

Removing barriers to better, safer care

Health literacy and patient safety:  
**Help patients understand**

Reducing the risk by designing a safer,  
shame-free health care environment



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**This patient safety monograph, *Reducing the risk by designing a safer, shame-free health care environment*, has been re-approved for CME credit through May 2012. Please read the following page for new instructions effective May 2009.**

*Reducing the risk by designing a safer, shame-free health care environment*

**Important Continuing Medical Education Information for Physicians**

**Effective May 2009**

**PLEASE NOTE THE NEW INSTRUCTIONS FOR CLAIMING CREDIT EFFECTIVE MAY 2009:**

Physicians may earn *AMA PRA Category 1 Credit*<sup>™</sup> by reading this patient safety monograph, *Reducing the risk by designing a safer, shame-free health care environment*. The estimated time to complete the activity is 2.5 hours. **Physicians must then complete the CME questionnaire (including both the evaluation and the post-test) provided at the back of this manual and submit it via mail or fax to:**

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515 N. State St.  
Chicago, IL 60654  
Fax: (312) 464-4142

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A certificate documenting your participation in the CME activity will be forwarded to you upon successful achievement of a score of at least 77% (10 out of 13 questions correct).

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### **Educational objectives**

The activity will enable physicians to:

- Define the scope of patient safety problems caused by low health literacy and the need to manage the risk they present
- Recognize the ethical and legal foundations for safe medical practices and patient-centered care
- Explain patient safety concepts and approaches utilized in designing safer practice environments
- Identify patient safety practices that reduce the risk of miscommunication and optimize the patient's ability to safely manage their own care
- Determine steps toward establishing a climate for change
- Identify tools and resources for creating safer practice environments
- Demonstrate how to utilize and implement these tools in a practice environment

### **Instructions for CME credit**

After completing this program, record your answers to the CME questions on the CME answer sheet provided.

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### **Intended audience**

This CME program is intended for clinical practitioners.

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# Letter from the American Medical Association Foundation president

The American Medical Association (AMA) and the AMA Foundation have been leaders in bringing health literacy issues into the mainstream. Nearly 10 years ago, the AMA became the first national medical organization to create a policy recognizing limited literacy as a barrier to effective medical diagnosis and treatment.<sup>1</sup> Following that, the AMA Foundation developed a range of significant health literacy initiatives.

The AMA has also led national physician efforts to measurably improve patient safety and quality of care. The AMA has partnered with the Institute for Healthcare Improvement to help prevent common in-hospital system errors, led efforts to pass the federal Patient Safety law and worked to ensure that law's implementation, and advanced other measures, including voluntary reporting systems with strong confidentiality protections. It also continues to convene the highly respected Physician Consortium for Performance Improvement to develop evidence-based performance measures to improve the quality of care.

Recently, the AMA began examining the issues of health literacy and patient safety together and found that the two are innately intertwined—one topic cannot be discussed without the other. Addressing health literacy should be an essential consideration of health care providers and their staff, and a crucial force for progress in improving patient safety.

Working together, the AMA and the AMA Foundation have created a variety of health literacy educational tools to provide a foundation for physicians to understand this topic and its impact on health.<sup>2</sup> These tools focus on what an individual physician can do during a patient encounter. Our next step is to explore what impact a physician can have on the larger health care system. We will be examining broader, systemwide communication practices in order to prevent errors at every point of the patient visit—from the time a patient schedules an appointment until the patient leaves the office.

This monograph updates previous health literacy materials with new supporting research, explores how ineffective communication and low health literacy combine to affect patient safety, provides tools to decrease communication-related adverse events, and helps physicians initiate changes toward a safer and shame-free practice environment. Limited health literacy is placing today's patients, providers and health care system at risk; changes to ensure safety must be undertaken.



Peter W. Carmel, MD  
AMA Foundation president, 2006–2007

# Development of a national health literacy agenda

- 1993: U.S. Department of Education publishes the first National Adult Literacy Survey
- 1997: AMA Council on Scientific Affairs establishes ad hoc committee on health literacy
- 1997: First National Health Literacy Conference sponsored by Pfizer Inc. and Center for Health Care Strategies
- 1998: AMA becomes the first national medical organization to adopt policy recognizing that limited patient literacy is a barrier to effective medical diagnosis and treatment
- 2000: AMA/AMA Foundation publishes the first Health Literacy Educational Kit
- 2000: Healthy People 2010 specifically states two health literacy objectives
- 2001: Institute of Medicine (IOM) publishes *Crossing the Quality Chasm*
- 2003: AMA begins training physicians and health care professionals with a Health Literacy Train-the-Trainer curriculum
- 2003: IOM publishes *Priority Areas for National Action*
- 2004: IOM publishes *Health Literacy: Prescription to End Confusion*
- 2004: Agency for Healthcare Research and Quality (AHRQ) publishes *Literacy and Health Outcomes*
- 2004: American College of Physicians Foundation makes health literacy the focus of its annual conferences
- 2004: Partnership for Clear Health Communication and the Ask Me 3™ Campaign is launched
- 2004: AHRQ and the National Institutes of Health offer the first health literacy grants from the government
- 2005: AMA/AMA Foundation convene a Health Literacy Patient Safety advisory panel
- 2005: America's Health Insurance Plans adopts health literacy program
- 2005: AMA and Blue Cross Blue Shield of America convene a White House Conference on Aging mini-conference on health literacy and health disparities
- 2005: American Academy of Pediatrics convenes a health literacy working group
- 2005: National Quality Forum publishes *Improving Patient Safety Through Informed Consent for Patients with Limited Health Literacy*
- 2005: National Quality Forum publishes *Improving Use of Prescription Medications: A National Action Plan*
- 2005: AMA Press publishes the first health literacy textbook, *Understanding Health Literacy: Implications for Medicine and Public Health*
- 2006: Joint Commission Resources convene an educational symposium, Health Literacy: The Foundation for Patient Safety, Empowerment, and Quality Health
- 2006: U.S. Department of Education publishes the 2003 National Assessment of Adult Literacy
- 2006: AMA/AMA Foundation convene two-day conference on health literacy and patient safety
- 2007: Joint Commission publishes a white paper on health literacy and patient safety

## Scope of the problem

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Patients' health and safety are at risk as they navigate the U.S. health care system. Negotiating the labyrinth of physician offices, medical and insurance forms, pharmacies, inpatient facilities and home health services requires patients be able to read, understand and make informed decisions based on information exchange at every step. It is usually assumed that patients and their caregivers have the ability to competently grasp this complicated health information. When they do not, they are at risk for errors that can result in adverse health outcomes.

