

Improving our approach to preventive care

Many components of the chronic care model can be successfully applied to preventive care, evidence shows. Here's how to do more with the resources you have.

Gerald Liu, MD; Allen Perkins, MD, MPH; Lamar Duffy, MD
Department of Family Medicine, University of South Alabama, Mobile

✉ gliu@health.southalabama.edu

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PRACTICE RECOMMENDATIONS

› *Avoid scheduling annual visits exclusively for preventive care.* **A**

› *Institute simple practice changes to improve the preventive services you provide, such as implementing standing orders for influenza vaccines.* **A**

› *Adopt components of the chronic care model for preventive services wherever possible—using ancillary providers to remind patients to undergo colorectal cancer screening and recommending apps that support self-management, for example.* **A**

Strength of recommendation (SOR)

- A** Good-quality patient-oriented evidence
- B** Inconsistent or limited-quality patient-oriented evidence
- C** Consensus, usual practice, opinion, disease-oriented evidence, case series

For well over a century, the periodic health exam has been associated with the delivery of preventive services¹—a model widely accepted by physicians and patients alike. Approximately 8% of ambulatory care visits are for check-ups, and more than 20% of US residents schedule a health exam annually.²

Periodic health exams, however, do not result in optimal preventive care. Evidence suggests that important preventive services, such as dietary counseling, occur at only 8% of such visits; that just 10 seconds, on average, is devoted to smoking cessation; and that 80% of the preventive services patients receive are delivered outside of scheduled health exams.² Because physicians and patients alike understandably prioritize acute problems, any discussion of health maintenance issues during a periodic check-up is likely to occur despite the visit's agenda, not as part of it.³⁻⁷

Primary care physicians and practices are increasingly being held accountable for their performance on preventive measures. With that in mind, being familiar with evidence-based guidelines relating to the delivery of preventive services in ambulatory care settings, such as those developed by the US Preventive Services Task Force (USPSTF),⁸ is crucial. Identifying elements of the chronic care model that can be effectively applied to preventive care—and recognizing that the reactive acute care model is ineffective for both chronic illness and preventive services—is essential, as well.

Preventive care that's evidence-based

Good practice guidelines should have the following features, according to the Institute of Medicine:⁹

- **Validity.** Application would lead to the desired health and cost outcomes.
- **Reliability/reproducibility.** Others using the same data/interpretation would reach the same conclusion.

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- **Clinical applicability.** Patient populations are appropriately defined.
- **Clinical flexibility.** Known or generally expected exceptions are identified.
- **Clarity.** Guideline uses unambiguous language with precise definitions.
- **Multidisciplinary process.** Developed with the participation of all key stakeholders.
- **Scheduled review.** Periodically reviewed and revised to incorporate new evidence/changing consensus.
- **Documentation.** Procedures used in development are well documented.

The USPSTF guidelines are consistent with these attributes.⁸

Some brief interventions fail

Guidelines are useful as practice standards for establishing preventive care goals, but their existence alone does not ensure the delivery of high-quality preventive services in an office setting. One key factor is time. It is estimated that a primary care physician with an average-sized patient panel would require an additional 7.4 hours *per day* to achieve 100% compliance with all of the USPSTF recommendations.¹⁰

Counseling, in particular, is an intervention that may be more effective in theory than in practice. Evidence suggests that even when primary care providers are trained in preventive counseling (and many are not), many brief interventions are not effective at creating sustained behavior change or health improvement.¹¹

Others are effective

That's not to say that there's little that can be done. Use of standing orders for influenza vaccination is one example of an effective and easily implemented preventive measure that requires little or no additional physician time. Yet some doctors are resistant, fearing loss of control or lawsuits. In fact, the National Vaccine Injury Compensation Program specifically provides protection against vaccine-related malpractice claims.¹² A standing order for office staff to arrange a screening mammogram is another effective intervention; it has been shown to improve screening rates by as much as 30%.¹³

Lessons from chronic illness management

Chronic illness care and preventive care have much in common.¹⁴ Both acknowledge the need for proactive screening and counseling to bring about behavior change. In addition, both require ongoing care and follow-up, as well as depend on links to community resources. And finally, both are resource-intensive—too resource-intensive, some say, to be delivered in a cost-effective manner.

