

Issue Brief

Achieving Better Quality of Care for Low-Income Populations: The Roles of Health Insurance and the Medical Home in Reducing Health Inequities

JULIA BERENSON, MICHELLE M. DOTY, MELINDA K. ABRAMS, AND ANTHONY SHIH

ABSTRACT: In the United States, uninsured and low-income adults experience substantial health and health care inequities when compared with insured and higher-income individuals. A new analysis of the Commonwealth Fund 2010 Biennial Health Insurance Survey demonstrates that when low-income adults have both health insurance and a medical home, they are less likely to report cost-related access problems, more likely to be up-to-date with preventive screenings, and report greater satisfaction with the quality of their care. Moreover, the gaps in health care between them and higher-income populations are significantly reduced. The Affordable Care Act includes numerous provisions that will significantly expand health insurance coverage, especially to low-income patients, as well as provisions to promote medical homes. Along with supporting the full implementation of coverage expansions, it will be important for public and private stakeholders to create opportunities that enhance access to medical homes for vulnerable populations.

* * * * *

health care system. The Fund carries out this mandate by supporting independent research on health care issues and making grants to improve health care practice and policy. Support for this research was provided by The Commonwealth Fund. The views presented here are those of the authors and not necessarily those of The Commonwealth Fund or its directors, officers, or staff.

The mission of The Commonwealth

Fund is to promote a high performance

For more information about this study, please contact:

Julia Berenson, M.Sc. Research Associate The Commonwealth Fund jb@cmwf.org

To learn more about new publications when they become available, visit the Fund's Web site and register to receive email alerts.

Commonwealth Fund pub. 1600 Vol. 11

OVERVIEW

In the United States, low-income individuals and families experience substantial disparities in health care and health outcomes when compared with their more well-off counterparts. The recession, poor employment levels, and income trends of the past decade have undermined the ability of low-income individuals and families to maintain health insurance coverage, gain access to high-quality health care, and achieve health and well-being. It is imperative to find strategies and models of care that will eliminate health care inequities and close the health care divide.

Extending health insurance coverage is a necessary step in improving access to quality health care. Insurance coverage reduces financial barriers and facilitates access to a regular provider or usual source of care. Research by The Commonwealth Fund demonstrates that compared with people who are insured all year, people who lack health insurance are less likely to have a regular source

of care, are more likely to not seek treatment because of costs, are more likely to use fewer and less appropriate health services, are less likely to receive timely preventive and screening services, and are less likely to receive appropriate care for management of their health conditions.² For low-income adults, recent evidence shows that expanding access to public health insurance creates positive effects on access to care, health care use, financial strain, and health.³ Despite this, access to health insurance is unequal in the U.S.—low-income adults are most at risk of lacking health coverage through an employer and are more likely to be uninsured, especially for long periods of time. 4 Yet, broader insurance coverage and reduced financial barriers alone are not sufficient in guaranteeing access to high-quality care, especially for low-income individuals and families.

The Commonwealth Fund Commission on a High Performance Health System believes that a strong primary care foundation is critical to improving care for vulnerable populations and to achieving high performance in the U.S. health care system overall. Access to primary care is associated with improved quality of care, better health outcomes, and lower health care costs. Among low-income patients in particular, studies have demonstrated that access to primary care is associated with improved rates of receiving preventive care services, better management of chronic conditions, and reduced mortality.

The medical home is a promising model for expanding access to and delivering high-quality primary care. Medical homes provide patients with timely and enhanced access to care, partner with patients, manage existing health conditions, coordinate care across providers, and engage in continuous quality improvement. Patients with medical homes have better access to care, are more likely to receive recommended preventive services, and have chronic conditions that are better managed, compared with those without medical homes.⁸ Furthermore, early evidence shows this model of care can help to contain costs through reductions in unnecessary hospitalizations, emergency department use, and other acute care services. 9 For vulnerable populations that have substantially high rates of comorbidities, as well as personal and social factors

that adversely affect their health, medical homes can help to improve the quality of care and health outcomes. In 2007, a Commonwealth Fund study found that when adults had medical homes, racial and ethnic disparities were significantly reduced, if not eliminated. However, the combined effect of having both health insurance and a medical home on low-income populations is not yet well explored.

In this new analysis of the Commonwealth Fund 2010 Biennial Health Insurance Survey, we demonstrate that together health insurance and a medical home can dramatically reduce health and health care disparities. The analysis confirms that insurance coverage is critical to improve access to quality health care for low-income populations. When low-income adults with health insurance have medical homes. even greater gains are made and the gaps in health and health care between them and higher-income populations are significantly reduced. With health insurance and a medical home, low-income adults are nearly as likely as higher-income adults overall to receive recommended preventive services and rate their quality of their care as excellent or very good. Yet, study results also demonstrate that few low-income adults have insurance coverage and a medical home. The findings of the Biennial Health Insurance Survey affirm the importance of the Affordable Care Act, which has multiple provisions to expand access to health insurance coverage and promote the adoption and spread of health care delivery system improvements, including medical homes

FINDINGS

The Commonwealth Fund, along with other organizations, has worked to identify and develop a set of indicators that best captures the components of a medical home. ¹¹ In this brief, we define survey respondents as having a medical home if they reported the following: they have a regular provider or place of care, they experience no difficulty contacting their provider by phone, they believe their provider knows important information about their medical history, and their regular provider helps to coordinate care with other doctors (Appendix Table 1). We use patient self-reported

experiences, rather than provider or practice characteristics, to measure access to a medical home.

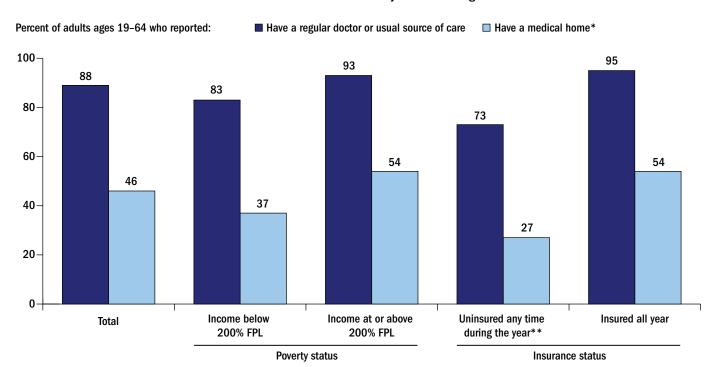
Results indicate that the majority of nonelderly adults (88%) have a regular doctor or usual source of care. More than three-fourths of adults (79%) who have a regular source of care can very or somewhat easily contact their providers by phone. Seventy-eight percent of adults who have a regular source of care always or often believe their doctor knows important information about their medical history. Yet, fewer adults (60%) report that their regular provider always or often helps to coordinate care with other providers. When all four characteristics of a medical home are combined, less than half (46%) of working-age adults—an estimated 85 million people—have a medical home.

