More patients under federal health reform with fewer primary care doctors spell trouble.

By Laura Tobler

By 2019, 32 million of those currently uninsured will have health care coverage.

But insured or not, they're going to have trouble finding a doctor.

Passage of national health reform elevated the problem of the primary care doctor shortage that must be solved if federal health care reform is going to work, says Dr. Lori Heim, president of the American Academy of Family Physicians.

"If current trends continue, there will be a shortage of about 40,000 family doctors by 2020," she says.

Primary care is delivered by physicians, nurse practitioners and physician assistants practicing family medicine, general internal medicine and general pediatrics. They provide care to prevent disease, maintain health, manage chronic disease, diagnose medical problems, refer patients to specialists and coordinate all medical care for a patient population.

Primary care has been described as the backbone of the nation's health care system. A strong primary care system provides accessible, cost-effective, high-quality care. Primary care clinicians work to keep people healthy, use fewer tests and spend less money than specialists, according to a large body of research.

Those with regular primary care receive more preventive services, are better at complying with their treatment, and have lower rates of illness and premature death than those without such care, research shows.

They also use emergency rooms and are hospitalized less often than those without primary care.

When Massachusetts enacted health reform legislation in 2006 that included coverage for the state's 550,000 uninsured, it was among the states with a very high ratio of total physicians to residents. Yet even with legislation in 2008 to address primary care physician shortages, the number of primary care doctors is still inadequate. A 2009 survey found 40 percent of family physicians no longer were accepting new patients, up from 30 percent before reform.

When patients were able to find a doctor, the average wait time for an appointment was more than 44 days, 29 days longer than in 2005. A report from the Massachusetts Medical Society concluded "current and long-term shortages in the physician labor markets will continue to deteriorate if not addressed."

"We will have the same problem in Florida, only worse," says Senator Durell Peaden, a retired general practitioner. "All 67 of our counties lack access to primary care."

There are not nearly enough primary care doctors graduating in Florida to meet the projected need, he says, and the situation is similar in most states.

Shrinking Supply

Fifty years ago, about half the doctors were in primary care practices. Today, the number has declined to about 31 percent. In 2000, only 14 percent of U.S. medical school graduates entered family medicine. Five years later, the number dropped to 8 percent and continued to fall until last spring when the number rose to 9 percent.

"This was the first time there has been an increase in this number in decades," says Heim. The increase, however, is not "even close to what is needed to meet the demand."

Not only are new medical graduates choosing specialties more often, but those currently working in primary care are retiring, or thinking about leaving the profession and advising others to steer clear of it. The Massachusetts survey found nearly 25 percent of responding physicians indicated they were contemplating leaving the profession.

Why? A major factor is the growing income gap between primary care and specialties.

"Compared to other countries, the United States has not valued primary care," says New Jersey Assemblyman Herb Conaway Jr., who is a physician, "and we are paying the consequences. Increased value on specialist care and a diminished role for primary care leads to a health care system that is more costly and less effective."
This isn't just a local issue, Conaway says. "When the population is unhealthy and bogged down by chronic disease, we lose our competitive edge globally."

Specialists often earn three times as much as primary care doctors. The average annual income for family physicians is $173,000 compared to $335,000 for oncologists and $419,000 for cardiologists.

"If you examine salaries for all people working in health care based on that person’s contact with a patient, you will see that those who work closest with patients are paid the least—and that is just the wrong way to go about it,” says Maryland Delegate Dan Morheim, who is a practicing physician in internal and emergency medicine. “This is apparent in the way that we pay primary care providers.”

Payment Reform

Generally, doctors are paid based on the number of patients they see, not on how good the care is. Doctors typically aren’t rewarded for providing good preventive care, managing care for people with chronic diseases, and preventing complications from those diseases.

"We need to figure out how to reallocate health care dollars. It’s not an easy thing to do because every dollar that is in the system right now goes into someone’s pocket, and they are motivated to keep it,” says Conaway.

Take Medicaid reimbursement, for example. Currently, Medicaid pays primary care doctors about 66 percent of the Medicare rate. The Affordable Care Act will increase that to equal Medicare payments in 2013 and 2014, using 100 percent federal funding for the change. Some doctors in areas with shortages will get a 10 percent Medicare bonus from 2011 to 2015 for primary care services under the act.