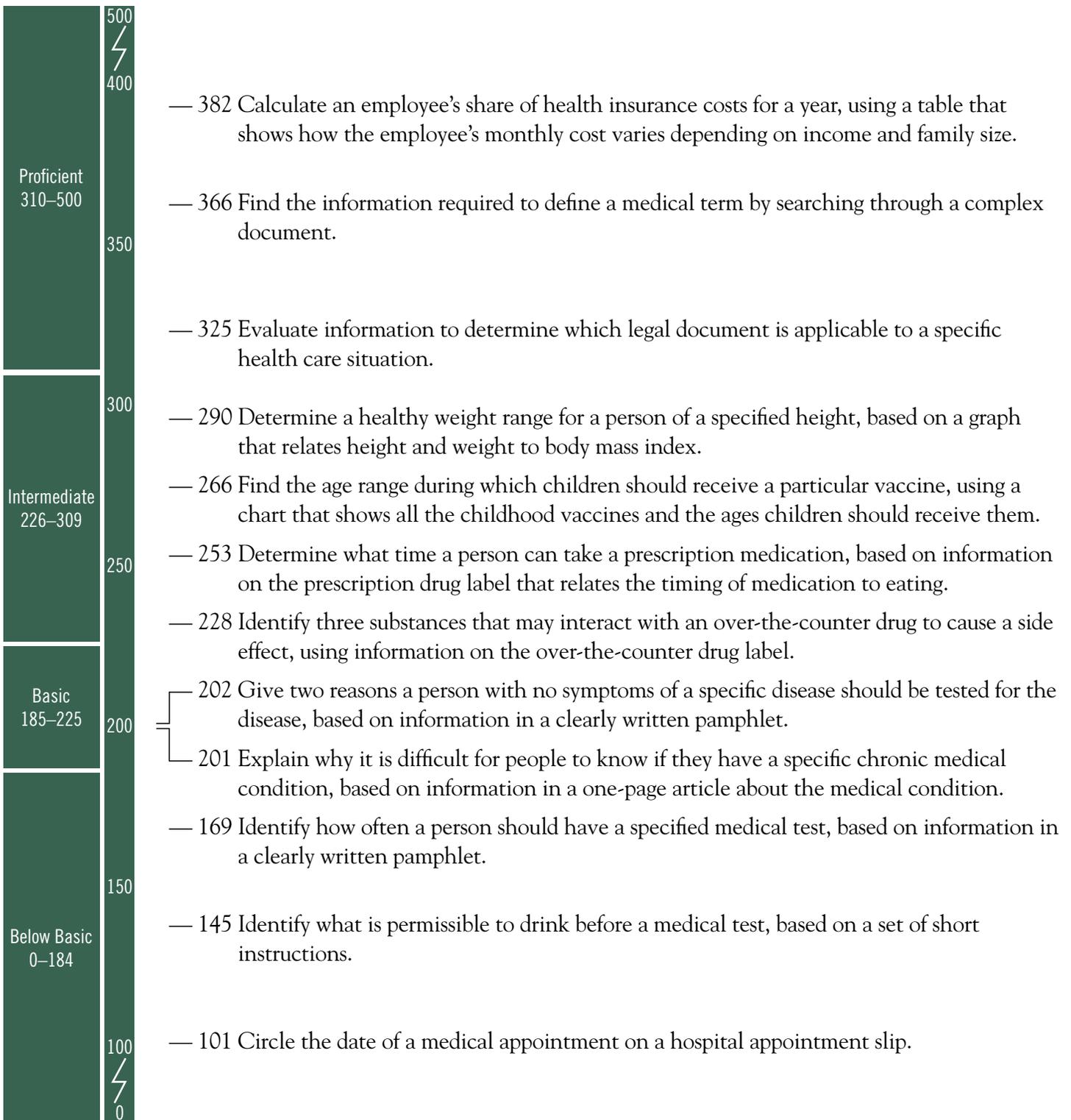
In a 2004 survey of 706 Iowa physicians, 45 percent reported having “experienced, witnessed or heard about errors in patient care that were a result of patient difficulties with reading and writing skills or understanding/communicating with medical personnel.”<sup>3</sup> Of the physicians reporting errors, 31 percent reported some physical pain, harm or damage, and 18 percent reported some emotional pain, harm or damage, resulted from these errors. Despite recognizing that communication-related errors occur and have significant effects, 43 percent reported they “tend to think patients understood the information given to them if the patients do not ask questions during a visit.”<sup>3</sup>

Low health literacy is ubiquitous, but poorly recognized. Health literacy is defined as “the degree to which individuals have the capacity to obtain, process and understand basic health information and services needed to make appropriate health decisions.”<sup>4</sup> The Institute of Medicine reports that as many as 90 million American adults may lack the literacy skills necessary to function in the health care system, and the average reading ability of U.S. adults is far exceeded by the reading level many health-related materials require.<sup>5</sup>

The U.S. Department of Education conducts a national survey every 10 years to assess the nature of literacy among American adults. In 2003, more than 19,000 people participated, chosen from across the country to represent the nation's adult population. The 2003 National Assessment of Adult Literacy (NAAL) included a specific health literacy assessment, based on participants' ability to perform 28 tasks in three health-related domains: clinical, prevention and navigation of the health care system.

NAAL health literacy scoring runs from 0 to 500 points and is divided into four groups—proficient, intermediate, basic and below basic. These categorizations may be misleading when compared to the tasks that can be accomplished by individuals in those groups. For example, close to 50 percent of adult Americans scored below 253 and could not correctly “determine what time a person can take a prescription medication, based on information on the prescription drug label that relates the timing of medication to eating”<sup>6</sup> (figure 1). Most physicians would consider that level of comprehension inadequate for any patient to manage his or her own care safely, yet it is considered an “intermediate” literacy skill. It is clear from these findings that populations reading at basic and below basic levels may face serious problems understanding average health care information materials.

**Figure 1. Difficulty of selected health literacy tasks: 2003**



Note: The position of a question on the scale represents the average scale score attained by adults who had a 67 percent probability of successfully answering the question. Only selected questions are presented. Scale score ranges for performance levels are referenced on the figure.

Source: Kutner M, Greenberg E, Jin Y, Paulsen C. *The Health Literacy of America’s Adults: Results from the 2003 National Assessment of Adult Literacy*. NCES 2006-483. Washington, DC: National Center for Education Statistics, US Department of Education; 2006.

Literacy level, language proficiency and emotional state all affect patients' ability to navigate the health care system, while time constraints, financial pressure, and inadequate awareness and training to address the

problem of low health literacy can hinder health care providers' ability to guide the way. Low health literacy presents a risk to patients, providers and the U.S. health care system as a whole (figures 2 and 3).

## Figure 2. Low health literacy and increased risk of harm

### How the patient is at risk

Physical harm may result from behaviors often categorized as nonadherent:

- Not filling or refilling a prescription<sup>7</sup>
- Inappropriate dosing or timing of a medication<sup>8,9</sup>
- Failure to recognize effects of inappropriate dosing, side effects or drug interactions<sup>10,11</sup>
- Failure to take action needed for evaluation, treatment or follow-up<sup>12,13,14</sup>

Emotional harm may result from shame, stress, frustration, confusion, worry and poor self-esteem associated with:

- Efforts to conceal reading difficulties<sup>15</sup>
- Being asked to complete tasks outside one's comfort zone<sup>16</sup>
- Feeling unsafe or unwelcome<sup>15,17</sup>
- Failure to seek care<sup>17</sup>

Economic harm may result from:

- Repeat visits, tests or procedures<sup>21</sup>
- Unnecessary or inappropriate medication regimens<sup>7</sup>
- Poor preparation and cancellation for evaluative studies<sup>21</sup>
- Use of higher and perhaps more costly levels of care<sup>18,19</sup>
- Lost earnings and job productivity<sup>20</sup>
- Transportation and child care costs

### How the health care professional is at risk

Inefficiency, waste, financial repercussions and liability are harmful to physicians and their colleagues in allied health professions, personally and professionally. Examples of inefficiency, waste and financial repercussions include:

- Interruptions and callbacks to clarify instructions
- Staff time to answer common questions about information repeatedly presented in difficult to understand formats
- Rescheduling missed appointments, tests and procedures for which patients did not understand how to prepare properly<sup>21</sup>
- Repeated office visits for unchanged or worsened conditions because patients did not understand previously prescribed or recommended treatment<sup>7</sup>
- Lost profits from missed appointments
- Patients who do not understand or who feel overwhelmed by forms, or an unapproachable office or care environment<sup>15</sup>:
  - May not return for follow-up
  - May choose a different provider
  - May suspend care until it becomes emergent

Liability risks include:

- A growing number of malpractice cases have been settled in favor of patients who were not appropriately informed about medical decisions.
- Poor communication or miscommunication between physician and patient is the leading reason for patient dissatisfaction, which increases the risk for lawsuits.<sup>22</sup>
- Health care professionals may be held liable for errors due to miscommunication and lack of patient understanding that result in harm to patients.<sup>23</sup>
- Patients who miss appointments may have a viable lawsuit if they can prove their failed appointment resulted in harm due to a doctor's unclear,

inadequate, or omitted instructions and/or advice.<sup>24</sup>

- Risk managers advise physicians to assess communication success and patient understanding in those who miss appointments, are not meeting treatment goals or are nonadherent to recommended treatment,<sup>24</sup> and recommend that these efforts be documented in the medical chart.<sup>25</sup>

### How the health care system is at risk

Health care today comprises a complex, interconnected array of populations, providers, payors and organizations. Ever increasing pressures and fragmentation are putting the system at risk.