Low-Income and Uninsured Adults Are Less Likely to Have a Regular Provider and Medical Home

The survey results highlight substantial differences in access to a regular provider and medical home between

people with and without insurance coverage and people with low and higher incomes. Adults with low incomes are at greater risk of not having a regular provider and medical home, compared with higher-income and insured adults (Exhibit 1). Nearly all adults (93%) with income at or above 200 percent of the federal poverty level (\$44,100 for a family of four in 2010) have a regular doctor or usual source of care, compared with 83 percent of adults with income below 200 percent of poverty. Similarly, over half (54%) of respondents with income at or above 200 percent of poverty have a medical home, compared with just over one-third (37%) of survey respondents with income below 200 percent of poverty (Exhibit 1). Lacking health insurance interferes with people's ability to have a regular source of health care or a medical home. Just three-quarters (73%) of uninsured adults had a regular doctor or usual source of care, compared with nearly all insured adults (95%). Similarly, while over half (54%) of insured adults had a medical home, only 27 percent of uninsured respondents had one.

Exhibit 1. Low-Income and Uninsured Adults Are Less Likely to Have a Regular Provider and Medical Home



Note: FPL refers to federal poverty level.

^{*} A composite of the following four indicators measures access to a medical home: 1) having a regular doctor or usual place of care; 2) availability of regular provider by phone; 3) patient-centeredness of care; and 4) care coordination.

Respondents who scored positive on all four indicators are considered to have access to a medical home.

^{**} Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined. Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

Low-Income and Uninsured Adults Experience Substantial Health Inequities

4

Decades of research has demonstrated that vulnerable populations are more likely to be in poor health and to experience worse health care outcomes. In particular, they are at higher risk of having multiple chronic health problems, mental illness, substance abuse, and disability as well as personal and social factors that adversely affect their health and act as barriers to accessing and benefiting from care.

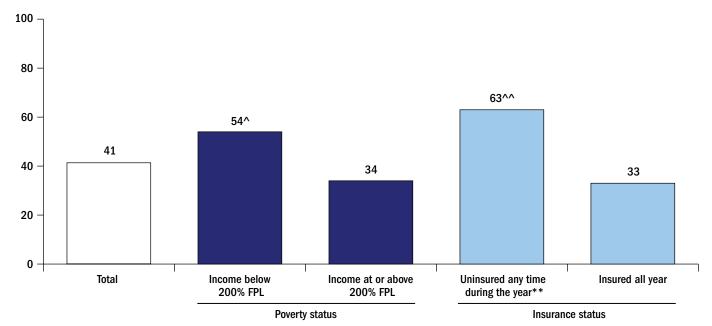
Results from the Commonwealth Fund 2010 Biennial Health Insurance Survey confirm that low-income and uninsured adults have dramatically worse health care experiences than their insured and higher-income counterparts. Overall, low-income and uninsured adults report higher rates of cost-related access problems, are less likely to be up-to-date with preventive care, and less often rate their quality of care as excellent or very good (Appendix Table 2).

Cost-related access problems. Small incremental changes in cost-sharing (e.g., copayments or

deductibles) can have a substantial negative effect on affordability and use of health care services, especially for low-income patients. In particular, evidence shows that low- and modest-income patients forgo or delay needed care when faced with cost-sharing that is high relative to their limited incomes. 12,13,14 The 2010 Biennial Health Insurance Survey asked respondents whether they had failed to pursue needed medical care in the past 12 months because of costs. Specifically, respondents were asked if, because of cost, they had not filled a prescription; skipped a medical test, treatment, or follow-up visit recommended by a doctor; did not go to a doctor or clinic when sick; or did not see a specialist when a doctor or the respondent thought it was needed. In total, just over four of 10 (41%) adults experienced one of these cost-related access problems. Low-income and uninsured adults were more likely to report problems getting needed health care because of costs (Exhibit 2). Fifty-four percent of adults with income below 200 percent of poverty reported having at least one cost-related access problem, compared

Exhibit 2. Low-Income and Uninsured Adults Report High Rates of Cost-Related Access Problems

Percent of adults ages 19-64 who reported any of four cost-related access problems*:



Notes: FPL refers to federal poverty level. Percentages are adjusted for age, sex, race, and health status.

^{*} Respondent had at least one of four access problems because of cost: did not fill prescription; skipped recommended test, treatment, or follow-up; had a medical problem, did not visit doctor/clinic; and did not get needed specialist care.

^{**} Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined.

[^] Significant difference compared with income at or above 200% FPL (p <0.05 or better).

 $^{^{\}wedge}$ Significant difference compared with insured all year (p <0.05 or better). Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

with 34 percent of adults with income at or above 200 percent of poverty. Nearly two-thirds (63%) of adults without health insurance reported they had failed to pursue needed medical care because of costs, compared with one-third (33%) of insured adults.

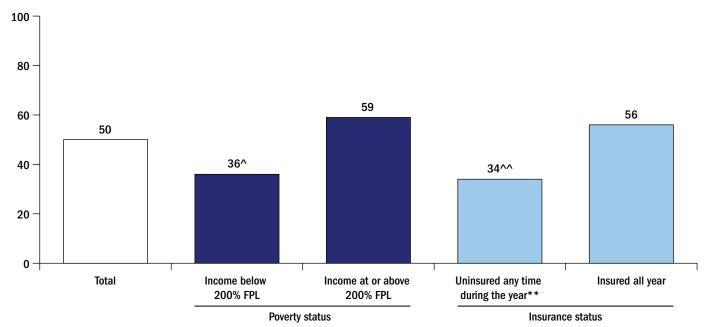
Preventive screenings. Many preventive screening tests, such as colonoscopies, have been shown to reduce disease morbidity and mortality. Yet, a recent analysis by the Centers for Disease Control and Prevention found that the percentage of people who receive screening for breast, cervical, and colorectal cancer is far below national targets, and the shortfall is especially high among uninsured adults.¹⁵ Results from the 2010 Biennial Health Insurance Survey show that nonelderly adults without health insurance coverage are also less likely to receive a set of recommended preventive services and screening tests, including blood pressure and cholesterol checks, Pap tests, colon cancer screens, and mammography. Only half of all adults ages 19 to 64 were up to date on this set of recommended preventive services and tests. In all cases, preventive

screening rates are lower for low-income and uninsured adults, compared with their higher-income and insured counterparts (Exhibit 3). About one-third (36%) of adults with income below 200 percent of poverty received all recommended preventive screenings, compared with 59 percent of adults with income at or above 200 percent of poverty. Only 34 percent of nonelderly adults without health insurance coverage were up to date on recommended preventive screenings, compared with 56 percent of insured nonelderly adults.

