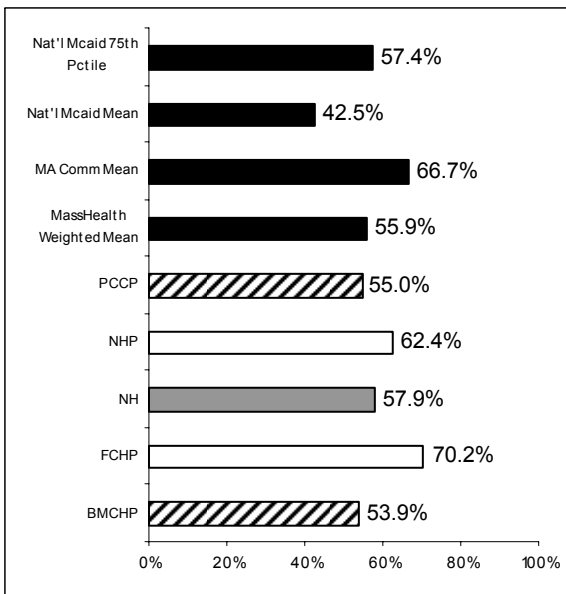
Increasing patient access to psychiatric care directly or through collaborative care models may improve rates of adherence to antidepressants. A psychiatric telemedicine program for primary care clinics that lack on-site psychiatrists has been shown to improve adherence rates in rural communities with limited access to specialized mental health services.⁴⁹ Improving provider-patient communication about treatment with antidepressants can also have a positive influence on rates of adherence. Three key provider messages shown to have significantly increased the odds of adherence involve talking to patients about the length of time they should expect to take the medication, what to do if they have questions, and the importance of continuing to take the medication even if they are feeling better.⁵⁰

Follow-up After Hospitalization for Mental Illness

This measure assesses the rate of follow-up care seven and 30 days after hospitalization for the treatment of mental illness. Timely follow-up services for patients discharged from psychiatric hospitalization can reduce the risk of readmission.⁵¹ Research on the factors that influence compliance with follow-up care has shown that longer intervals between the date of discharge and first outpatient visit increase the likelihood of missed appointments.⁵² One study reported patients were more likely to attend initial follow-up appointments scheduled within two weeks of their discharge from the hospital.⁵³

7 Day

The percentage of members 6 years of age and older who were discharged after treatment of selected mental health disorders and who were seen on an ambulatory basis or were in intermediate treatment with a mental health provider within 7 days after discharge.

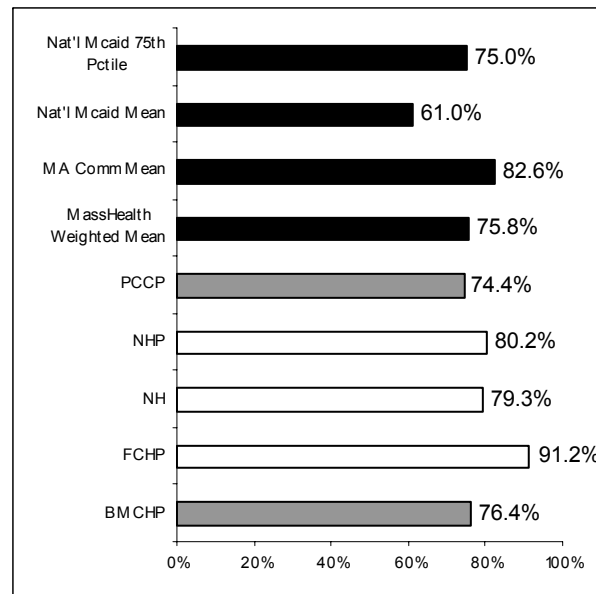


KEY:

- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is *significantly above* the 2008 national Medicaid 75th percentile
- Rate is *not significantly different* from the 2008 national Medicaid 75th percentile
- Rate is *significantly below* the 2008 national Medicaid 75th percentile

30 Day

The percentage of members 6 years of age and older who were discharged after treatment of selected mental health disorders and who were seen on an ambulatory basis or were in intermediate treatment with a mental health provider within 30 days after discharge.



Understanding the Results

Fifty-six percent (55.9%) of MassHealth members 6 years of age and older who were hospitalized for treatment of mental illness had a follow-up visit (i.e., outpatient (OP), intensive OP encounter, or partial hospitalization) within seven days of discharge. Seven-day follow-up rates for individual plans ranged from 53.9% to 70.2%. The rate for one plan (NHP) declined significantly compared to its 2007 rate, while rates for the other four plans remained statistically unchanged from the previous year. Two plans (NHP and FCHP) had rates significantly higher than the benchmark rate (57.4%), two (PCCP and BMCHP) had significantly lower rates, and one (NH) had a rate that did not differ statistically from the benchmark.

Seventy-six percent (75.8%) of MassHealth members 6 years of age and older who were hospitalized for treatment of mental illness had a follow-up visit (i.e., OP, intensive OP encounter, or partial hospitalization) within 30 days. Thirty-day follow-up rates for individual plans ranged from 74.4% to 91.2%. One plan (NHP) had a significantly lower rate compared to 2007. Rates for the other plans did not differ significantly from the rates reported for 2007. Three plans (NHP, NH and FCHP) had rates significantly higher than the benchmark (75.0%) while the rates for the other two plans remained statistically unchanged.