#### Demographic changes

Patient populations include more elderly patients with:

- Multiple chronic conditions<sup>26,27</sup>
- Numerous prescription drugs<sup>28,29</sup>
- Higher likelihood to have low health literacy<sup>30,31</sup>

Patient populations include more minorities:

- Growing numbers of Americans with limited English proficiency<sup>32</sup>
- More likely to have lower health literacy<sup>30</sup>
- When experiencing language barriers, less likely to have a usual source of care, at increased risk for nonadherence to medication, less likely than others to keep follow-up visits and have higher rates of hospitalization<sup>33,34</sup>

Health care delivery processes:

- Recovery and self-management increasingly occur in the home<sup>35</sup>
- Treatment and self-management regimens growing more complex<sup>35</sup>
- Care frequently managed by numerous professionals<sup>29</sup>
- Patients viewed as primary information conduits between all health care professionals<sup>29</sup>

## Figure 3. Changes in the health care system

	35 years ago	Today
<b>Treatment of acute myocardial infarction</b>	Four to six weeks bed rest in hospital	Two to four days in hospital
<b>Available Rx drugs</b>	650	More than 10,000
<b>Treatment of new onset diabetes</b>	Three weeks in hospital; two hours a day of diabetic education classes	Outpatient; up to three hours diabetic education classes; written materials; internet; telemedicine
<b>Treatment of asthma</b>	Theophylline	Inhalers with spacers; controller versus rescue medications; peak flow monitoring; tapering steroids; trigger avoidance

# Part I: Background on the connection between health literacy and patient safety

## The impact of low health literacy on patient safety

Learning objective: Define the scope of patient safety problems caused by low health literacy and the need to manage the risks they present.

### Communication, confusion, error

Communication problems are the most common cause of medical errors.<sup>39</sup> The Joint Commission (formerly the Joint Commission on Accreditation of Healthcare Organizations) conducts root cause analyses to determine contributing factors to voluntarily reported sentinel events (deaths or permanent injury). Root cause analysis is a structured process for identifying the causal or contributing factors underlying adverse events or other critical incidents.<sup>40</sup> Communication problems have been identified as the primary root cause of 68 percent of nearly 3,000 reported sentinel events.<sup>41</sup> Many of these are provider-to-provider communications during care processes, but others are provider-to-patient and patient-to-provider communications about information needed to ensure patient understanding.

As self-care demands on patients increase, so does the importance of clear communication between the health care community and patients. Hospital stays have shortened,<sup>42</sup> the average number of medications prescribed has increased<sup>43</sup> and the increasing prevalence of chronic diseases has made the system heavily dependent on the ability of patients and their caregivers to discuss concerns, report significant findings and manage their care.<sup>44</sup> Yet this shift has not been matched by the adoption of communication techniques to ensure understanding and optimize patient safety.

## Patient's view of the care environment

### I want to:

- See my doctor and nurse
- Feel better

### You want me to do WHAT?

- Make and keep appointments
- Give medication history
- Give informed consent
- Follow (discharge) instructions:
- Read and use health education materials
- Complete insurance forms correctly
- Pay my bill
- Go home and manage my care:
  - Take my medicines the right way
  - Eat the right way
  - Stop, start, and change a bunch of behaviors

A 62-year-old night watchman with a third-grade education was a lifelong asthma sufferer and lived alone. He was diagnosed with rheumatoid arthritis and the physician prescribed prednisone. His bottle contained 100 tablets of 30 mg each, and the prescribed dose typed on the prescription bottle label was "Take 30 mg every other day." Six days after starting his drug regimen, the patient experienced dizziness, blurred vision, rapid heart rate and muscle weakness. He fell while getting out of the tub and fractured his left hip. At the time of emergency department admission, the staff learned he had consumed 90 of the 100 prednisone tablets within five days. During his hospitalization, the patient developed pneumonia, continued to deteriorate and died.<sup>36</sup>

A 45-year-old Hispanic immigrant undergoes a job-related health screening and is told that his blood pressure is very high. He goes to the local public hospital and is given a prescription for a beta-blocker and diuretic, each to be taken once a day. He presents to the emergency department one week later with dizziness. His blood pressure is very low, and he says he has been taking the medicine just like it says on the bottle. The case is discussed by multiple practitioners until one who speaks Spanish asks the patient how many pills he took each day. "Twenty-two," he replies. The provider explains to his colleagues that "once" means "11" in Spanish.<sup>37</sup>

A two-year-old is diagnosed with an inner ear infection and prescribed an antibiotic. Her mother understands that her daughter should take the prescribed medication twice a day. After carefully studying the label on the bottle and deciding that it doesn't tell how to take the medicine, she fills a teaspoon and pours the antibiotic into her daughter's painful ear.<sup>38</sup>

Although patient education is usually provided, little is done to make sure patients grasp the important elements of the health information given to them. Effective communication between provider and patient, and among providers, has the potential to reduce communication-related errors and adverse events.<sup>45</sup> Techniques to clarify verbal and written communication, and verify understanding, can reduce adverse events that may result from medical misunderstandings and consequent errors.<sup>46</sup>

### **The continuum of confusion**

The heart of every health care encounter is the patient's interaction with the health care system. This interaction results in instructions, recommendations and counseling that patients must hear or read, understand and apply to manage their health. At each step, opportunities arise for miscommunication, misunderstanding and possible harm—to the patient, provider and health care system.

For a typical patient, the processes surrounding health care encounters are seen as a continuum of confusion (figure 4). Each circle represents a point of contact in common outpatient health care interactions. The patient must navigate the way from circle to circle to obtain care. At every point of contact, crucial information is exchanged between the patient and the office staff (e.g., receptionists, assistants, nurses, physicians).

Along this continuum, multiple individuals must obtain and understand a variety of information, and act appropriately. Numerous individuals are exchanging information at every point of contact, but the only constant in this continuum is the patient positioned at the heart of the interactions. A single, unchecked misunderstanding at any point of contact can potentially result in error, harm or suboptimal care or outcomes. From misinterpreting how to prepare for a diagnostic test to incorrectly taking a prescription drug, these mistakes can harm the patient, the providers and the larger health care system.

As information is exchanged throughout the continuum of confusion, an assumed transfer of responsibility occurs (e.g., once a doctor obtains a medical history it is assumed he or she will act in relation to it; once a patient is prescribed medication it is assumed that it will be taken as directed). This exchange of information and transfer of responsibility can be seen as a “handoff.”