Rating quality of care. Patients' experiences and ratings of their quality of care have important implications for prevention and management of health conditions. According to the Commonwealth Fund 2009 Survey of Clinic Patients in New Orleans, adults who reported an excellent patient experience were more likely to receive reminders from their doctors to get recommended preventive services, and patients who received these reminders were also more likely to get recommended tests and screenings. 16 In addition, chronically ill adults with an excellent patient experience

Exhibit 3. Low-Income and Uninsured Adults Are Less Likely to be Up-to-Date with Preventive Care





Notes: FPL refers to federal poverty level. Percentages are adjusted for age, sex, race, and health status.

Pap test in past year for females ages 19–29, past three years age 30+; colon cancer screening in past five years for adults ages 50–64; mammogram in past two years for females ages 50-64; blood pressure checked in past year; cholesterol checked in past five years (in past year if has hypertension or heart disease).

^{*} Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined.

[^] Significant difference compared with income at or above 200% FPL (p <0.05 or better).

^{^^} Significant difference compared with insured all year (p <0.05 or better).

Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

were more likely to have their conditions well managed. To assess the quality of patients' clinical experiences, the 2010 Biennial Health Insurance Survey asked respondents to rate the quality of care they received. Less than half (47%) of all nonelderly adults rated the quality of their care as excellent or very good. However, the ratings for uninsured and low-income adults were far worse than for those with insurance or higher incomes (Exhibit 4). Thirty-five percent of adults with income below 200 percent of poverty rated the quality of their care as excellent or very good, compared with 54 percent of adults with income at or above 200 percent of poverty. Similarly, about one-quarter (27%) of nonelderly adults without health insurance coverage rated the quality of their care as excellent or very good, compared with 54 percent of insured nonelderly adults.

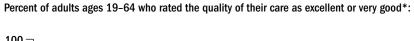
Together, Insurance Coverage and a Medical Home Reduce Disparities Among Low-Income Adults

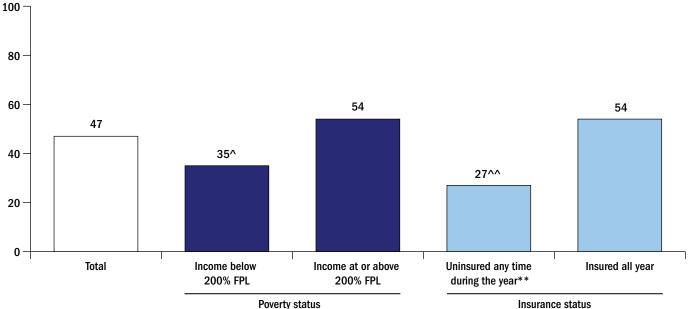
Together health insurance and a medical home can significantly reduce health and health care disparities

among low-income populations. Analysis of the 2010 Biennial Health Insurance Survey confirms that insurance coverage is critical to facilitate access to quality health care for low-income populations. Additionally, the results demonstrate that when low-income adults with health insurance also have a medical home, even greater gains are made and the gaps in health and health care between them and higher-income populations are significantly narrowed. With health insurance and a medical home, low-income adults are nearly as likely as higher-income adults to receive recommended preventive services and rate their quality of their care as excellent or very good. Likewise, when low-income adults have insurance coverage and a medical home, income disparities in cost-related access problems are eliminated.

Decreased rates of cost-related access problems. Low-income adults without health coverage are at-risk for experiencing access problems because of costs. Nearly three-quarters (73%) of low-income nonelderly respondents without health insurance reported having at least one of the four cost-related

Exhibit 4. Low-Income and Uninsured Adults Are Less Likely to Rate the Quality of Their Care as Excellent or Very Good





Notes: FPL refers to federal poverty level. Percentages are adjusted for age, sex, race, and health status.

^{*} Respondent rated the quality of care received in the past 12 months as excellent/very good.

^{**} Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined.

[^] Significant difference compared with income at or above 200% FPL (p <0.05 or better).

^{^^} Significant difference compared with insured all year (p <0.05 or better). Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

access problems. When insured, low-income adults have much lower rates of these problems. Yet, even more dramatic gains are made when low-income adults have both health insurance and a medical home (Exhibit 5). Among low-income adults with health coverage, only 35 percent of respondents with a medical home reported having cost-related access problems, compared with half (50%) of respondents without a medical home. Moreover, when they had both health insurance and a medical home, low-income respondents experienced the same level of such problems as their higher-income counterparts. Thirty-four percent of higher-income adults reported having cost-related access problems, as did 35 percent of low-income respondents with health insurance and a medical home (Appendix Table 3).

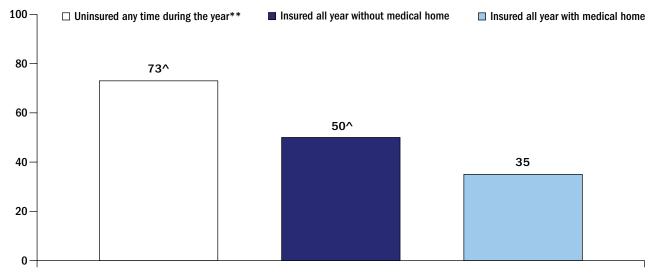
Improved rates of preventive services and screenings. Uninsured low-income adults receive preventive services and screenings at lower rates than insured higher-income individuals. About one-quarter (27%) of low-income respondents without health insurance reported receiving a recommended set of preventive services and screenings. Among low-income

adults, insurance coverage facilitates access to essential preventive services. When low-income adults have access to both health insurance and a medical home, their rates of receiving recommended preventive screenings and tests are even greater (Exhibit 6). Among low-income adults with health insurance, over half (52%) of respondents with a medical home reported receiving all recommended preventive screenings, compared with only 44 percent of respondents without a medical home. Furthermore, with health insurance and a medical home, low-income respondents are nearly as likely as higher-income respondents to receive essential preventive care services. Fifty-nine percent of higher-income adults reported receiving recommended preventive screenings and tests, as did 52 percent of low-income respondents with health insurance and a medical home (Appendix Table 3).

Higher quality of care. Low-income adults without health insurance are less likely to positively rate the quality of their care. About one-quarter (22%) of uninsured low-income respondents rated the quality of their care as excellent or very good. Access to insurance improves their rating of quality of care, but even

Exhibit 5. When Low-Income Adults Have a Medical Home and Insurance, Their Rates of Having Cost-Related Access Problems Decline





Notes: FPL refers to federal poverty level. Percentages are adjusted for age, sex, race, and health status.

Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

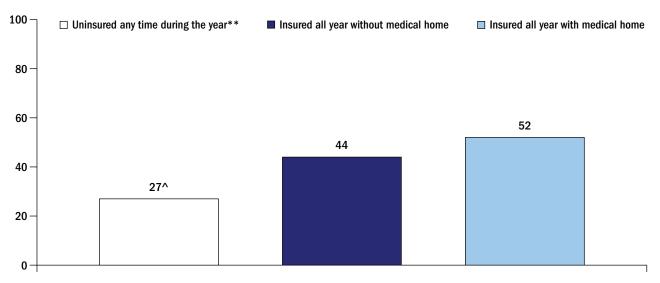
^{*} Respondent had at least one of four access problems because of cost: did not fill prescription; skipped recommended test, treatment, or follow-up; had a medical problem, did not visit doctor/clinic; and did not get needed specialist care.

^{**} Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined.

 $^{^{\}wedge}$ Significant difference compared with insured all year with medical home (p <0.05 or better).

Exhibit 6. When Low-Income Adults Have a Medical Home and Insurance, Their Rates of Getting Preventive Care Improve

Percent of adults ages 19-64 with income below 200 percent FPL who reported receiving preventive care screenings*:



Notes: FPL refers to federal poverty level. Percentages are adjusted for age, sex, race, and health status.

more positive gains are made when low-income adults have access to both health insurance and a medical home (Exhibit 7). Among low-income adults with health insurance, 54 percent of respondents with a medical home rated the quality of their care as excellent or very good, compared with only about one-third (34%) of respondents without a medical home. Low-income respondents with health coverage and a medical home are just as likely as higher-income respondents to rate the quality of their care as excellent or very good. Fifty-four percent of higher-income adults rated the quality of their care as excellent or very good, as did 54 percent of low-income respondents with health insurance and a medical home (Appendix Table 3).

HOW THE AFFORDABLE CARE ACT WILL HELP

Results of the Commonwealth Fund 2010 Biennial Health Insurance Survey demonstrate that health insurance and medical homes improve access to care, receipt of recommended preventive services, and rating of quality of care for low-income adults. When adults have both health insurance and a medical home, disparities between low- and higher-income populations are significantly reduced, if not eliminated. However, despite the promising effect, low-income and uninsured adults are significantly less likely to have health insurance and a medical home.

The survey findings affirm the importance of the Affordable Care Act which, when fully implemented, will expand access to health insurance coverage and promote the adoption and spread of innovative health care delivery system improvements, including the medical home model.

Insurance Coverage Expansion and Reducing Financial Barriers to Care

The Affordable Care Act includes numerous provisions that will significantly expand health insurance coverage, particularly to low-income patients. By 2020, an estimated 32 million adults under age 65 will gain insurance as a result of coverage expansions through these provisions, including:¹⁷

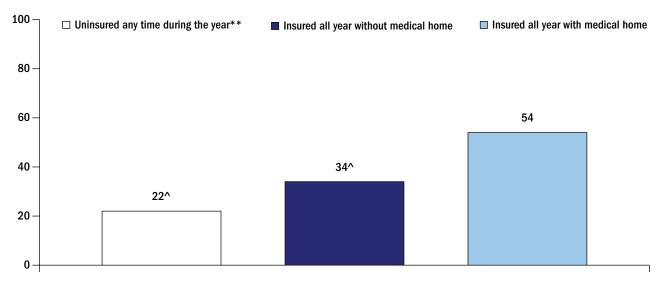
^{*} Pap test in past year for females ages 19–29, past three years age 30+; colon cancer screening in past five years for adults ages 50–64; mammogram in past two years for females ages 50–64; blood pressure checked in past year; cholesterol checked in past five years (in past year if has hypertension or heart disease).

^{**} Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined.

[^] Significant difference compared with insured all year with medical home (p <0.05 or better). Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

Exhibit 7. When Low-Income Adults Have a Medical Home and Insurance, Their Rating of Quality of Care Improves

Percent of adults ages 19-64 with income below 200 percent FPL who rated the quality of their care as excellent or very good*:



Notes: FPL refers to federal poverty level. Percentages are adjusted for age, sex, race, and health status.

- * Respondent rated the quality of care received in the past 12 months as excellent/very good.
- ** Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined.
- $^{\wedge}$ Significant difference compared with insured all year with medical home (p <0.05 or better).

Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

- extension of health coverage for dependent children up to age 26;
- expansion of Medicaid eligibility to include most low-income adults under age 65;
- creation of health insurance exchanges with affordable and subsidized coverage options for individuals and small businesses; and
- establishment of the "individual mandate" that requires nearly all legal U.S. residents to obtain health insurance.

Extension of coverage to young adults.

Since September 2010, the health care reform law has required plans that offer dependent coverage to allow children under age 26 to remain on or join their parents' policies. This provision is already making a difference for young adults, a group with high rates of uninsurance. A recent report by the U.S. Department of Health and Human Services found that in the first year of the law's implementation, 2.5 million young adults, ages 19 to 25, gained health insurance coverage between September 2010 and June 2011. 18

Expansion of Medicaid eligibility. In 2014,

the Affordable Care Act will extend Medicaid eligibility to nearly all residents under age 65 with incomes below 133 percent of the federal poverty level (\$29,327 for a family of four in 2010). As a result, an estimated 17 million low-income people are expected to become newly covered under Medicaid by 2020. Approximately 49 million adults under age 65—or 17 percent of the nonelderly U.S. population—will be covered by Medicaid in 2020.¹⁹

Creation of health insurance exchanges.

Health reform requires each state to establish a health insurance exchange by 2014, in which individuals and small business can purchase affordable and subsidized health insurance plans. It is estimated that an additional 22 million people will purchase coverage through exchanges by 2020.²⁰ In 2014, the Affordable Care Act will also make tax credits available to low- and modest-income people to offset the cost of premiums and out-of-pocket costs for plans sold through the exchanges for families earning from 100 percent of poverty to 400 percent of poverty (\$22,050 to \$88,200 for a family of four in 2010).

Establishment of the individual mandate.

An important part of the Affordable Care Act is the requirement (or "individual mandate") that everyone has health insurance coverage. Beginning in 2014, all U.S. citizens and legal residents will be required to maintain minimum coverage or face a penalty.

Results of the 2010 Biennial Health Insurance Survey show that broader insurance coverage and reduced financial barriers will not be enough to eliminate disparities and achieve equity for low-income populations. The health and socioeconomic needs of vulnerable populations can be met by medical homes, which provide patients with enhanced access to a team of health professionals that has the capacity to provide preventive care, identify health and social support needs, and manage complex health conditions.