Follow-up After Hospitalization for Mental Illness

Statistical Summary—7 Day

Comparison to Benchmarks:					2008 Comparison Rates													
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2007 Rate	Nat'l Mcaid 90th Pctile: 65.4%			Nat'l Mcaid Mean: 42.5%			MassHealth Weighted Mean: 55.9%							
					Nat'l Mcaid 75th Pctile: 57.4%			MA Commercial Mean: 66.7%			MassHealth Median: 57.9%							
					MassHealth Plan Rates													
					2008	Num	Den	Rate	LCL	UCL	2007	Num	Den	Rate	LCL	UCL		
PCCP(A)	●	★	●	○	PCCP	(A)	3016	5480	55.0%	53.7%	56.4%	PCCP	(A)	3,139	5,631	55.7%	54.4%	57.1%
NHP(A)	★	★	●	●	NHP	(A)	467	748	62.4%	58.9%	66.0%	NHP	(A)	346	482	71.8%	67.7%	75.9%
NH(A)	○	★	●	○	NH	(A)	346	598	57.9%	53.8%	61.9%	NH	(A)	334	574	58.2%	54.1%	62.3%
FCHP(A)	★	★	○	○	FCHP	(A)	80	114	70.2%	61.3%	79.0%	FCHP	(A)	49	84	58.3%	47.2%	69.5%
BMCHP(A)	●	★	●	○	BMCHP	(A)	755	1402	53.9%	51.2%	56.5%	BMCHP	(A)	781	1405	55.6%	53.0%	58.2%

Statistical Summary—30 Day

Comparison to Benchmarks:					2008 Comparison Rates													
	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2007 Rate	Nat'l Mcaid 90th Pctile: 80.3%			Nat'l Mcaid Mean: 61.0%			MassHealth Weighted Mean: 75.8%							
					Nat'l Mcaid 75th Pctile: 75.0%			MA Commercial Mean: 82.6%			MassHealth Median: 79.3%							
	MassHealth Plan Rates																	
	2008	Num Den		Rate	LCL	UCL	2007	Num Den		Rate	LCL	UCL						
	PCCP(A)	○	★	●	○	PCCP	(A)	4076	5480	74.4%	73.2%	75.5%	PCCP	(A)	4,175	5,631	74.1%	73.0%
NHP(A)	★	★	○	●	NHP	(A)	600	748	80.2%	77.3%	83.1%	NHP	(A)	443	482	91.9%	89.4%	94.4%
NH(A)	★	★	●	○	NH	(A)	474	598	79.3%	75.9%	82.6%	NH	(A)	442	574	77.0%	73.5%	80.5%
FCHP(A)	★	★	★	○	FCHP	(A)	104	114	91.2%	85.6%	96.9%	FCHP	(A)	67	84	79.8%	70.6%	88.9%
BMCHP(A)	○	★	●	○	BMCHP	(A)	1071	1402	76.4%	74.1%	78.6%	BMCHP	(A)	1,102	1,405	78.4%	76.2%	80.6%

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator
 Elig indicates the Eligible Population
 Den indicates Denominator
 LCL indicates Lower Confidence Level
 UCL indicates Upper Confidence Level

(A) = Measure was collected using administrative method
 (H) = Measure was collected using hybrid method

Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

The source of the National Medicaid 90th Percentile, National Medicaid 75th Percentile, National Medicaid Mean, and MA Commercial Mean is Quality Compass, 2008.

Follow-up After Hospitalization for Mental Illness

Understanding the Results (continued)

Other significant predictors of missed follow-up appointments may include: lack of prior psychiatric treatment and continuation of care following discharge; involuntary admission to the hospital; discharge against medical advice; and the presence of psychosocial stressors.^{54,55,56} In a recent study, adult Medicaid-enrollees from a large mid-Atlantic state who received clinical services for mental health in the month leading up to hospital admission were more than three times likely to adhere to scheduled follow-up care within 7 or 30 days after discharge than individuals who did not.⁵⁷

Plans serving MassHealth members with mental illness might improve their follow-up rates by pursuing interventions targeting individuals with one or more of the above risk factors for poor attendance at outpatient visits. For example, hospital discharge planning designed to consider patient preferences for outpatient treatment, promote early and ongoing communication between clinician and patients, and set appropriate expectations for the type and timing of follow-up care could foster compliance with scheduled appointments.^{58,59} Designating staff to coordinate patient care after hospital discharge has been shown to increase rates of compliance with follow-up care.⁶⁰

For patients lacking primary social support, plans could initiate interventions that help strengthen existing family supports or create linkages to consumer supports in the community. One model, the Peer Bridger Project of the New York Association of Psychiatric Rehabilitation Services, connects individuals who have a history of psychiatric hospitalization with admitted patients, with the aim of helping the patients identify positive community support groups following their discharge.⁶¹

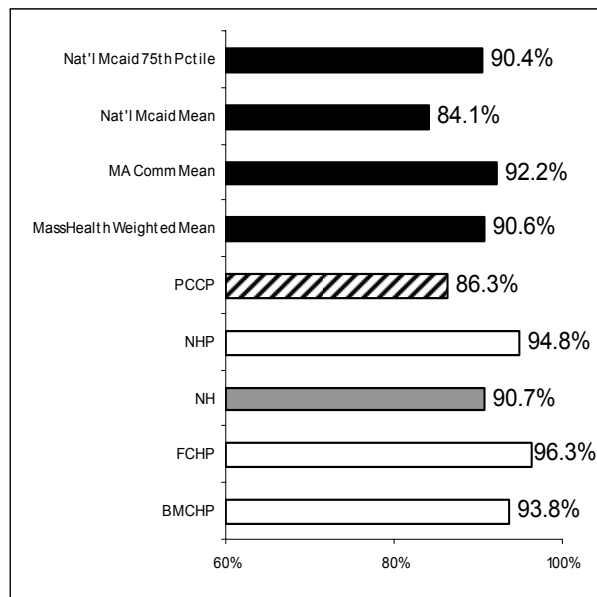
Getting Better

Appropriate Treatment for Children with Upper Respiratory Infection

Current guidelines recommend against prescribing antibiotics for upper respiratory infections (URIs) which are commonly caused by viruses, not bacteria. Adherence to these guidelines is important to the control of the emergence and spread of antibiotic-resistant bacteria, which is due in part to the inappropriate use of antibiotics for conditions which do not warrant antibiotic treatment. Despite this, approximately three-fourths of all outpatient prescriptions are given to children with URIs.⁶²