Handoffs, when patient information and responsibility are transferred from one person or team to another, have traditionally been considered in terms of provider-to-provider communication. Handoffs are increasingly recognized as risky times in medical care and are particularly vulnerable to communication failures. The Joint Commission has specified that in order to meet patient safety goals, physicians have a duty to ensure handoffs are carried out in a manner that guarantees all needed information is communicated clearly and understood. “The primary objective of a hand-off is to provide accurate information about a patient's care, treatment and services, current condition, and any recent or anticipated changes.”<sup>47</sup>

**Figure 4. The continuum of confusion: “Now go home and safely manage your care”**



ED—Emergency department  
 F/U—Follow up  
 HCP—Health care professional  
 PP—Prior to seeing physician

However, it is also important that physicians effectively and clearly communicate information to patients, handing off decision making and self-management only to a fully informed patient. Every information exchange arrow on the continuum of confusion designates a handoff to the patient—a time that places patients at risk. At each point of contact four considerations should be recognized:

- Who is interacting with the patient?
- Who is best situated to assess whether there is a communication problem?
- Is the communication problem capable of causing harm?
- What needs to be done to mitigate the risk to patient safety?

## The financial burden

Although not always due to poor communication, nonadherence to medication and other health care regimens affects not only individual patients, but the entire health care system through additional physician visits and diagnostic testing, decreased job productivity and more hospital admissions.<sup>48</sup> Conversely, patients with high levels of medication adherence are associated with lower medical costs, lower rates of hospitalization and lower overall health care costs.<sup>49</sup> Individuals with inadequate health literacy incur higher emergency room, inpatient and total health care costs.<sup>50</sup> Nonadherence is estimated to result in nearly 125,000 deaths per year from cardiovascular disease<sup>51</sup>, 10 percent of all hospital and 23 percent of all nursing home admissions<sup>52</sup>, \$1.5 billion in lost patient earnings and \$50 billion in lost productivity.<sup>53</sup> Estimates have attributed 112 million unnecessary medical visits and an extra \$300 billion per year in excess spending to nonadherence.<sup>54</sup>

## The foundation of safe practice: The patient's right to understand

Learning objective: Recognize the ethical and legal foundation for safe medical practices and patient-centered care.

### The patient's right to understand all aspects of the medical encounter

The first patient right:

No right is held more sacred, or more carefully guarded, by the common law, than the right of every individual to the possession and control of his own person, free from all restraint or interference of others, unless by clear and unquestionable authority of law.

The U.S. Supreme Court, 1891<sup>55</sup>

The right of a patient to determine what will or will not happen to his or her own body (i.e., self-determination) is a fundamental concept of American law. This bioethical principle, respect for patient autonomy, grew from American social doctrine and court rulings that found it is a physician's duty to ask patients for proactive consent and provide information—or disclosure—on the risks and benefits of procedures and interventions.<sup>56</sup> Elements of patient autonomy include the rights of patients to receive accurate information, participate in the treatment decision-making process and control the course of their own medical treatment. In addition, personal autonomy is described as being free from limitations such as inadequate understanding and undue influence.<sup>57</sup>

Courts have consistently described informed consent as a process of educating patients so they understand their diagnosis and treatment. A Virginia court stated that consent is not a piece of paper but rather a process of physicians helping patients understand their condition for the purpose of making informed decisions.<sup>58</sup> The South Carolina Supreme Court declared that a patient must have a true understanding of procedures and their seriousness.<sup>59</sup> Moreover, in Ohio a court said that the physician's duty to patients includes fully disclosing information and, as fully as possible, ascertaining that patients understand the information on the documents they are signing.<sup>60</sup>

Unconditionally, exercising the right of self-determination is contingent on a patient's right to understand information about his or her own body. That patients understand information sufficiently to make appropriate decisions on their health care is the essence of health literacy. Patient understanding is the first patient right and without such understanding there are limitations on the ability to exercise all other rights customarily credited or formally contracted to patients.<sup>61</sup> This right is not one that physicians confer, but one they assist patients in exercising freely. It is neither just nor fair to expect a patient to make appropriate health decisions and safely manage his or her care without first understanding the information needed to do so.

Definition of the right to understand:

Patients have the right to understand health care information that is necessary for them to safely care for themselves, and the right to choose among available alternatives. Health care providers have a duty to provide information in simple, clear and plain language, and to check that patients have understood the information before ending the conversation.<sup>62</sup>

## A physician's duty to elicit and ensure patient understanding

The scope of the physician's duty to ascertain patient understanding can be found in *Canterbury v. Spence* (1972), a landmark case associated with informed consent rather than health literacy per se.<sup>63</sup>

In this case, the court confers meaning to patient understanding and distinguishes between the duty to disclose and the duty to inform. The court states that disclosure focuses on the description and content of the information, whereas informing focuses on understanding the content.<sup>64</sup> The court further asserts that information conveyed by the physician is only effective if there is patient understanding.<sup>65</sup>

The court recognizes the unique relationship between the patient and physician, and assigns the physician's duties within the expectations of the societal contract, or partnership, between patient and physician, but firmly declares that the consumer standard of "caveat emptor" ("buyer beware") does not apply to patients utilizing medical services.<sup>66</sup> In *Canterbury v. Spence*, the court finds that the physician has a duty to impart information based on the patient's needs and recognizes that the patient's reliance on the physician is based in a trust "of a kind, which traditionally has exacted obligations beyond those associated with arms-length transactions."<sup>67</sup>

The court displays a deep appreciation for both the patient's right to understand and the physician's corresponding duty to impart health care information and determine understanding. Additionally, the court acknowledges that effective communication, which results in patient understanding, benefits and protects both physician and patient.<sup>68</sup>

The following excerpts from the *Canterbury* case link the court's observations and conclusions on the exchange of information between patient and physician to basic health literacy principles. The court's statements and directives are consistent with key components of effective communication that have been outlined by health literacy and communication experts.<sup>69</sup>

- You cannot determine your patient's literacy level, or if he or she understands, by appearances:  

A few patients may have a medical education or education in related disciplines. Because there are unknown variations in the degree of knowledge patients schooled in the medical sciences or related fields may have, it is never safe to assume that the patient's insights are on parity with the treating physician's judgment.<sup>70</sup>
- Use plain, nonmedical language, both oral and written:  

The physician is not required to give patients a short medical education but a reasonable explanation in non-technical terms, including alternative therapies, goals expectably to achieve, risks associated with a particular treatment and/or no treatment.<sup>71</sup>
- Slow down; break information down:  

The average patient has little or no understanding of medicine and the medical arts, and ordinarily has only his/her physician as a source to provide the information needed to reach an intelligent decision. Therefore, the physician is required to assist the patient to make an intelligent decision possible and satisfy the patient's vital informational needs.<sup>72</sup>

- Organize information into two or three concepts and check for understanding:

Patients may be intimidated by the physician, confused, frightened, uninformed or ashamed to ask questions. Therefore, the physician should not wait for the patient to ask for information or merely answer the patient's questions. Absent knowledge or a prior explanation by the physician, the patient may lack the ability to identify relevant questions to ask. It is the physician's duty to volunteer the information the patient needs to make decisions or manage their care.<sup>73</sup>

- Teach-back confirms patient understanding:

It is the patient's prerogative to determine for him/her self the course of care. It is the physician's duty to enable the patient to chart his/her course understandably, i.e., reasonably.<sup>74</sup>

The physician is the individual with knowledge of, or the ability to learn, the patient's history and current condition and, therefore, is in the best position to determine the patient's information needs.<sup>75</sup>

The risks of patient misunderstanding and communication adverse events are foreseeable (e.g., medication over- and underdosage, failure associated with inability to self-manage care, worsening of health, discontinuity of care and deterioration of the patient-physician relationship). Consequently, the patient's right to understand and the physician's corresponding duty to ascertain understanding will continue to be subject to judicial scrutiny.