The Chronic Care Model has been proposed as a framework for improving preventive services (TABLE).^{15,16} Evidence suggests adopting some key components of chronic care can lead to significant gains in the delivery of preventive care, with the largest improvement seen when multiple components are used simultaneously.¹⁷⁻²⁰

■ **Self-management support.** A growing body of evidence shows that self-management activities are associated with improved outcomes.²¹ Instituting a peer support group for pregnant women at a federally qualified health center, for example, led to a 7% absolute risk reduction in preterm births.²²

Not all efforts to encourage self-management are effective, however, and evaluation is crucial to determine what works. In one large-scale trial, the use of patient reminder cards to facilitate a reduction in health risk behaviors such as tobacco use, risky drinking, unhealthy dietary patterns, and physical inactivity led to fewer health risk assessments being performed, fewer individual counseling encounters, and no change in these behaviors.²³

■ **Decision support.** Clinical decision support systems, which generate patient-specific evidence-based assessments and/or recommendations that are actionable as part of the workflow at the point of care, have been found to improve care.^{24,25} An example of this is a prompt that reminds the physician to discuss chemoprevention with a patient at high risk for breast cancer.

■ **Delivery system design.** The patient-centered medical home (PCMH) is a well-known example of a redesign of health care delivery.²⁶ Conversion to this model is associated with a small positive effect on preventive interventions.²⁷ However, the persistence of a fee-for-service payment system—which



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TABLE

Borrowing from the chronic care model to bolster preventive care^{15,16}

Component	Description	Examples
Self-management support	Emphasis on the central role that patients play in managing their own care	MyFitnessPal (myfitnesspal.com) Peer support groups (drop-in group office visits)
Decision support	Integration of evidence-based guidelines into daily clinical practice	UpToDate (www.uptodate.com) AHRQ's ePSS (epss.ahrq.gov/PDA)
Delivery system design	Focus on teamwork and an expanded scope of practice for team members to support preventive care	PCMH Standing orders Care coordinators
Clinical information systems	Information systems based on patient populations to provide relevant client data	MU2-compliant EHRs
Community resources/policies	Developing partnerships with community organizations that support and meet patients' needs	Transportation services Chronic illness homebound services Linguistically and culturally appropriate health education

AHRQ, Agency for Healthcare Research and Quality; EHRs, electronic health records; ePSS, electronic preventive services selector; MU2, Meaningful Use Stage 2; PCMH, patient-centered medical home.

does not include physician reimbursement for some of the added services incorporated into the PCMH—limits the implementation of the PCMH model.²⁸

Many practices are improving health care delivery by using nonphysicians for various tasks related to preventive care. Care managers, for example, typically have smaller caseloads and focus on reducing unnecessary treatment for patients with high-risk conditions, such as congestive heart failure, while patient navigators generally have less clinical expertise but more knowledge of community services.

In one study, practice-initiated phone conversations with nonphysicians increased colorectal cancer screening by up to 40%.²⁹ And in one pilot program, the use of ancillary providers led to an increase in colorectal cancer screening by as much as 123%.³⁰ The human touch seems to be key to the success of these interventions. Passive reminders, such as videos being shown on waiting room televisions, have not proven to be effective.³¹

■ **Clinical information systems.** Early on, the power of electronic health records (EHRs) to improve practices' delivery of preventive services was recognized. As early as

1995, the use of a reminder system to highlight such services during acute care visits was linked to improvements in counseling about smoking cessation and higher rates of cervical cancer screening, among other preventive measures.^{32,33} Overall, the use of EHRs alone has been shown to improve rates of preventive services by as much as 66%, with most practices reporting improvements of at least 20%.³⁴

Today, EHRs that are Meaningful Use Stage 2-compliant have the tools needed to improve care. Requirements include the ability to generate patient registries of all those with a given disease and to identify patients on the registry who have not received needed care.³⁵ To improve preventive care, registries should focus on the mitigation of risk factors, such as identifying—and contacting—patients with diabetes who are in need of, or overdue for, an annual eye exam.

Trials using the registry function, in combination with automated messaging to deliver targeted information to various patient groups (identified by the demographic information available from the EHR), are ongoing.