Delivery System Reform: The Medical Home Model

The Affordable Care Act includes several provisions that test and promote the spread of delivery models, including the patient-centered medical home (Appendix Table 4). As discussed below, it will be critical to take advantage of and build upon these provisions to improve quality of care and strengthen the primary care foundation.

POLICY RECOMMENDATIONS

As coverage expansions and medical home demonstrations of the Affordable Care Act get under way, creating more opportunities that enhance access to patient-centered medical homes for low-income and other vulnerable individuals and families should be a priority. To achieve this, it will be important to consider policy opportunities to support the transformation of all primary care sites serving vulnerable patients to medical homes and to create financial incentives to support their spread and sustainability.

Public and Private Payers Can Provide Support to Safety-Net Primary Care Sites in Their Transformation to Patient-Centered Medical Homes

Practices serving vulnerable patients require upfront investments to build their capacity to function as

medical homes. While many community health centers have some medical home capacity, results from the 2009 Commonwealth Fund National Survey of Federally Qualified Health Centers found that only 29 percent demonstrate medical home capacity across multiple domains, including providing patients with same- or next-day appointments or telephone advice on clinical issues; generating lists of patients by diagnosis using a medical records system; tracking referrals and laboratory tests; and collecting and reporting data on clinical outcomes or patient satisfaction surveys.²¹ Also, smaller, nonaffiliated practices are less likely to have medical home capacity than are large sites integrated with hospitals or health systems.²² A national survey of small and medium-sized primary care practices in 2011 showed that approximately 22 percent of all sites were medical homes.²³ Creating opportunities to help such providers build capacity to function as medical homes should be a priority.

The U.S. Bureau of Primary Health Care, the agency that oversees all federally qualified health centers, has declared medical home transformation a priority and is offering support and incentives to promote office redesign. The agency is paying for technical assistance and application fees for 500 health centers to achieve medical home recognition through the National Committee for Quality Assurance. Another 800 health centers have received one-time supplemental funding of \$35,000 each to help implement processes that build medical home capacity. In addition, some state Medicaid agencies that have launched medical home programs have offered up-front lump-sum payments to support transformation. These transformation payments, which are relatively rare, offer an opportunity for primary care practices that serve vulnerable patients to receive financial support to improve office systems and build internal capacity.

Financial support is critical to undergo practice transformation—using teams to deliver care, enhancing access, and maximizing information technology—but money alone is not enough. The spread of medical homes requires a quality improvement infrastructure to help identify best practices, share lessons across primary care sites, and make effective tools, models, and strategies readily available to all providers.²⁴

Recognizing this, the Agency for Healthcare Research and Quality has awarded Infrastructure for Maintaining Primary Care Transformation grants that support state-level initiatives using "extension agents," which provide technical assistance to primary care practices to assist with primary care redesign. ²⁵ There are also other publicly available resources to help safety-net sites become patient-centered medical homes. For example, The Commonwealth Fund's Safety Net Medical Home Initiative, which is supporting 65 sites in five states to become medical homes, has published practice assessments, implementation guidelines, and other technical assistance resources for safety-net providers. ²⁶

Financial Incentives Are Needed to Support and Sustain Medical Home Activities

There are currently federal, state, and private initiatives to test new payment approaches to support the medical home model. The Affordable Care Act authorized the creation of the Center for Medicare and Medicaid Innovation, which has launched a number of medical home initiatives. In the Multi-Payer Advanced Primary Care Initiative, Medicare has joined Medicaid and private insurers in multipayer medical home initiatives in eight states. Another pilot, the Federally Qualified Health Center Advanced Primary Care Practice Demonstration, will provide \$6.00 per member per month for Medicare beneficiaries served by the 500 federally qualified health centers selected to participate in the program. Additionally, the Comprehensive

Primary Care Initiative is a multipayer program in which CMS will pay a risk-adjusted monthly care management fee averaging \$20 per member per month for the first two years and \$15 per member per month for years three and four to primary care practices who better coordinate care in seven selected markets across the country. After year two, market savings will also be available to these practices. Another provision of the Affordable Care Act offers states the option to receive an enhanced federal match rate to implement or expand "health home" programs for Medicaid patients with chronic conditions.²⁷ At the state level, 42 state Medicaid and CHIP programs are planning or implementing medical home pilots for low-income beneficiaries.²⁸ All the state medical home initiatives test an enhanced or revised payment approach.

The next step is to move beyond pilots toward a roll-out of a permanent program. As results from evaluations emerge, lessons about what works should be incorporated into the initiatives to improve their implementation, sustainability, and spread. This new analysis of the Commonwealth Fund 2010 Biennial Health Insurance Survey demonstrates that the medical home is a promising approach to improve quality of care and reduce disparities for low-income and uninsured adults. As the low-income population continues to grow in the current economic environment, it is imperative that all stakeholders act now to transform the primary care delivery system and promote wide-spread adoption of the medical home model, particularly for the most vulnerable.

METHODS

Data come from the Commonwealth Fund 2010 Biennial Health Insurance Survey, which was conducted by Princeton Survey Research Associates International from July 14 to November 30, 2010. The survey consisted of 25-minute telephone interviews in either English or Spanish and was conducted among a random, nationally representative sample of 4,005 adults ages 19 and older living in the continental United States. In all, 2,550 interviews were conducted with respondents on a landline telephone and 1,455 interviews were conducted on a cellular phone, including 637 with respondents who live in a household with no landline telephone access. The survey has an overall margin of sampling error of +/- 1.9 percentage points at the 95 percent confidence level. The landline portion of the survey achieved a 29 percent response rate and the cellular phone component achieved a 25 percent response rate. This study limits the analysis of the survey to respondents ages 19 to 64 (n=3,033).