Appropriate Treatment for URI

The percentage of members 3 months to 18 years of age who had a URI and were not dispensed an antibiotic prescription on or three days after the outpatient visit where the URI diagnosis was made. Higher rates indicate more appropriate use of antibiotics.



KEY:

- Comparison rates (Source of National and MA Commercial data: Quality Compass, 2008)
- Rate is *significantly above* the 2008 national Medicaid 75th percentile
- Rate is *not significantly different* from the 2008 national Medicaid 75th percentile
- Rate is *significantly below* the 2008 national Medicaid 75th percentile

Understanding the Results

NCQA has made several changes to this measure that should be considered when comparing HEDIS 2008 to prior rates. These changes include adding Negative Competing Diagnosis in order to exclude members who had claims or encounters with competing diagnoses within three days of the episode (encounter) being evaluated. This is done to ensure that antibiotic prescriptions found in the data are not related to other conditions, for which they would be appropriate.

Ninety-one percent (90.6%) of members aged 3 months to 18 years who had a URI were not prescribed an antibiotic within the first three days after diagnosis. The range of rates for individual plans was from 86.3% to 96.3%. Three MassHealth plans (NHP, FCHP and BMCHP) had rates that were significantly better than the 2008 national Medicaid 75th percentile, while one (the PCC Plan) had a rate that was significantly lower than the benchmark. All five plans had a 2008 rate that was significantly better than their 2007 rate.

A number of other factors influence the inappropriate prescription of antibiotics for children with URI. These factors include physician's perception of parental expectations for an antibiotic prescription in response to an illness episode, if the child is of school age, the existence of a chronic illness such as asthma, if the physician is a pediatrician, and the number of years the provider has been in practice.^{63,64,65} Activities that can help decrease rates of inappropriate antibiotic use for URIs include provider education about current clinical guidelines as well as availability and distribution of educational materials in examination rooms.⁶⁶

Appropriate Treatment for Children with URI

Statistical Summary—

Comparison to Benchmarks:				
PCCP(A) NHP(A) NH(A) FCHP(A) BMCHP(A)	Nat'l Mcaid 75th Pctile	Nat'l Mcaid Mean	MA Comm Mean	Plan's 2007 Rate
	●	★	●	★
	★	★	★	★
	○	★	●	★
	★	★	★	★
	★	★	★	★

2008 Comparison Rates														
Nat'l Mcaid 90th Pctile:			94.2%		Nat'l Mcaid Mean:			84.1%		MassHealth Weighted Mean:			90.6%	
Nat'l Mcaid 75th Pctile:			90.4%		MA Commercial Mean:			92.2%		MassHealth Median:			93.8%	
MassHealth Plan Rates														
2008	Num		Den	Rate *	LCL	UCL		2007	Num		Den	Rate *	LCL	UCL
PCCP	(A)	1,890	13,778	86.3%	85.7%	86.9%		PCCP	(A)	2,513	15,692	84.0%	83.4%	84.6%
NHP	(A)	328	6,356	94.8%	94.3%	95.4%		NHP	(A)	535	6,504	91.8%	91.1%	92.4%
NH	(A)	380	4,104	90.7%	89.8%	91.6%		NH	(A)	557	4,652	88.0%	87.1%	89.0%
FCHP	(A)	19	515	96.3%	94.6%	98.0%		FCHP	(A)	48	487	90.1%	87.4%	92.9%
BMCHP	(A)	591	9,500	93.8%	93.3%	94.3%		BMCHP	(A)	948	10,656	91.1%	90.6%	91.6%

* Reported percentages are inverted rates (i.e., 1-(numerator/denominator)).

Legend:

- ★ 2008 rate is significantly above the comparison rate.
- 2008 rate is not significantly different from the comparison rate.
- 2008 rate is significantly below the comparison rate.

Num indicates Numerator
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(A) = Measure was collected using administrative method
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Note: The ability to locate and obtain medical records by a plan or a plan's contracted vendor can impact performance on a hybrid measure. Per NCQA's specifications, members for whom no medical record documentation is found are considered non-compliant with the measure.

Use of Services

Mental Health Utilization

The HEDIS 2008 Mental Health Utilization measure assesses utilization of mental health services (e.g., inpatient, intensive outpatient, partial hospitalization, outpatient, and emergency department) by MassHealth members during 2007. These data provide insights into the volume of mental health services utilized but do not address their quality (i.e., the appropriateness or effectiveness of care) or the potential for over- or under-utilization of services, particularly across various mental health conditions, such as depression or schizophrenia. The relationship between the volume and quality of mental health services has not been thoroughly studied. One study, however, concluded that health plans with low utilization for outpatient and inpatient mental health services are more likely to demonstrate poor results on other HEDIS behavior health measures, e.g., rates of 7-day and 30-day follow-up after hospitalization for mental illness, and rates of provider contact and acute and continuation phase treatment with antidepressant medication.⁶⁷ (Data for these measures are presented in this report, on pages 33-39).