It is important the medical profession recognizes that ascertaining patient understanding is a duty and, therefore, an integral component of care rather than an add-on or an activity separate from the performance of medical care given to patients.<sup>76</sup> Given that the component of care that most defines the patient-physician relationship—the exchange of information between parties who trust each other for the purpose of determining medical treatment and planning the course of care to reach the patient's health care goals—there is no need to rely on courts, legislators or regulators to control the duty to ensure patient understanding.

## The patient safety approach to risks associated with health literacy

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Learning objective: Explain patient safety concepts and approaches utilized in designing safer practice environments.

Patient safety science provides a strong foundation for a systems approach to prevention of error. Using the following patient safety concepts, much can be learned about how to address health literacy risks.

### Systems approach

Within the larger health care system, an individual's experiences in the health care environment consist of discrete episodes in diverse locations (e.g., clinic, hospital, home). These vary in content, frequency and urgency over time, and in the continuum of health conditions: preventive and anticipatory, acute illness or injury, chronic, and palliative or end-of-life. These various settings are microsystems, "small, interdependent groups of people who work together regularly to provide care for specific groups of patients."<sup>77</sup> These groups are distinct units of care with a common purpose—such as a renal dialysis team or a cardiac surgery team—that are embedded in and influenced by larger organizations, or macrosystems. A clinical microsystem includes not only physicians and nurses, but also other clinicians, specialized teams, administrative support and a population of patients. Information and information technology are also critical components.

Within these settings, each patient encounter represents a potential exposure to discontinuity, information gaps and disrupted patient-provider communication, in addition to an opportunity for prevention through health literacy interventions to ensure understanding and enhance safety.

### Communication adverse events

An adverse event is defined as any injury caused by medical care. A *communication* adverse event occurs when there is an incomplete communication loop, apparent or not, during the exchange of necessary health care information that results in harm to the patient. Identifying a communication adverse event does not imply error, negligence or poor quality care. Rather, it indicates that an undesirable outcome resulted from some aspect of communication during diagnosis or therapy, not an underlying disease process.<sup>78</sup>

In both the larger health care system and individual office settings or microsystems, processes, procedures and strategies can be used to prevent communication adverse events by creating a culture of safety and increasing reliability.

## High-reliability organization

A culture of safety in any industry or setting refers to a commitment to safety that permeates all levels of an organization, from front-line personnel to executive management.<sup>79</sup> It incorporates several features of high-reliability organizations outside of the health care field that demonstrate exemplary performance with respect to safety.<sup>80,81</sup> Key features of a high-reliability organization or system are:

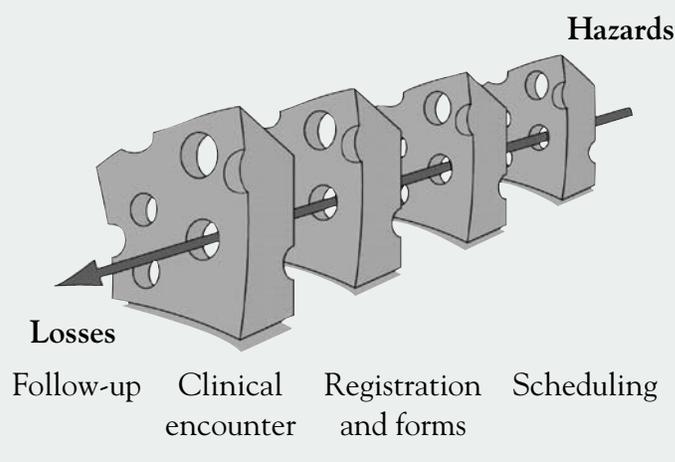
- Acknowledgement of the high-risk, error-prone nature of an organization's activities
- A blame-free and shame-free environment where individuals are able to report errors or "close calls" without fear of reprimand or punishment
- An expectation of collaboration across ranks to seek solutions to vulnerabilities
- A willingness on the part of the organization to direct resources to address safety concerns

## Latent failures

Latent failures, or "less apparent failures of organization or design that contribute to the occurrence of errors or allow them to cause harm to patients," reside within health care systems.<sup>82</sup> These are "loopholes in the system's defenses, barriers and safeguards whose potential existed for some time prior to the onset of the accident sequence, though usually without any obvious bad effect."<sup>83</sup>

The Swiss Cheese model (figure 5),<sup>84</sup> developed by James Reason, illustrates how multiple small failures can lead to an actual hazard. Each slice of cheese represents a safety barrier or precaution relevant to a particular hazard. No single stage is foolproof—each has holes where communication errors are perpetuated, key information is not effectively handed off to subsequent providers and the potential exists for communication-related harm (i.e., communication adverse events).

**Figure 5. The Swiss Cheese model and patient-provider communication: the relationship between patient safety and health literacy**



Source: Adapted from Reason J. Human error: models and management. *BMJ*. 2000;320:768-770.

By applying these patient safety concepts to health literacy risks, office practices can be assessed and redesigned to create a safer health care environment.

## Designing your office practice for a safer health care environment

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Learning objective: Identify patient safety practices that reduce the risk of miscommunication and optimize patients' ability to safely manage their own care.

Health systems can be designed and modified to improve quality and safety. In the context of health literacy and the physician's ethical and legal obligations, a safer health care environment—with minimal adverse events caused by miscommunications—is one in which patients understand their health event(s), make informed health decisions, know what they need to do and do not experience a sense of shame or embarrassment at any time, and one in which health care providers have an obligation to recognize, anticipate and act on potential patient harm or risk, and mitigate or avoid risk through systems change.

Thus, health care professionals and systems have a shared responsibility to:

- Minimize risk and create a safer health care environment for all patients, especially those with limited literacy
- Develop patient-centric responses to exposure to risk
- Design reliability in the system to support consistent high quality care
- Research available data, emerging evidence and promising practices about interventions to improve understanding, reduce patient risk and guide action
- Emphasize teamwork and collaboration across the system

Patient-centered care principles that should underlie all patient encounters include engaging in a dialogue with the patient, listening more and speaking less, encouraging questions, and understanding and addressing the patient's concerns.

Ensuring that the patient's point of view is respected and addressed during the health care encounter is paramount, and should lead providers and the health care system to adopt and use Safe Communication Universal Precautions.

## Safe Communication Universal Precautions

The goal of every physician is to provide the best possible care for every patient all the time. Clear communication, including assessing and ensuring understanding so that patients and caregivers know what they need to do for their health, is fundamental to achieving the best possible outcomes for patients. There are three components to implementing this objective:

1. Providers should use clear communication skills, techniques and practices for interpersonal communication with *all* patients, not just those with limited literacy.
2. Communication aids to assist and support interpersonal and other communication should always be available and used appropriately, when needed.
3. Systemwide communication strategies should be incorporated into routine operations, including planning, budgets, job descriptions and evaluation to support all members of the health care team—and patients and families—in communicating clearly.

Together, these three elements—interpersonal communication, communication aids and systemwide communication strategies—comprise a set of Safe Communication Universal Precautions (table 1), that should be in place throughout the entire health care system and should become a standard component of health care delivery.