NOTES

- S. R. Collins, C. Schoen, K. Davis, A. K. Gauthier, and S. C. Schoenbaum, A Roadmap to Health Insurance for All: Principles for Reform (New York: The Commonwealth Fund, Oct. 2007).
- ² S. R. Collins, M. M. Doty, R. Robertson, and T. Garber, Help on the Horizon: How the Recession Has Left Millions of Workers Without Health Insurance, and How Health Reform Will Bring Relief—Findings from The Commonwealth Fund Biennial Health Insurance Survey of 2010 (New York: The Commonwealth Fund, March 2011).
- A. Finkelstein, S. Taubman, B. Wright et al., *The Oregon Health Insurance Experiment: Evidence from the First Year*, Working Paper No. 17190 (Cambridge, Mass.: National Bureau of Economic Research, July 2011).
- ⁴ S. R. Collins, R. Robertson, T. Garber, and M. M. Doty, *The Income Divide in Health Care:*How the Affordable Care Act Will Help Restore
 Fairness to the U.S. Health System (New York: The Commonwealth Fund, Feb. 2012).
- ⁵ E. L. Schor, J. Berenson, A. Shih, S. R. Collins, C. Schoen, P. Riley, and C. Dermody, *Ensuring Equity: A Post-Reform Framework to Achieve High Performance Health Care for Vulnerable Populations* (New York: The Commonwealth Fund, Oct. 2011).
- ⁶ B. Starfield, L. Shi, and J. Macinko, "Contribution of Primary Care to Health Systems and Health," *Milbank Quarterly*, Sept./Oct. 2005 83(3):457–502.
- ⁷ L. Shi, J. Macinko, B. Starfield et al., "Primary Care, Race, and Mortality in U.S. States," *Social Science & Medicine*, July 2005 61(1):65–75.
- See: R. J. Reid, P. A. Fishman, O. Yu et al., "Patient-Centered Medical Home Demonstration: A Prospective, Quasi-Experimental, Before and After Evaluation," *The American Journal of Managed Care*, Sept. 2009 15(9):e71–e87; R. J. Reid, K. Coleman, E. A. Johnson et al., "The Group Health Medical Home at Year Two: Cost Savings, Higher Patient Satisfaction, and Less Burnout for Providers," *Health Affairs*, May 2010 29(5):835–43; R. J. Gilfillan, J. Tomcavage, M. B. Rosenthal et al., "Value and the Medical Home: Effects of Transformed Primary Care," *The American Journal*

- of Managed Care, Aug. 2010 16(8):607–14; and C. Schoen, R. Osborn, D. Squires, M. M. Doty, R. Pierson, and S. Applebaum, "New 2011 Survey of Patients with Complex Care Needs in 11 Countries Finds That Care Is Often Poorly Coordinated," *Health Affairs* Web First, Nov. 9, 2011.
- See: Reid, Fishman, Yu et al., "Patient-Centered Medical Home Demonstration," 2009; Reid, Coleman, Johnson et al., "Group Health Medical Home at Year Two," 2010; and K. Grumbach, T. Bodenheimer, and P. Grundy, *The Outcomes of Implementing Patient-Centered Medical Home Interventions: A Review of the Evidence on Quality, Access and Costs from Recent Prospective Evaluation Studies* (Washington, D.C.: Patient-Centered Primary Care Collaborative, 2009).
- A. C. Beal, M. M. Doty, S. E. Hernandez, K. K. Shea, and K. Davis, Closing the Divide: How Medical Homes Promote Equity in Health Care—Results from the Commonwealth Fund 2006 Health Care Quality Survey (New York: The Commonwealth Fund, June 2007).
- See Commonwealth Fund–related work to create medical home indicators: Beal, Doty, Hernandez, Shea, and Davis, *Closing the Divide*, 2007;
 C. Schoen, R. Osborn, M. M. Doty, M. Bishop, J. Peugh, and N. Murukutla, "Toward Higher-Performance Health Systems: Adults' Health Care Experiences in Seven Countries, 2007," *Health Affairs* Web Exclusive Oct. 31, 2007 26(6):w717–w734; and Schoen, Osborn, Squires, Doty, Pierson, and Applebaum, "New 2011 Survey of Patients with Complex Care Needs," 2011.
- W. G. Manning, J. P. Newhouse, N. Duan et al., "Health Insurance and the Demand for Medical Care: Evidence from a Randomized Experiment," *American Economic Review*, June 1987 77(3): 251–77.
- A. N. Trivedi, W. Rakowski, and J. Z. Ayanian. "Effect of Cost Sharing on Screening Mammography in Medicare Health Plans," *New England Journal of Medicine*, Jan. 24, 2008 358(4):375–83.
- L. Ku and V. Wachino, *The Effect of Increased Cost-Sharing in Medicaid* (Washington, D.C.: Center on Budget and Policy Priorities, July 2005).

- Centers for Disease Control and Prevention, "Cancer Screening—United States, 2010," MMWR Morbidity and Mortality Weekly Report, Jan. 27, 2012 61(3):41–45.
- M. M. Doty, M. K. Abrams, S. Mika, S. D. Rustgi, and G. Lawlor, Coming Out of Crisis: Patient Experiences in Primary Care in New Orleans, Four Years Post-Katrina—Findings from The Commonwealth Fund 2009 Survey of Clinic Patients in New Orleans (New York: The Commonwealth Fund, Jan. 2010).
- Congressional Budget Office, Updated Estimates for the Insurance Coverage Provisions of the Affordable Care Act, March 2012.
- B. D. Sommers, K. Schwartz, ASPE Issue Brief:
 2.5 Million Young Adults Gain Health Insurance
 Due to the Affordable Care Act (Washington, D.C.:
 Assistant Secretary for Planning and Evaluation,
 Dec. 14, 2011).
- ¹⁹ Congressional Budget Office, *Updated Estimates*, 2012.
- ²⁰ Ibid.
- M. M. Doty, M. K. Abrams, S. E. Hernandez, K. Stremikis, and A. C. Beal, Enhancing the Capacity of Community Health Centers to Achieve High Performance: Findings from the 2009 Commonwealth Fund National Survey of Federally Qualified Health Centers (New York: The Commonwealth Fund, May 2010).
- M. W. Friedberg, D. G. Safran, K. L. Coltin et al., "Readiness for the Patient-Centered Medical Home: Structural Capabilities of Massachusetts Primary Care Practices," *Journal of General Internal Medicine*, Feb. 2009 24(2):162–69.
- D. R. Rittenhouse, L. P. Casalino, S. M. Shortell et al., "Small and Medium-Size Physician Practices Use Few Patient-Centered Medical Home Processes," *Health Affairs*, Aug. 2011 30(8):1575–84.
- M. K. Abrams, E. L. Schor, and S. C. Schoenbaum, "How Physician Practices Could Share Personnel and Resources to Support Medical Homes," *Health Affairs*, June 2010 29(6):1194–99.
- Agency for Healthcare Research and Quality, IMPaCT (Infrastructure for Maintaining Primary Care Transformation) Award Recipients, Oct. 2011.

- The Commonwealth Fund, Qualis Health, and MacColl Institute for Healthcare Innovation at the Group Health Research Institute. *The Safety Net Medical Home Initiative*. Available at: http://www.commonwealthfund.org/Resources/ 2010/The-Safety-Net-Medical-Home-Initiative.aspx.
- PPACA §2703 provides states with the option to enroll Medicaid beneficiaries with chronic conditions into a health home composed of a team of health professionals that provide a comprehensive set of medical services, including care coordination.
- National Academy for State Health Policy, *Medical Home States*, available at: http://www.nashp.org/med-home-map.