Percentage of Members Using Services

The number and percentage of members who received mental health services during 2007. Mental health services are broken down by inpatient, intermediate, ambulatory, and any service. (The Intermediate category refers to intensive outpatient services and partial hospitalization programs.) The denominator used to calculate the percentages is member years (i.e., member months divided by 12). Data stratified by gender and age (0-12, 13-17, 18-64, and 65+) appear in Appendix H.

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	2,757,546	5,584	2.4%	5,082	2.2%	73,477	32.0%	74,035	32.2%
NHP	1,358,803	840	0.7%	725	0.6%	16,570	14.6%	16,670	14.7%
NH	1,036,563	764	0.9%	4,257	4.9%	15,664	18.1%	15,783	18.3%
FCHP	128,498	135	1.3%	36	0.3%	2,014	18.8%	2,026	18.9%
BMCHP	1,910,762	1,634	1.0%	584	0.4%	31,052	19.5%	31,190	19.6%
2008 National Medicaid 75th Percentile			1.0%		0.4%		10.7%		11.1%

According to the 2007 National Survey on Drug Use and Health (NSDUH), rates of mental health services utilization by U.S. adults have remained relatively constant compared to the 2006 survey results: 13.25% (vs. 12.9% in 2006) received mental health services during the 12-months prior to the survey; 1.0% (vs. 0.7% in 2006) received inpatient treatment and 6.9% (vs. 6.7% in 2006) received outpatient treatment during the same time period.⁶⁸ Although data on utilization of chemical dependency services was reported in the 2007 NSDUH, this measure is not being evaluated in the 2008 HEDIS Report.

For HEDIS 2008, NCQA modified the criteria for identifying utilization of mental health services obtained on an outpatient or emergency basis. Due to this change, comparisons of the 2008 HEDIS results to HEDIS 2006 data, including benchmarks, are inappropriate.

The source of the National Medicaid 75th Percentile is Quality Compass, 2008.

Appendix A:

MassHealth Regions and Service Areas

MassHealth Service Areas and Regions

<u>Region</u>	<u>Service Areas*</u>
Western	Adams, Greenfield, Holyoke, Northampton, Pittsfield, Springfield, and Westfield
Central	Athol, Framingham, Gardner-Fitchburg, Southbridge, Waltham, and Worcester
Northern	Beverly, Gloucester, Haverhill, Lawrence, Lowell, Lynn, Malden, Salem, and Woburn
Boston-Greater Boston	Boston, Revere, Somerville, and Quincy
Southern	Attleboro, Barnstable, Brockton, Fall River, Falmouth, Nantucket, New Bedford, Oak Bluffs, Orleans, Plymouth, Taunton, Wareham

* each service area includes multiple cities and towns.

Appendix B:

Antigen-Specific Childhood Immunization Rates

Antigen-Specific Childhood Immunization Rates

2008 Comparison Rates— 4 DTaP/DT							
Nat'l Medicaid 90 th Percentile:				87.1%			
Nat'l Medicaid 75 th Percentile:				84.3%			
Nat'l Medicaid Mean:				77.8%			
MA Commercial Mean:				84.4%			
MassHealth Weighted Mean:				86.5%			
MassHealth Median:				86.9%			
DTaP		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	362	4091	411	88.1%	84.8%	91.3%
NHP	(H)	313	3500	360	86.9%	83.3%	90.6%
NH	(H)	349	2847	411	84.9%	81.3%	88.5%
FCHP	(H)	228	256	256	89.1%	85.0%	93.1%
BMCHP	(H)	352	5289	411	85.6%	82.1%	89.2%

2008 Comparison Rates— 3 IPV							
Nat'l Medicaid 90 th Percentile:				95.4%			
Nat'l Medicaid 75 th Percentile:				92.9%			
Nat'l Medicaid Mean:				87.4%			
MA Commercial Mean:				87.4%			
MassHealth Weighted Mean:				92.4%			
MassHealth Median:				92.8%			
IPV		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	390	4091	411	94.9%	92.6%	97.1%
NHP	(H)	334	3500	360	92.8%	90.0%	95.6%
NH	(H)	366	2847	411	89.1%	85.9%	92.2%
FCHP	(H)	245	256	256	95.7%	93.0%	98.4%
BMCHP	(H)	378	5289	411	92.0%	89.2%	94.7%

2008 Comparison Rates—1 MMR							
Nat'l Medicaid 90 th Percentile:				95.4%			
Nat'l Medicaid 75 th Percentile:				94.2%			
Nat'l Medicaid Mean:				90.4%			
MA Commercial Mean:				90.7%			
MassHealth Weighted Mean:				93.1%			
MassHealth Median:				93.4%			
MMR		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	384	4091	411	93.4%	90.9%	95.9%
NHP	(H)	333	3500	360	92.5%	89.6%	95.4%
NH	(H)	371	2847	411	90.3%	87.3%	93.3%
FCHP	(H)	243	256	256	94.9%	92.0%	97.8%
BMCHP	(H)	389	5289	411	94.6%	92.3%	96.9%

2008 Comparison Rates—3 HiB							
Nat'l Medicaid 90 th Percentile:				95.3%			
Nat'l Medicaid 75 th Percentile:				93.0%			
Nat'l Medicaid Mean:				87.7%			
MA Commercial Mean:				89.5%			
MassHealth Weighted Mean:				95.1%			
MassHealth Median:				95.3%			