**Table 1. Safe Communication Universal Precautions**

**For all communications:**

- Use plain, nonmedical language
- Slow down
- Break information down, use short statements
- “Chunk and check,” or organize information into two or three key concepts, then check for understanding
- Ask patients to teach-back what they were told
- Document with a SOAP UP note for cueing and confirming patient understanding and planning for health literacy follow-up

**Communication aids:**

- Aim for fifth- to sixth-grade reading level on all written information
- Offer to read aloud and explain
- Underline, highlight or circle key points
- Use visual aids to help navigate the health care system and understand health information (e.g., posters, models, pictures, signs, maps, etc.)
- Provide a trained interpreter, when appropriate

**Systemwide communication strategies:**

- Improve office safety culture through training for all staff
- Simplify paperwork demands on the patient, avoid duplications
- Ensure medication review and/or reconciliation for all patients, at all encounters
- Schedule time for patient education and questions
- Provide reminder calls to patients
- Use SBAR (Situation-Background-Assessment-Recommendation) for staff-to-staff communication about patient understanding
- Identify community literacy resources

Communication safety measures should be applied as universal precautions for all patients, not just those with low literacy, because:

- Everyone benefits from clear information
- It is difficult to identify which patients may be at risk of misunderstanding
- Assessing general reading levels does not ensure patient understanding in the clinical setting

The ultimate goal of Safe Communication Universal Precautions is to prevent communication adverse events. Physicians should identify what can be done to take action in their own practice setting before a communication problem arises. This can be achieved by being sensitive to the nature and format of information given to patients, and incorporating health literacy principles, tools and techniques into standard, everyday practice for all patient encounters. Safe Communication Universal Precautions have the potential to enhance the clinician-patient relationship, to facilitate communication between practice staff and patients and to assist clinicians and staff in changing office practices to enhance safe communications. Specific approaches and tools to put Safe Communication Universal Precautions in practice are outlined in the following section.

# Part II: Office team approach toward a safer and shame-free environment of care for your patients

Learning objectives: Determine steps toward establishing a climate for change; identify tools and approaches for creating safer practice environments; and demonstrate how to utilize and implement these tools in a practice environment.

## Building the team

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Making improvements to mitigate the risk of low health literacy requires assessing multiple aspects of the practice environment, identifying goals and strategies to achieve them, and evaluating progress. Physicians should begin with the recognition that addressing health literacy will be ongoing, crosscutting for a range of issues and conditions, and requires the active involvement of all members of the health care team.

As team leader, the physician needs to develop a thoughtful implementation strategy to build enthusiasm and support for improvement and change. Every individual on the staff fulfills different roles in the care environment. It is the physician's responsibility to delegate these tasks in a way that matches the aptitudes and skills of the staff (e.g., staff members may have language skills, medication knowledge, experience in particular disease management, a friendly phone manner, etc.).

Although each individual performs separate tasks, all members of the team need to be familiar with each other's tasks to understand the team structure and be able to fill gaps in the system as they occur. If certain skills are lacking, the physician should support development of the necessary staff skills to create a safer environment. The entire health care team must be aware of the importance of effective communication to patient safety, as well as their roles and responsibilities in preventing mistakes.

An approach that can be used to effect change in the practice setting is presented below. The patient care environment can be transformed by increasing awareness of the problem, assessing the current state of the care environment, building a sense of accountability for change, building a skill set with which to effect change, taking action with the new skills and assessing progress of the actions.

## Establishing awareness of the issue

Improving the office safety culture begins with raising awareness about low health literacy among all staff.

## Recognizing signs of low health literacy

All clinicians and staff should be alert to signs of low literacy. The most important point to recognize is that those with limited literacy skills and difficulty understanding may try to hide this due to previous negative experiences with the educational or health care systems. Indicators, or red flags, of low literacy in the health care setting may suggest poor reading skills, efforts to hide low literacy or lack of understanding, and can include health-seeking behaviors or actions that may appear incongruous (table 2).

Red flags are warning signs that should trigger the use of health literacy strategies. When they are observed, physicians and staff should ensure that the need for enhanced communication techniques is passed along to other clinicians and staff members the patient will encounter.

**Table 2. Red flags for low health literacy**

- Seeking help only when illness is advanced
- Walking out of the waiting room
- Becoming angry, demanding
- Clowning around, using humor
- Being quiet, passive
- Incomplete registration forms
- Difficulty explaining medical concerns
- Unable to name medications, or explain purpose or timing of administration
- Medication nonadherence
- Detour, i.e., letting clinician miss the concern
- Making excuses
  - “I forgot my glasses. I’ll read this when I get home.”
  - “I forgot my glasses. Can you read this to me?”
  - “Let me bring this home so I can discuss it with my children.”
- No questions
- Frequently missed appointments
- Skipped tests and referrals

Source: Health Literacy: Help Your Patients Understand, Faculty Guide. American Medical Association Foundation and American Medical Association, 2006.

A universal approach to assessing literacy can be achieved by routinely incorporating into standard practice carefully worded inquiries about patients' comfort with reading, such as "How happy are you with how well you read?" or "What is the best way for you to learn new things?"<sup>85</sup> This should be done sensitively, with the understanding that patients may not disclose such difficulties despite even the most careful efforts. Such inquiries may be uncomfortable for providers initially, but like other sensitive issues in medicine, become easier with practice.

It should be made clear that every staff member has a role in creating and ensuring a safer, shame-free environment, that this is not a single individual's responsibility, and that it is not limited to the physician or nursing staff. At times, reception staff may be in the best position to identify possible red flags. They should be trained to watch for them and convey concerns to other members of the health care team.

### General resources

Low health literacy needs to be viewed not only as a formidable risk to patient safety but also as one that can be mitigated with some well-executed tactics. The 22-minute AMA Foundation video, "Health literacy and patient safety: Help patients understand,"<sup>86</sup> can build staff, physician and administrative awareness about low health literacy, its accompanying shame and strategies to address it.

Additionally, the impact of limited health literacy must be recognized as a patient safety issue. Recent research demonstrates how low health literacy can affect medical diagnosis and treatment. This monograph provides a variety of useful references that can be shared with staff and providers to highlight the relevance of limited health literacy to patient safety.

### Local resources

In addition to a general awareness of the issue, staff and providers should be familiar with the prevalence and impact of low health literacy in their own setting. Exposing health communication deficits through local data and personal experiences builds support for health literacy initiatives among members of the health care team.<sup>87</sup> The following resources can be used to gain an appreciation for the prevalence of low health literacy in an individual community or practice:

- Adult Literacy Estimates<sup>88</sup>—Synthetic estimates of local literacy data, based on the 1992 National Adult Literacy Survey.
- Prevalence Calculator<sup>89</sup>—Estimates the percentage of patients in a practice that might have limited health literacy, based on the health literacy component of the 2006 National Assessment of Adult Literacy.
- Modern Language Association Data Center<sup>90</sup>—Tallies the variety of languages spoken in geographic areas, based on data from the 2000 U.S. census.
- Personal stories describing the effects of low health literacy from the provider, patient or family member perspective.

## Evaluating your environment

While a general awareness of low health literacy is important to garner support for change, transforming an environment to be safer and shame-free requires an understanding of the current climate of the practice. This can be accomplished with various types of assessments. Observational assessments can be conducted through increasing cognizance of health literacy considerations in the environment. Survey assessments can be accomplished through formal surveys and data collection. Patient experience assessments require involving patients directly in evaluating the care environment. All three types of assessment provide different insights to help better understand current practice and may aid in designing a suitable implementation strategy.

### Observational assessments

Recognizing nodal opportunities for change (table 3) can help staff identify occasions for their own involvement as well as approaches to address health literacy-related difficulties. This tool may also be used as a practice self-assessment for communication-related issues. Answering these questions as a group may lead to team approaches to improvement, rather than depending on one person.