■ **Community resources.** Many clinicians have informal referral relationships

with community organizations, such as the YMCA. Physician practices that establish links to community resources have the potential to have a large effect on unhealthy behaviors. (See “Putting theory into practice: 2 cases” at right.) However, a systematic review found that, while evidence to support such connections is mainly positive, research is limited and further evaluation is needed.³⁶

The Practical Playbook (practicalplaybook.org)³⁷ developed by the deBeaumont Foundation, Duke Department of Community and Family Medicine, and the Centers for Disease Control and Prevention, offers concrete examples of how physician practices are linking with community resources to improve the health of the population. For example, Duke University’s “Just for Us” program provides in-home chronic illness care to 350 high-risk elderly individuals. The LATCH program connects thousands of Latino immigrants to health care services and culturally and linguistically appropriate health education classes.³⁷

Growing emphasis on quality

Systemic changes in the US health care system are occurring rapidly, with an emphasis on quality and improved outcomes. Many physicians are now required to submit data to external agencies for payment, and much of the data is grounded in preventive standards. Medicare’s Physicians Quality Reporting System requires that all Medicare providers provide data on preventive and chronic illness care. Rates of vaccination, obesity screening, and tobacco use screening are examples of preventive services that will be reported publicly on the Centers for Medicare & Medicaid Services’ Physician Compare Web site.³⁸

Physicians who work in accountable care organizations are required to meet quality standards on the delivery of certain preventive services, including breast cancer screening, colorectal cancer screening, influenza and pneumonia immunization, body mass index screening and follow-up, tobacco use screening and cessation intervention, screening for high blood pressure and follow-up, and screening for clinical depression and follow-up.³⁹ As patients discover that the Affordable Care Act mandates that preventive services be covered with no cost sharing, they

Putting theory into practice: 2 cases

CASE 1

Dominic B, a 53-year-old patient, has scheduled a visit for a cough that has persisted for 4 weeks. The patient is a nonsmoker, is married, and has no first-degree relatives with cancer. But when you review his chart before the visit, you note that he missed his 6-month check-up for hypertension and hyperlipidemia. In addition, your electronic health record (EHR) flags the fact that he has not undergone colorectal screening and that his immunizations are not current. Because you have standing orders in place, your medical assistant gives him a flu shot and a pamphlet providing information on colorectal cancer screening before you enter the room.

During the visit, Mr. B mentions that his father, age 82, recently had a heart attack. This event—reinforced by the postcards and phone messages he received from your office after he missed his 6-month follow-up—prompted him to reluctantly admit it was “time for a check-up.” You take the patient’s blood pressure (BP) and review his lipid panel (blood work was ordered prior to his visit) with him. He is relieved to know that he will not need to be on a statin and agrees to be screened for colorectal cancer using a sensitive stool study.

Before he leaves, the patient requests medication for erectile dysfunction—a problem he never reported before. You ask him to keep a diary and return in 2 months, and promise to discuss his erectile dysfunction at that time.

CASE 2

A review of your practice’s patient registry reveals that Gladys P, age 55, is behind on breast and cervical cancer screening. She has had only a few sporadic office visits, the last of which was for bronchitis 18 months ago. At that time, the patient’s systolic BP was 162 mm Hg. You told her you would recheck it in 6 weeks, but she failed to return for follow-up.

Ms. P smokes, but has no other chronic diseases and takes no medications. There is no record of a mammogram or Pap smear, and you don’t know whether she sees a gynecologist routinely. Your office contacts her and discovers that you are the only doctor she sees. The patient tells the medical assistant who placed the call that her car broke down but she has not had money to repair or replace it, so she has had no way to get to your office.

Your staff arranges for her to get a ride from a community volunteer group, first to the nearby hospital for a mammogram and then to your office, where you perform a Pap smear and address her elevated BP and smoking. You are rewarded for the counseling and preventive care with a letter and a bonus check from Ms. P’s insurance carrier, congratulating you on your quality improvement efforts.

are likely to become more receptive to physician attempts to provide them.^{40,41} **JFP**

CORRESPONDENCE

Gerald Liu, MD, 1504 Springhill Avenue, Suite 3414, Mobile, AL 36604-3207; gliu@health.southalabama.edu

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