HiB		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	395	4091	411	96.1%	94.1%	98.1%
NHP	(H)	341	3500	360	94.7%	92.3%	97.2%
NH	(H)	383	2847	411	93.2%	90.6%	95.7%
FCHP	(H)	244	256	256	95.3%	92.5%	98.1%
BMCHP	(H)	393	5289	411	95.6%	93.5%	97.7%

2008 Comparison Rates—3 HepB							
Nat'l Medicaid 90 th Percentile:				95.8%			
Nat'l Medicaid 75 th Percentile:				93.9%			
Nat'l Medicaid Mean:				87.2%			
MA Commercial Mean:				86.7%			
MassHealth Weighted Mean:				93.0%			
MassHealth Median:				93.9%			
HepB		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	382	4091	411	92.9%	90.3%	95.5%
NHP	(H)	338	3500	360	93.9%	91.3%	96.5%
NH	(H)	369	2847	411	89.8%	86.7%	92.8%
FCHP	(H)	245	256	256	95.7%	93.0%	98.4%
BMCHP	(H)	386	5289	411	93.9%	91.5%	96.3%

2008 Comparison Rates—1 VZV							
Nat'l Medicaid 90 th Percentile:				94.4%			
Nat'l Medicaid 75 th Percentile:				92.8%			
Nat'l Medicaid Mean:				88.8%			
MA Commercial Mean:				89.8%			
MassHealth Weighted Mean:				91.3%			
MassHealth Median:				91.7%			
VZV		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	377	4091	411	91.7%	88.9%	94.5%
NHP	(H)	332	3500	360	92.2%	89.3%	95.1%
NH	(H)	364	2847	411	88.6%	85.4%	91.8%
FCHP	(H)	236	256	256	92.2%	88.7%	95.7%
BMCHP	(H)	377	5289	411	91.7%	88.9%	94.5%

The source of the National Medicaid 90th Percentile, National Medicaid 75th Percentile, National Medicaid Mean, and MA Commercial Mean is Quality Compass, 2008.

Antigen-Specific Childhood Immunization Rates

2008 Comparison Rates—4 PCV

Nat'l Medicaid 90 th Percentile:	84.9%
Nat'l Medicaid 75 th Percentile:	81.3%
Nat'l Medicaid Mean:	73.9%
MA Commercial Mean:	84.0%
MassHealth Weighted Mean:	84.6%
MassHealth Median:	84.7%

PCV		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	346	4091	411	84.2%	80.5%	87.8%
NHP	(H)	304	3500	360	84.4%	80.6%	88.3%
NH	(H)	348	2847	411	84.7%	81.1%	88.3%
FCHP	(H)	225	256	256	87.9%	83.7%	92.1%
BMCHP	(H)	349	5289	411	84.9%	81.3%	88.5%

Appendix C:

Well-Child Visits in the First 15 Months of Life (Rates for 0, 1, 2, 3, 4 and 5 Visits)

Well-Child rates (0,1,2,3,4 and 5 Visits)

2008 Comparison Rates—0 visits	
Nat'l Medicaid 90 th Percentile:	7.8%
Nat'l Medicaid 75 th Percentile:	3.3%
Nat'l Medicaid Mean:	5.7%
MA Commercial Mean:	2.3%
MassHealth Weighted Mean:	1.1%
MassHealth Median:	1.2%

0 visits		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	0	3251	240	0.0%	0.0%	0.2%
NHP	(H)	3	3003	279	1.1%	0.0%	2.5%
NH	(H)	8	2587	411	1.9%	0.5%	3.4%
FCHP	(H)	6	212	209	2.9%	0.4%	5.4%
BMCHP	(H)	5	4497	411	1.2%	0.0%	2.4%

2008 Comparison Rates—1 visit	
Nat'l Medicaid 90 th Percentile:	6.4%
Nat'l Medicaid 75 th Percentile:	3.3%
Nat'l Medicaid Mean:	3.3%
MA Commercial Mean:	0.4%
MassHealth Weighted Mean:	0.6%
MassHealth Median:	0.2%

1 visit		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	3	3251	240	1.3%	0.0%	2.9%
NHP	(H)	0	3003	279	0.0%	0.0%	0.2%
NH	(H)	1	2587	411	0.2%	0.0%	0.8%
FCHP	(H)	0	212	209	0.0%	0.0%	0.2%
BMCHP	(H)	3	4497	411	0.7%	0.0%	1.7%

2008 Comparison Rates—2 visits	
Nat'l Medicaid 90 th Percentile:	7.5%
Nat'l Medicaid 75 th Percentile:	5.1%
Nat'l Medicaid Mean:	3.9%
MA Commercial Mean:	0.5%
MassHealth Weighted Mean:	0.3%
MassHealth Median:	0.4%

2 visits		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	1	3251	240	0.4%	0.0%	1.4%
NHP	(H)	1	3003	279	0.4%	0.0%	1.2%
NH	(H)	2	2587	411	0.5%	0.0%	1.3%
FCHP	(H)	3	212	209	1.4%	0.0%	3.3%
BMCHP	(H)	0	4497	411	0.0%	0.0%	0.1%

2008 Comparison Rates—3 visits	
Nat'l Medicaid 90 th Percentile:	9.9%
Nat'l Medicaid 75 th Percentile:	8.1%
Nat'l Medicaid Mean:	6.2%
MA Commercial Mean:	0.9%
MassHealth Weighted Mean:	1.6%
MassHealth Median:	1.5%