About 38 states are experimenting with programs that increase Medicaid reimbursement rates for primary care delivered in a “medical home.” That’s a setting where a medical team coordinates all aspects of primary and acute care with an emphasis on managing chronic disease.

Experts say increasing payment to attract more primary care doctors and encourage medical homes must go beyond Medicaid and include all health care purchasers to be successful, including private insurers, public programs and others.

Some states are already experimenting with this idea. In 2008, Minnesota lawmakers passed legislation that financially rewards providers who are certified as health care homes. They’re eligible for care coordination payments in addition to their typical reimbursement. Colorado, Iowa, Maine, Massachusetts, New Hampshire, New York, Pennsylvania, Rhode Island, Vermont and West Virginia have initiatives to encourage development of medical homes and reward high-quality primary care that involve public and private payers.

When young physicians complete medical school, they owe an average of $156,456, according to the Association of American Medical Colleges. Loan repayment and other financial incentives may encourage medical students to choose primary care.

Conaway believes “increasing the number of loans and decreasing the qualifying criteria to obtain a loan is part of the solution.” The Affordable Care Act includes additional money for training and education for the primary care workforce, including easing current criteria to qualify for loans. All states have some type of loan repayment program for physicians who practice primary care in an underserved area funded through a combination of federal and state money.

Geographic Disparity

Physicians in primary care practice are unequally distributed across the nation, leaving some states and communities, mostly rural and some urban, with an inadequate supply. Only 10 percent of physicians practice in rural America, many of them family doctors, despite the fact that nearly one-fourth of the population live in those areas.

Where doctors choose to practice is influenced by where they do their residency. The Affordable Care Act will create an additional 500 primary care residency slots by 2015 and allow more flexibility in where residents can be trained, such as community health centers. But that alone will not solve the problem. New medical graduates need to be encouraged to accept those slots to increase the primary care workforce.

"Research shows that we need to preserve the residents who train in our state because chances are they will choose to practice within 80 miles of where they did their residency,” says Peaden.

Florida built five new medical schools in the last 10 years to train doctors who would ultimately choose to stay in the state.

"Studies show that students from rural counties are four times more likely to practice medicine in rural areas than are those from metropolitan areas, and are even more likely to enter family medicine,” says Heim.

She adds that being married, having an interest in public service, attending a public medical school and getting first-hand experience in inner city, rural and underserved areas during medical school also increase a student’s chance of choosing primary care.

"If students are recruited from areas that are in dire need of physicians, they will have a greater tendency to return to that area,” Peaden says. He thinks states should invest in identifying those students and helping them succeed. In fact, some states have programs to do just that.

In 1991, West Virginia created one of the first "pipeline" training programs in the country to attract primary care doctors to rural areas. The law provides financial incentives to identify future medical students from rural areas and develop more rural training sites. The number of medical graduates in rural practice has increased dramatically there since 1999, at an average annual rate of 14.1 percent.

These kinds of primary care pipeline programs exist or are being developed in other states, including Alabama, Michigan, Minnesota, Montana, New Mexico, North Carolina, Pennsylvania, Tennessee and Washington.

Young doctors also “seek to balance their professional and personal lives,” says Heim. They are looking for more control over the number of hours they work. They want less on-call and weekend work, and the opportunity to hone their skills and collaborate with colleagues. This can be hard to accomplish for primary care doctors alone in a rural area.
Programs that allow time off for primary care doctors can keep them satisfied and in the field. The University of New Mexico in 1993 began providing primary care “substitute” doctors to relieve physicians in rural areas for vacation, more education or illness. And with new technology, the university also improved communication between primary care doctors and specialists when treating patients with chronic and complex diseases. The University of Washington has a similar program.

After high school graduation, it takes about 12 years to produce a primary care doctor—four years of undergraduate education, four years of medical school and three to four years of residency training. So increasing the number of primary care doctors is not a quick fix. In the meantime, nurse practitioners and physicians’ assistants may assume more responsibility for delivering primary medical care.