Appendix Table 1. Access to a Medical Home by Insurance and Poverty Status (ages 19-64) (unadjusted percentages)

		Poverty	status	Insurance status		
	Total	Income below 200% FPL	Income at or above 200% FPL	Uninsured any time during the year*	Insured all year	
Unweighted n	3,033	1,125	1,573	827	2,206	
Total (millions)	183,594	70,315	93,555	51,934	131,661	
Percent distribution (%)	100%	37%	52%	27%	73%	
Regular provider						
Has regular doctor	75	62 ^a	85	47 ^b	87	
No regular doctor, but has usual place of care	13	21 ^a	8	26 ^b	8	
No regular doctor or no usual place of care	12	18 ^a	7	27 ^b	5	
Availability of regular provider by phone						
Ability to telephone your doctor's practice during regular practice hours about a health problem and get the answers you need:						
Very easy	44	38 ^a	48	28 ^b	48	
Somewhat easy	35	35 ^a	35	35 ^b	35	
Somewhat difficult	13	17 ^a	12	22 ^b	11	
Very difficult	5	8 ^a	3	11 ^b	3	
Never tried	2	2 ^a	2	2 ^b	1	
Patient-centeredness of care						
How frequently does your regular doctor or medical staff you see know important information about your medical history?						
Always	52	48 ^a	56	39 ^b	57	
Often	26	22 ^a	28	24 ^b	26	
Sometimes	15	21 ^a	11	23 ^b	12	
Rarely or never	6	8 ^a 4		12 ^b	4	
Care coordination						
How frequently does your regular doctor or someone in your doctor's practice help coordinate or arrange the care you receive from other doctors and places?						
Always	38	35 ^a	40	28 ^b	41	
Often	22	22 ^a	23	23 ^b	22	
Sometimes	19	21 ^a	17	22 ^b	18	
Rarely or never	15	17 ^a	13	22 ^b	12	
Never see other doctors/place	5	4 ^a	6	4 ^b	5	
Indicators of medical home						
Medical home	46	37 ^a	54	27 ^b	54	
No medical home	54	63 ^a	46	73 ^b	46	

Note: FPL refers to federal poverty level.

^{*} Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined.

* Significant difference compared with income at or above 200% FPL (p <0.05 or better).

* Significant difference compared with insured all year (p <0.05 or better).

* Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

Appendix Table 2. Receipt of Preventive Screenings and Quality of Care by Poverty Status and Insurance Status (ages 19-64) (adjusted percentages)

		Poverty :	status^	Insurance status#		
	Total	Income below 200% FPL	Income at or above 200% FPL	Uninsured any time during the year*	Insured all year	
Unweighted n	3,033	1,125	1,573	827	2,206	
Total (millions)	183,594	70,315	93,555	51,934	131,661	
Percent distribution (%)	100%	37%	52%	27%	73%	
Preventive care						
Blood pressure checked (past year)	85	80 ^a	90	78 ^b	91	
Received mammogram in past two years (females age 50+)	72	52 ^a	80	47 ^b	78	
Received Pap test in past year (females 19–29), in past three years (females age 30+)	74	63 ^a	80	62 ^b	79	
Received colon cancer screening in past five years (age 50+)	54	40 ^a	59	39 ^b	57	
Cholesterol checked in past five years	70	63 ^a	79	61 ^b	78	
Received all preventive screenings**	50	36 ^a	59	34 ^b	56	
Access problems in past year						
Went without needed care in past year because of cost:						
Did not fill prescription	26	37 ^a	21	42 ^b	21	
Skipped recommended test, treatment, or follow-up	25	35 ^a	21	44 ^b	19	
Had a medical problem, did not visit doctor or clinic	26	36 ^a	36 ^a 20		18	
Did not get needed specialist care	18	27 ^a	13	34 ^b	12	
At least one of four access problems because of cost	41	54 ^a	34	63 ^b	33	
Quality of care						
How would you rate the quality of health care you have received in the past 12 months?						
Excellent/Very good	47	35 ^a	54	27 ^b	54	

Note: FPL refers to federal poverty level.

[^] Adjusted for age, sex, race, and health status.

[#] Adjusted for age, sex, race, health status, and poverty status.

^{*} Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined.

^{**} Received all preventive screenings includes: Pap test in past year for females ages 19-29, past three years age 30+; colon cancer screening in past five years for adults ages 50-64; and mammogram in past two years for females ages 50-64; blood pressure checked in past year; cholesterol checked in past five years (in past year if has hypertension or heart disease).

a Significant difference compared with income at or above 200% FPL (p <0.05 or better).

b Significant difference compared with insured all year (p <0.05 or better).

Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

Appendix Table 3. Receipt of Preventive Screenings and Quality of Care by Poverty, Insurance, and Medical Home Status (ages 19-64) (adjusted percentages)

	Poverty status^							
	Income below 200% FPL				Income at or above 200% FPL			
		Uninsured	Insured all year			Uninsured	Insured all year	
	Total	any time during the year*	No medical home	Medical home	Total	any time during the year*	No medical home	Medical home
Unweighted n	1,125	526	303	296	1,573	196	590	787
Total (millions)	70,315	33,812	18,500	18,003	93,555	11,971	35,463	46,120
Percent distribution (%)	37%	47%	27%	26%	52%	12%	38%	50%
Preventive care								
Blood pressure checked (past year) Received mammogram in past two years	80 ^a	73 ^b	87	89	90	84 ^b	91	94
(females age 50+)	52 ^a	39 ^b	77	73	80	51 ^b	81	85
Received Pap test in past year (females 19–29), in past three years (females age 30+)	63 ^a	55 ^b	76	74	80	72	84	83
Received colon cancer screening in past five years (age 50+)	40 ^a	37	41	50	59	37 ^b	56	64
Cholesterol checked in past five years	63 ^a	52 ^b	66	73	79	65 ^b	81	85
Received all preventive screenings**	36 ^a	27 ^b	44	52	59	38 ^b	59	65
Access problems in past year Went without needed care in past year because of cost:								
Did not fill prescription Skipped recommended test, treatment, or	37 ^a	54 ^b	30	25	21	36 ^b	24 ^b	12
follow-up Had a medical problem, did not visit doctor	35 ^a	52 ^b	30 ^b	17	21	40 ^b	26 ^b	11
or clinic	36 ^a	54 ^b	28 ^b	17	20	43 ^b	23 ^b	11
Did not get needed specialist care	27 ^a	43 ^b	21 ^b	11	13	26 ^b	18 ^b	6
At least one of four access problems because of cost	54 ^a	73 ^b	50 ^b	35	34	55 ^b	38 ^b	22
Quality of care How would you rate the quality of health care you have received in the past 12 months?								
Excellent/Very good	35 ^a	22 ^b	34 ^b	54	54	29 ^b	48 ^b	70

Note: FPL refers to federal poverty level.