3 visits		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	6	3251	240	2.5%	0.3%	4.7%
NHP	(H)	3	3003	279	1.1%	0.0%	2.5%
NH	(H)	5	2587	411	1.2%	0.0%	2.4%
FCHP	(H)	7	212	209	3.3%	0.7%	6.0%
BMCHP	(H)	6	4497	411	1.5%	0.2%	2.7%

2008 Comparison Rates—4 visits	
Nat'l Medicaid 90 th Percentile:	16.1%
Nat'l Medicaid 75 th Percentile:	13.6%
Nat'l Medicaid Mean:	10.8%
MA Commercial Mean:	2.0%
MassHealth Weighted Mean:	5.7%
MassHealth Median:	4.6%

4 visits		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	8	3251	240	3.3%	0.9%	5.8%
NHP	(H)	20	3003	279	7.2%	4.0%	10.4%
NH	(H)	19	2587	411	4.6%	2.5%	6.8%
FCHP	(H)	6	212	209	2.9%	0.4%	5.4%
BMCHP	(H)	29	4497	411	7.1%	4.5%	9.7%

2008 Comparison Rates—5 visits	
Nat'l Medicaid 90 th Percentile:	23.4%
Nat'l Medicaid 75 th Percentile:	20.8%
Nat'l Medicaid Mean:	17.1%
MA Commercial Mean:	6.4%
MassHealth Weighted Mean:	9.7%
MassHealth Median:	11.9%

5 visits		Num	Elig	Den	Rate	LCL	UCL
PCCP	(H)	13	3251	240	5.4%	2.3%	8.5%
NHP	(H)	24	3003	279	8.6%	5.1%	12.1%
NH	(H)	50	2587	411	12.2%	8.9%	15.4%
FCHP	(H)	28	212	209	13.4%	8.5%	18.3%
BMCHP	(H)	49	4497	411	11.9%	8.7%	15.2%

The source of the National Medicaid 90th Percentile, National Medicaid 75th Percentile, National Medicaid Mean, and MA Commercial Mean is Quality Compass, 2008.

Appendix D:

Use of Appropriate Medication for People
with Asthma—PCC Plan Members with
Essential Coverage

Use of Appropriate Medication for People with Asthma—PCC Plan Members with Essential Coverage

Use of Appropriate Medications for People with Asthma—18 to 56 Years					
2008 Comparison Rates					
Nat'l Medicaid 90 th Percentile:			90.7%		
Nat'l Medicaid 75 th Percentile:			88.7%		
Nat'l Medicaid Mean:			84.4%		
MA Commercial Mean:			89.5%		
	Num	Den	Rate	LCL	UCL
PCC Plan w/o Essential	(A) 3,875	4,779	81.1%	80.0%	82.2%
Essential Only	(A) 296	384	77.1%	72.7%	81.4%

The source of the National Medicaid 90th Percentile, National Medicaid 75th Percentile, National Medicaid Mean, and MA Commercial Mean is Quality Compass, 2008.

Appendix E:

PCC Plan Antidepressant Medication Management Rates for Members with Basic, Essential, and Non-Basic/Non-Essential Coverage

PCC Plan Antidepressant Medication Management Rates for Members with Basic, Essential, and Non-Basic/Non-Essential Coverage

Optimal Practitioner Contacts					
2008	Num	Den	Rate	LCL	UCL
Basic	(A) 50	147	34.0%	26.0%	42.0%
Essential	(A) 172	544	31.6%	27.6%	35.6%
NonBasic/NonEssntl	(A) 478	1790	26.7%	24.6%	28.8%

Effective Acute Phase Treatment					
2008	Num	Den	Rate	LCL	UCL
Basic	(A) 73	147	49.7%	41.2%	58.1%
Essential	(A) 308	544	56.6%	52.4%	60.9%
NonBasic/NonEssntl	(A) 871	1790	48.7%	46.3%	51.0%

Effective Continuous Phase Treatment					
2008	Num	Den	Rate	LCL	UCL
Basic	(A) 53	147	36.1%	28.0%	44.2%
Essential	(A) 221	544	40.6%	36.4%	44.8%
NonBasic/NonEssntl	(A) 588	1790	32.9%	30.6%	35.1%

Appendix F:

PCC Plan Follow-up After Hospitalization
for Mental Illness Rates for Members
with Basic, Essential, and Non-Basic/
Non-Essential Coverage

PCC Plan Follow-up After Hospitalization for Mental Illness for Members with Basic, Essential, and Non-Basic/Non-Essential Coverage

7 Day					
2008	Num	Den	Rate	LCL	UCL
Basic	(A) 171	366	46.7%	41.5%	52.0%
Essential	(A) 485	1035	46.9%	43.8%	49.9%
NonBasic/NonEsntl	(A) 2845	5114	55.6%	54.3%	57.0%

30 Day					
2008	Num	Den	Rate	LCL	UCL
Basic	(A) 236	366	64.5%	59.4%	69.5%
Essential	(A) 662	1035	64.0%	61.0%	66.9%
NonBasic/NonEsntl	(A) 3840	5114	75.1%	73.9%	76.3%

Appendix G:

PCC Plan Mental Health Utilization Rates for Members with Basic, Essential, and Non-Basic/Non-Essential Coverage

PCC Plan Mental Health Utilization for Members with Basic, Essential, and Non-Basic/Non-Essential Coverage

Members with Basic Coverage

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Outpatient/ED</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
Ages 18-64	65,641	431	7.9%	374	6.8%	4,414	80.7%	4,484	82.0%