### Table 3. Recognizing nodal opportunities for change

Step back and take a serious look. Is your office/practice/clinical environment patient-friendly? Imagine that you are a patient coming to visit your practice for the first time today. What will you find there? (Think about the last time you visited your doctor's office or had a medical procedure).

- How will you be greeted by the front desk staff?
- What paperwork will the staff ask you to produce or complete?
- What rules and procedures will they ask you to follow?
- Will assistance be offered? If so, in a private, confidential manner?
- What kind of paperwork will you receive if you are referred for ancillary tests or consultations with other clinicians, and how will you find your way to those tests and consultations?
- Will you receive handouts and consent forms? If so, will you be able to understand them?
- Were directions to the office provided?
- When you made the appointment, did the person suggest that:
  - You bring in any medicine you've been taking?
  - You bring in a list of your questions?
  - You are welcome to bring someone with you?
- Will you receive enough education to understand your own care?
- Will you get the same messages from everyone (physician, nurse, medical assistant)?
- Are all your interactions shame-free?

Adapted from: Health Literacy: Help Your Patients Understand, Faculty Guide. American Medical Association Foundation and American Medical Association, 2006.

Other observational assessments that may provide useful insight can be obtained by developing tracking systems for activities already in place. For example, monitoring the comments in a patient suggestion box and tracking communication-related complaints or practice data (e.g., telephone and other interruptions for clarifications, types of questions and amount of time nurses spend on such telephone calls, no-shows, etc.). Staff should identify which nodal opportunities to study further, collect data systematically, and develop an evaluation of lessons learned and means for improvement.

### Survey assessments

A variety of survey methods, ranging from simple to complex, can be used to evaluate the state of a care environment as well as to monitor progress. To establish a baseline followed by ongoing evaluation, survey instruments can be used to measure the effectiveness of patient-centered, patient-friendly communication.

#### Patient satisfaction survey

Patients are the real experts in the self-management of their health conditions. While they may spend 30 minutes with the health care team every two to three months, they are caring for themselves the rest of the time.

One method to monitor a practice's progress toward improving communication and safety is by employing brief, informal patient satisfaction surveys. Surveys, such as the Communication Assessment Tool<sup>91</sup> and the Iowa Health System patient satisfaction survey<sup>92</sup> (table 4), should be simply worded and not time-consuming to complete. Another option is to administer oral one- or two-question surveys to patients as they leave the office.

### Table 4. Sample survey items

#### Sample items from the Communication Assessment Tool

The doctor:

- Talked in terms I could understand
- Checked to be sure I understood everything in this visit
- Encouraged me to ask questions

Sample items from the Iowa Health System patient satisfaction survey

- My health care team told me in a clear way how I can help take care of my health.
- My health care team told me about other people who can help me with health problems (like groups, classes, counselors and health educators).

*See Appendix for complete surveys.*

Simple and informal surveys are short enough to:

- Be completed before the patient leaves
- Provide patient feedback on the state of communication in the practice
- Identify communication areas where patients may feel uncomfortable
- Identify directions for improvement
- Help identify disparities between groups of patients with respect to communication issues
- Send a clear message to all staff that respectful, sensitive communication is valued and considered a vital part of office culture

## Staff satisfaction survey

Other important data to collect are the experiences and satisfaction of the staff. Staff surveys can provide valuable feedback not only on perceived improvements, but also about essential staff acceptance and enthusiasm for health literacy initiatives. Surveys such as the PeaceHealth Patient Safety Culture Survey<sup>93</sup> (table 5) can be administered and tracked. Staff perceptions about patient safety can also be assessed by asking them to consider the practice from a patient's point of view with two questions: (1) Would you feel safe in this practice setting? (2) Would you refer a family member to this practice for care?

### Table 5. Sample items from the PeaceHealth Patient Safety Culture Survey

- Medication safety in this clinic is approached as a process of care issue and not a personal blame issue.
- I often wonder about whether I have all of the information I need to make sure that a medication is prescribed safely for a patient.

See Appendix for complete survey.

## Practice self-assessment survey

Self-assessment of a practice is another useful survey tool. The Physician Practice Patient Safety Assessment<sup>TM</sup> (PPPSA)<sup>94</sup> (table 6) is designed to be completed by a team of staff and providers to offer a well-rounded view of the status of safety practices in a facility. As part of safety practices, the survey evaluates health literacy considerations as components of patient education and communication. Responses to the survey are reported to PPPSA and compiled nationally. This allows both baseline measurements for a practice and national comparisons of patient safety practices.

### Table 6. Sample items from the Physician Practice Patient Safety Assessment

- All practice staff are trained to recognize and manage health literacy issues.
- Patients are routinely asked to repeat back what they hear to help the clinician clarify any instructions.

Visit [www.physiciansafetytool.org](http://www.physiciansafetytool.org) for complete survey.

## Comprehensive assessment survey

An assessment toolkit developed as part of the AMA Ethical Force Program<sup>TM</sup> offers a comprehensive series of surveys designed to evaluate various parts of a practice concurrently. The Patient-Centered Communication Self-Assessment Toolkit<sup>95</sup> (table 7) comprises a patient survey, clinician survey and staff survey, as well as a policy checklist and organizational survey. Each of these has a section specifically geared toward evaluating health literacy as a component of patient-centered communication.

### **Table 7. Sample items from the Patient-Centered Communication Self-Assessment Toolkit**

#### **Policy checklist and organizational survey**

- Does the clinic assess whether patients can understand important documents, educational materials and surveys?

#### **Staff survey**

- When patients register or schedule an appointment at the clinic, someone asks them what language they prefer to use.
- Has the clinic provided you training on communicating with patients in plain language instead of technical terms?

#### **Clinician survey**

- Has the clinic provided you training on how miscommunication can affect patient safety?
- Staff has easy access to information on patients' individual communication needs.

#### **Patient survey**

- Could you understand the clinic's signs and maps?
- Did people at the clinic ask if you needed help filling out forms?
- After you left the clinic, did you know how to take your medication?

Survey types vary from informal practice surveys to more complex research tools. In all forms, they serve as measures of communication. It has been demonstrated that effective communication with patients can improve outcomes.<sup>96</sup> Additionally, emphasis on pay-for-performance, chronic disease management and public reporting of quality data is growing. Tracking communication-related skills of physicians and all staff in the practice will be increasingly important.

## Committing to transform practice

Assessing the practice environment helps identify the health literacy gaps that may put patients' safety at risk. Having recognized these gaps, the health care team needs to commit to addressing health literacy. To optimally address health literacy, the office setting should be a welcoming, shame-free care environment that offers patients assistance, and invites them to raise questions as an important component to enhance communication. Staff should be engaged in creating this environment to mitigate the shame and stigma associated with low literacy, and to foster understanding (table 8).

To successfully create this practice environment, the entire health care team needs to be driven by a sense of accountability, with the understanding that every individual's actions contribute to the culture of safety. The leaders of the practice should initiate these efforts by resolving to establish a higher level of patient safety. Management, providers and staff must possess a willingness to change, be open to learning new skills and be committed to putting them in place. All must see their essential role within the team and feel they can contribute to a safer environment. Using the staff survey assessment mentioned earlier, staff buy in can be monitored, and suggestions for improvement can be gathered from all levels. This helps maintain a sense of accountability for the culture of safety across all job functions.