Source: The Commonwealth Fund Biennial Health Insurance Survey (2010).

[^] Adjusted for age, sex, race, and health status.

^{*} Because of small sample size, "Insured now, time uninsured in past year" and "Uninsured now" are combined.

^{**} Received all preventive screenings includes: Pap test in past year for females ages 19-29, past three years ages 30+; colon cancer screening in past five years for adults ages 50-64; and mammogram in past two years for females ages 50-64; Blood pressure checked in past year; cholesterol checked in past five years (in past year if has hypertension or heart disease).

Significant difference compared with income at or above 200% FPL (p < 0.05 or better).

b Significant difference compared with insured all year and medical home (p <0.05 or better).

Appendix Table 4. Select Federal Activities to Promote Medical Homes

Agency and program	Description
Centers for Medicare and Medicaid Services (CMS)	Section 3021 of the Affordable Care Act authorized the creation of the Center for Medicare and Medicaid Innovation (The Innovation Center), a new agency that will test and disseminate innovative payment and delivery system models. The Innovation Center has launched at least two initiatives that promote medical home for low-income beneficiaries:
Medicaid Innovation	 Multi-Payer Advanced Primary Care Initiative. Medicare has joined Medicaid and private insurers in eight state, multipayer medical home pilots (Maine, Michigan, Minnesota, New York, North Carolina, Pennsylvania, Rhode Island, and Vermont). For the next three years, CMS will pay an enhanced payment for Medicare beneficiaries served by the primary care sites participating in each state's demonstration. CMS will evaluate the impact on both quality and cost. Federally Qualified Health Center (FQHC) Advanced Primary Care Practice Demonstration. 500 FQHCs in 44 states have been selected to receive an additional \$6.00 per Medicare beneficiary per month for three years. The participating FQHCs will receive technical assistance for the practice transformation activities required to become medical homes. Comprehensive Primary Care Initiative. Medicare will align with commercial and state health insurance plans and offer bonus payment to primary care practices that better coordinate care for their patients. CMS will pay a risk-adjusted, monthly care management fee averaging \$20 per member per month for the first two years and \$15 per member per month for years three and four. After year two, market savings will also be available to these practices. CMS has selected seven markets to participate, including: Arkansas, Colorado, New Jersey, and Oregon, Capital District-Hudson Valley (New York), Cincinnati-Dayton (Ohio), and Greater Tulsa (Oklahoma). Approximately 75 primary care practices within each designated market will be selected to join in this initiative.
CMS Health Homes for Medicaid Beneficiaries with Chronic Conditions	Section 2703 of the Affordable Care Act offers states the option to receive an enhanced federal match rate for expanding or implementing "health home" programs for Medicaid beneficiaries with chronic conditions. Health homes are designated primary care providers who work with teams of health professionals to provide a range of coordination services that encompass medical, behavioral health, and social supports needed by a beneficiary with chronic conditions. States that establish health homes may receive up to 90 percent federal matching funds for the coordination services for up to two years.
	As of April 2012, a six State Plan Amendments from four states were approved (Rhode Island, Missouri, New York, and Oregon). In addition, 15 planning grants have been awarded to states to help prepare State Plan Amendments.
Health Resources and Services Administration (HRSA)	The BPHC offers one-time upfront supplemental funding of \$35,000 per health center to help implement processes that build medical home capacity. 800 health centers across the country have been awarded these supplemental funding to build medical home capacity.
Bureau of Primary Health Care (BPHC)	In addition, the BPHC is paying application fees for the 500 health centers participating in the Innovation Center's FQHC Advanced Primary Care Demonstration to undergo National Committee for Quality Assurance (NCQA) medical home recognition. Each health center is expected to achieve NCQA Level III recognition at the end of the three years.
Agency for Healthcare Research and Quality Infrastructure for Maintaining Primary Care	AHRQ has awarded IMPaCT grants to four states (New Mexico, North Carolina, Oklahoma, and Pennsylvania). These grants support the pilot-testing of state-level primary care extension center programs that use "extension agents" in small and mid-sized independent primary care practices to assist with primary care redesign and transformation.
Research and Quality Infrastructure for	support the pilot-testing of state-level primary care extension center programs that use "extension agents" in sm

^a According to correspondence with National Academy for State Health Policy on April 27, 2012. Source: Authors' analysis.

ABOUT THE AUTHORS

Julia Berenson, M.Sc., is research associate to The Commonwealth Fund's executive vice president for programs. In this role, she provides written, analytical, and research support to the executive vice president for programs and program staff. Before joining the Fund, Ms. Berenson was a program associate at the Center for Health Care Strategies, where she worked on initiatives that enhance the organization, financing, and delivery of health systems aimed at improving the quality of care and reducing disparities among Medicaid beneficiaries. Ms. Berenson received a master's degree in health policy, planning, and financing jointly awarded by the London School of Economics and the London School of Hygiene and Tropical Medicine.

Michelle McEvoy Doty, Ph.D., is vice president of survey research and evaluation for The Commonwealth Fund. She has authored numerous publications on cross-national comparisons of health system performance, access to quality health care among vulnerable populations, and the extent to which lack of health insurance contributes to inequities in quality of care. She received her M.P.H. and Ph.D. in public health from the University of California, Los Angeles.

Melinda K. Abrams, M.S., vice president at The Commonwealth Fund, directs the Patient-Centered Coordinated Care program. Since coming to the Fund in 1997, Ms. Abrams has worked on the Fund's Task Force on Academic Health Centers, the Commission on Women's Health, and, most recently, the Child Development and Preventive Care program. She serves on the board of managers of TransforMED, the steering committee for the American Board of Internal Medicine's Team-Based Care Task Force, and three expert panels for the Agency for Healthcare Research and Quality's Primary Care Transformation Initiative, and is a peer reviewer for the Annals of Family Medicine. Ms. Abrams holds an M.S. in health policy and management from the Harvard School of Public Health.

Anthony Shih, M.D., M.P.H., is executive vice president for programs at The Commonwealth Fund. In this role, Dr. Shih serves as a member of the Fund's executive management team and is responsible for all of the Fund's grants programs. Previously, he served as chief quality officer and vice president of strategy for IPRO, one of the nation's leading independent, nonprofit health care quality improvement organizations. Dr. Shih is board-certified in public health and preventive medicine, and holds an M.D. from the New York University School of Medicine and an M.P.H. from the Columbia University Mailman School of Public Health.

Editorial support was provided by Deborah Lorber.