Members with Essential Coverage

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Outpatient/ED</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
Ages 18-64	566,109	1,281	2.7%	977	2.1%	10,616	22.5%	10,840	23.0%

Members with Non-Basic/Non-Essential Coverage

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Outpatient/ED</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
Ages 0-12	860,195	427	.6%	1,232	1.7%	12,671	17.7%	12,820	17.9%
Ages 13-17	366,328	675	2.2%	1,159	3.8%	10,016	32.8%	10,163	33.3%
Ages 18-64	1,465,380	4,082	3.3%	2,349	1.9%	47,355	38.8%	47,564	39.0%
Ages Total	2,691,905	5,151	2.3%	4,657	2.1%	68,422	30.5%	68,890	30.7%

Appendix H:

Mental Health Utilization Rates, Age and Gender Stratifications, All Plans

Mental Health Utilization—Percentage of Members Using Services

Ages 0-12

Male

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	450,597	325	0.9%	866	2.3%	7,950	21.2%	8,047	21.4%
NHP	321,728	68	0.3%	137	0.5%	2,594	9.7%	2,606	9.7%
NH	262,383	72	0.3%	825	3.8%	3,276	15.0%	3,278	15.0%
FCHP	25,975	4	0.2%	0	0.0%	338	15.6%	339	15.7%
BMCHP	472,813	111	0.3%	66	0.2%	6,032	15.3%	6,039	15.3%

Female

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	409,598	102	0.3%	366	1.1%	4,721	13.8%	4,773	14.0%
NHP	316,362	18	0.1%	50	0.2%	1,590	6.0%	1,595	6.1%
NH	255,169	22	0.1%	528	2.5%	2,143	10.1%	2,144	10.1%
FCHP	26,024	1	0.1%	0	0.0%	204	9.4%	204	9.4%
BMCHP	455,925	52	0.1%	16	0.0%	3,671	9.7%	3,676	9.7%

Male

Ages 13-17

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	191,610	339	2.1%	565	3.5%	5,465	34.2%	5,531	34.6%
NHP	102,833	71	0.8%	98	1.1%	1,496	17.5%	1,513	17.7%
NH	70,699	42	0.7%	369	6.3%	1,136	19.3%	1,146	19.5%
FCHP	8,640	7	1.0%	0	0.0%	135	18.8%	135	18.8%
BMCHP	136,534	92	0.8%	25	0.2%	2,343	20.6%	2,353	20.7%

Female

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	174,718	336	2.3%	594	4.1%	4,551	31.3%	4,632	31.8%
NHP	108,344	98	1.1%	112	1.2%	1,530	17.0%	1,540	17.1%
NH	69,824	75	1.3%	377	6.5%	1,205	20.7%	1,210	20.8%
FCHP	9,150	7	0.9%	1	0.1%	146	19.2%	146	19.2%
BMCHP	137,187	133	1.2%	35	0.3%	2,444	21.4%	2,453	21.5%

Mental Health Utilization—Percentage of Members Using Services

Male

Ages 18-64

Female

	<u>Member</u> <u>Months</u>	<u>Inpatient</u> <u>N</u>	<u>Inpatient</u> <u>%</u>	<u>Intermediate</u> <u>N</u>	<u>Intermediate</u> <u>%</u>	<u>Ambulatory</u> <u>N</u>	<u>Ambulatory</u> <u>%</u>	<u>Any Service</u> <u>N</u>	<u>Any Service</u> <u>%</u>
PCCP	544,275	2,000	4.4%	1,180	2.6%	17,875	39.4%	18,027	39.7%
NHP	114,983	177	1.9%	86	0.9%	1,790	18.7%	1,815	18.9%
NH	103,868	174	2.0%	456	5.3%	1,734	20.0%	1,776	20.5%
FCHP	17,420	39	2.7%	9	0.6%	280	19.3%	247	19.8%
BMCHP	179,392	413	2.8%	127	0.9%	3,591	24.0%	3,632	24.3%

	<u>Member</u> <u>Months</u>	<u>Inpatient</u> <u>N</u>	<u>Inpatient</u> <u>%</u>	<u>Intermediate</u> <u>N</u>	<u>Intermediate</u> <u>%</u>	<u>Ambulatory</u> <u>N</u>	<u>Ambulatory</u> <u>%</u>	<u>Any Service</u> <u>N</u>	<u>Any Service</u> <u>%</u>
PCCP	986,746	2,482	3.0%	1,511	1.8%	32,914	40.0%	33,024	40.2%
NHP	394,262	408	1.2%	242	0.7%	7,545	23.0%	7,576	23.1%
NH	274,617	379	1.7%	1,702	7.4%	6,170	27.0%	6,229	27.2%
FCHP	41,289	77	2.2%	26	0.8%	911	26.5%	915	26.6%
BMCHP	528,907	833	1.9%	315	0.7%	12,971	29.4%	13,037	29.6%

Male

Ages 65+ *

Female

	<u>Member</u> <u>Months</u>	<u>Inpatient</u> <u>N</u>	<u>Inpatient</u> <u>%</u>	<u>Intermediate</u> <u>N</u>	<u>Intermediate</u> <u>%</u>	<u>Ambulatory</u> <u>N</u>	<u>Ambulatory</u> <u>%</u>	<u>Any Service</u> <u>N</u>	<u>Any Service</u> <u>%</u>
PCCP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
NHP	126	0	0.0%	0	0.0%	10	95.2%	10	95.2%
NH	1	0	0.0%	0	0.0%	0	0.0%	0	0.0%
FCHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
BMCHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%