“I think it will take a real crisis to change the way this country values primary care,” says Conaway. “We are on the precipice of a crisis right now.”

**Nurse Practitioners as Leaders in Primary Care**

The Affordable Care Act authorizes $50 million for the operation of 10 nurse-managed primary care clinics in underserved areas. So far, $15 million has been released.

There are 250 nurse-led clinics across the country, many affiliated with schools of nursing. The act also provides $30 million to support nursing students enrolled full time in accredited, primary-care nurse practitioner and nurse midwifery programs.

Nurse practitioners play an important role in primary care today. Their role will increase as they take on more responsibility in meeting primary care needs driven by several factors, including an aging population, the growth of chronic disease and new patients insured under federal health reform. The need also will increase as patient-centered medical homes, nurse practitioner-led clinics, and retail or convenient care clinics expand.

Nurse practitioners are the fastest growing segment of primary caregivers. The number of primary care nurse practitioners is increasing at a rate of 9.44 percent per capita, compared to 1.17 percent for physicians. It is estimated that about 80 percent of the workforce is in a primary care setting.

“Nurse practitioners produce similar results when compared to physician-led primary care practices, but we continue to be a group of providers that are underutilized,” says Jan Towers, director of health policy and professional affairs at the American Association of Nurse Practitioners. The biggest contributor to this is “the hook to physicians,” she says, noting most states require nurse practitioners to have an arrangement with a physician.

Nurse practitioners in Alaska, Arizona, Idaho, Iowa, Maine, Montana, New Hampshire, New Mexico, Oregon, Washington and the District of Columbia can practice independently, although Maine requires they be supervised by a physician in the first two years of practice.

Controversy over the scope of practice for advanced practice nurses has grown over the years. The American Medical Association, a physician membership organization, supports the team-based model of providing medical care, but it does not believe the education and training for nurse practitioners is adequate to build the in-depth knowledge and ability to diagnose and treat patients in an autonomous primary care practice.

Another reason nurse practitioners are not used more is the inability to be reimbursed for services. To be reimbursed, nurse practitioners need to be included in all primary care initiatives in the state, and managed care organizations and health insurers need to credential them as primary care providers.

A law in Pennsylvania requires that nurse practitioners be reimbursed for primary care services. Massachusetts passed similar legislation after health reform was enacted in 2006.

**Bringing Primary Care Home**

A medical home organizes and delivers health care by a team of doctors, nurses and other health care providers. Medical homes focus on managing all aspects of care. As of July, at least 29 states had laws on medical homes and, as of early 2010, 22 had one or more public, private or public-private medical home pilot programs. The federal health reform law includes several provisions to support medical homes and allows Medicaid and Medicare to develop pilot projects.

- Doctors, nurses and other medical professionals manage all aspects of a patient’s care.
- Health information technology is essential in medical homes so health care providers can easily exchange information and monitor patients’ health.
- A health care team works in a coordinated, comprehensive and efficient way.
- Patients with several chronic diseases—10 percent of the population has multiple conditions that account for 70 percent of all health care spending—can often be better managed in a medical home than in alternative settings.

**Physician Assistants Extend Primary Care**

Physician assistants are often referred to as physician “extenders.” They are licensed to practice only under a physician’s supervision, easing workloads for physicians, allowing them to spend more time managing care for patients with complex needs.

Physician assistants are trained to conduct physical exams, diagnose and treat illnesses, order and interpret tests, guide preventive services and, in most states, write prescriptions. Research shows they improve patient satisfaction and lower the cost of care.
About 36 percent of physician assistants work in primary care areas, according to a 2009 census by the American Academy of Physician Assistants. While this percentage has dropped since 1996, the actual number of physician assistants has risen. In 1996, 29,400 physician assistants were in clinical practice with 15,000 working in primary care. In 2009, out of 75,000 physician assistants, 27,000 were in primary care.

To address the growing demand for primary care, the Affordable Care Act included provisions to support primary care training for physician assistants, who can be trained in a shorter period of time than physicians. In June, Health and Human Services Secretary Kathleen Sebelius said $32 million was available for the education and training of more than 600 new physician assistants in primary care.

Laura Tobler tracks primary care issues for NCSL.