	<u>Member</u> <u>Months</u>	<u>Inpatient</u> <u>N</u>	<u>Inpatient</u> <u>%</u>	<u>Intermediate</u> <u>N</u>	<u>Intermediate</u> <u>%</u>	<u>Ambulatory</u> <u>N</u>	<u>Ambulatory</u> <u>%</u>	<u>Any Service</u> <u>N</u>	<u>Any Service</u> <u>%</u>
PCCP	2	0	0.0%	0	0.0%	1	600.0%	1	600.0%
NHP	165	0	0.0%	0	0.0%	15	109.1%	15	109.1%
NH	2	0	0.0%	0	0.0%	0	0.0%	0	0.0%
FCHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
BMCHP	4	0	0.0%	0	0.0%	0	0.0%	0	0.0%

* The MassHealth managed care program serves members under the age of 65. MassHealth members 65 years and older were included in the eligible populations for the HEDIS 2008 measures whenever the specifications for the measure included the 65 and older population, the members' coverage had not yet been terminated, and the members met all eligible population criteria such as the continuous enrollment and enrollment anchor date requirements.

Mental Health Utilization—Percentage of Members Using Services

Ages Unknown

Male

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
NHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
NH	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
FCHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
BMCHP	9	0	0.0%	0	0.0%	0	0.0%	0	0.0%

Female

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
NHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
NH	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
FCHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
BMCHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%

Age Group Totals By Gender

Male

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	1,186,482	2,664	2.7%	2,611	2.6%	31,290	31.7%	31,605	32.0%
NHP	539,670	316	0.7%	321	0.7%	5,890	13.1%	5,944	13.2%
NH	436,951	288	0.8%	1,650	4.5%	6,146	16.9%	6,200	17.0%
FCHP	52,035	50	1.2%	9	0.2%	753	17.4%	761	17.6%
BMCHP	788,739	616	0.9%	218	0.3%	11,966	18.2%	12,024	18.3%

Female

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	1,571,064	2,920	2.2%	2,471	1.9%	42,187	32.2%	42,430	32.4%
NHP	819,133	524	0.8%	404	0.6%	10,680	15.7%	10,726	15.7%
NH	599,612	476	1.0%	2,607	5.2%	9,518	19.1%	9,583	19.2%
FCHP	76,463	85	1.3%	27	0.4%	1,261	19.8%	1,265	19.9%
BMCHP	1,122,023	1,018	1.1%	366	0.4%	19,086	20.4%	19,166	20.1%

Mental Health Utilization—Percentage of Members Using Services

TOTAL Male/Female: Ages 0—12

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	860,195	427	0.6%	1,232	1.7%	12,671	17.7%	12,820	17.9%
NHP	638,090	86	0.2%	187	0.4%	4,184	7.9%	4,201	7.9%
NH	517,552	94	0.2%	1,353	3.1%	5,419	12.6%	5,422	12.6%
FCHP	51,999	5	0.1%	0	0.0%	542	12.5%	543	12.5%
BMCHP	928,738	163	0.2%	82	0.1%	9,703	12.5%	9,715	12.6%

TOTAL Male/Female: Ages 13-17

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	366,328	675	2.2%	1,159	3.8%	10,016	32.8%	10,163	33.3%
NHP	211,177	169	1.0%	210	1.2%	3,026	17.2%	3,053	17.4%
NH	140,523	117	1.0%	746	6.4%	2,341	20.0%	2,356	20.1%
FCHP	17,790	14	0.9%	1	0.1%	281	19.0%	281	19.0%
BMCHP	273,721	225	1.0%	60	0.3%	4,787	21.0%	4,806	21.1%

TOTAL Male/Female: Ages 18-64

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	1,531,021	4,482	3.5%	2,691	2.1%	50,789	39.8%	51,051	40.0%
NHP	509,245	585	1.4%	328	0.8%	9,335	22.0%	9,391	22.1%
NH	378,485	553	1.8%	2,158	6.8%	7,904	25.1%	8,005	25.4%
FCHP	58,709	116	2.4%	35	0.7%	1,191	24.3%	1,202	24.6%
BMCHP	708,299	1,246	2.1%	442	0.8%	16,562	28.1%	16,669	28.2%

TOTAL Male/Female: Ages 65+ *

	<u>Member</u> <u>Months</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
		<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	2	0	0.0%	0	0.0%	1	600.0%	1	600.0%
NHP	291	0	0.0%	0	0.0%	25	103.1%	25	103.1%
NH	3	0	0.0%	0	0.0%	0	0.0%	0	0.0%
FCHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
BMCHP	4	0	0.0%	0	0.0%	0	0.0%	0	0.0%

* The MassHealth managed care program serves members under the age of 65. MassHealth members 65 years and older were included in the eligible populations for the HEDIS 2008 measures whenever the specifications for the measure included the 65 and older population, the members' coverage had not yet been terminated, and the members met all eligible population criteria such as the continuous enrollment and enrollment anchor date requirements.

Mental Health Utilization—Percentage of Members Using Services

TOTAL Male/Female: Ages Unknown

	<u>Member</u>	<u>Inpatient</u>		<u>Intermediate</u>		<u>Ambulatory</u>		<u>Any Service</u>	
	<u>Months</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>	<u>N</u>	<u>%</u>
PCCP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
NHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
NH	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
FCHP	0	0	0.0%	0	0.0%	0	0.0%	0	0.0%
BMCHP	9	0	0.0%	0	0.0%	0	0.0%	0	0.0%

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