### Table 8. Characteristics of a shame-free environment

- Exhibit a general attitude of helpfulness
- When scheduling appointments:
  - Have a person, not a machine, answer the phone
  - Collect only necessary information
  - Give directions to the office
  - Help patients prepare for the visit; ask them to bring in all their medications and a list of any questions they may have
- Use clear and easy-to-follow signage
- Ask staff to welcome patients with a general attitude of helpfulness
- During office check-in procedures:
  - Provide assistance with completing forms
  - Collect only essential information
  - Provide forms in patients' languages
  - Provide forms in an easy-to-read format
- When referring patients for tests, procedures or consultations:
  - Review the instructions
  - Provide directions to the site of referral
  - Provide assistance with insurance issues
- When providing patients with information:
  - Routinely review important instructions
  - Provide handouts in an easy-to-read format
  - Use nonwritten modalities

Source: Weiss BD. *Help patients understand: A Manual for clinicians*. 2<sup>nd</sup> ed. Chicago: American Medical Association and American Medical Association Foundation; 2007.

## Taking action using Safe Communication Universal Precautions: Approaches and tools

This section introduces a variety of system-based approaches and tools that all members of the health care team can utilize to transform the patient care environment.

To create a safe and shame-free environment, it is vital that all staff know, understand and adopt Safe Communication Universal Precautions. To minimize communication-related adverse events, these tools should underlie all patient encounters. Everyone benefits from clear communication and everyone can, at various times, be at risk for misunderstanding. Using Safe Communication Universal Precautions as guiding principles, a variety of approaches and tools to improve interpersonal communication, communication aids and systemwide communication are described below.

### Interpersonal communication

- Use plain, non-medical language
- Slow down
- Break it down; use short statements
- Chunk and check—organize information into two or three key concepts, then check for understanding
- Ask patients to “teach back” what they were told
- Document with a SOAP UP note (see page 31) for cueing and confirming patient understanding, and planning for health literacy follow-up

### Simple language

Because “medicalese” can be confusing even to those who work in the health system, physicians should use “living room” language and analogies when speaking to or writing for patients. Everyday language helps by associating the new information with what the patient already knows. Using analogies from everyday concepts (e.g., “the heart is a pump”) may give patients a concrete image to help associate with and remember the new ideas. Speaking slowly and using brief sentences improves communication by giving patients time to digest the information being conveyed and to process unfamiliar terms or even common words used in a different context (e.g., asthma “triggers” and “rescue” medications).

### Organize information

When multiple health conditions need to be addressed, the main challenge may be determining how to organize a great deal of disparate information into a simple framework the patient will be able to remember. One study showed that well-educated individuals had great difficulty remembering more than seven independent items learned at the same time.<sup>97</sup> However, if the material was organized into two to three key points, or “chunked” into more descriptive categories, it was much easier to remember. Physicians should periodically check for understanding, rather than waiting until the end of the discussion. This is sometimes called “chunk and check.”

Adult educators recommend thinking in terms of “advance organizers” (table 9), or creating an agenda for the conversation—a logical sequence of a few key messages. The conversation with the patient then begins within that framework. Using advance organizers has increased recall by nearly 50 percent.<sup>98</sup>

### Table 9. Advance organizers

These are the things I am going to discuss with you:

1. What we think is wrong with you
2. What tests are needed to be sure
3. What will probably happen
4. What treatment is needed
5. What you can do to help yourself

Each point is then discussed with appropriate information.

Source: Doak CC, Doak LG, Root JH. *Teaching Patients With Low Literacy Skills*, 2<sup>nd</sup> ed. J.B. Lippincott Company, Philadelphia; 1996:163.

Ask Me 3<sup>TM</sup><sup>99</sup> is a health communication tool for both patients and physicians, focusing on three essential questions. Patients can ask their physicians these questions and physicians can make sure their patients understand the answers to them during every health care encounter:

1. What is my main problem?
2. What do I need to do?
3. Why is it important for me to do this?

Tools such as Ask Me 3 can foster a shame-free environment by “giving permission” to ask questions, and creating the expectation that providers want patients to understand their health care. By increasing the perceived self-efficacy in communication of both patient and provider, it can open the door to better information exchange. Simply hanging posters or displaying brochures of Ask Me 3 does not create a shame-free environment. The health care team needs to understand what these questions mean and to use them during interactions with patients, telling patients to make sure their questions are answered, asking if all their questions were answered before they leave and shaping the way providers explain information so that patients have the answers to the three questions at the end of the encounter.

Evidence is emerging about the effectiveness of Ask Me 3 (table 10) in family practice and geriatric internal medicine settings.<sup>100</sup> It was found that use of Ask Me 3:

- Is practical and user-friendly for patients and staff
- May increase provider engagement and perceived self-efficacy in improving their own health communication skills
- Did not increase visit length
- May decrease missed appointments and calls
- Appears to “give permission” to ask questions

### Table 10. Comments from nurses following an inpatient pilot evaluation of a poster and patient handout based on Ask Me 3™

- Helped “set the stage” and “open the door” for communication with patients
- Patients held staff more accountable
- Noticed more patients writing questions for doctors
- Noticed some patients, mostly elderly, ask more questions

Source: Purtle M, Dickerson B, Harden M, Abrams MA, Walters J. Enhancing Patient-Provider Communication Through Implementation of Ask Me 3™. Abstract. Iowa Medical Society Annual Meeting, 2006.

Downloadable and hard copies of Ask Me 3™ posters, brochures, and promotional and supporting materials are available for patients, clinicians and organizations, in English and Spanish.<sup>99</sup>

#### Use teach-back

While clinicians can use the Ask Me 3 questions to guide their explanations and instructions, they can ensure that patients have understood the answers to the questions by using the teach-back method. Teach-back is based on traditional education theory that students learn best when they interact with the new material. Asking patients to put information into their own words incorporates elements of adult learning by personalization, reinforcement and multiple modalities (hearing, saying, possibly doing).<sup>101</sup> Patients report feeling comfortable with this approach and prefer it to an authoritarian approach.<sup>102</sup>

When using teach-back, the clinician assumes the responsibility for communicating clearly and effectively, rather than giving the impression that the patient is being tested. Teach-back does not assess understanding by asking yes-or-no questions like “Do you have any questions?” or “Do you understand?,” because patients generally do not want to admit they don’t understand and may fear offending the physician by answering “no.” Helpful questions to elicit patient understanding include:

- We have gone over a lot of information. In your own words, review for me what we have discussed. How will you make it work at home?
- Sometimes I give a lot of information. Can you let me know what you heard me say? This helps me make sure I gave you the information you want and need.
- What will you tell your spouse about your condition?
- We discussed a lot today. What information will you share with your family and/or friends?
- We’ve gone over a lot of things you can do to help cut down on the amount of juice and milk your toddler is drinking. What do you think will work best for you at home?

Using teach-back to ask patients to put key information into their own words, and making sure they understand, can close the communication loop and prevent communication adverse events. Teach-back is recommended as a top patient safety practice by the National Quality Forum<sup>103</sup> and has been associated with improved outcomes. In a study on diabetic patients with low health literacy, physicians’ application of interactive communication to assess recall or comprehension lead to better glycemic control.<sup>96</sup>

Using teach-back is always important, but especially so when there are changes in care or important handoffs, such as new or changed medications or diagnosis, instructions for self-care, when to call the physician, discharge and follow-up education, or informed consent for surgery or procedures. In a prospective randomized controlled study involving patient comprehension of informed consent for spine injection, the teach-the-teacher method (patient repeating the 12 key points to the physician before informed consent was complete) achieved the best measurable comprehension in young and middle-aged adults, while a diagram method (patients viewed a set of simple illustrations of the 12 key points) was best among the elderly.<sup>104</sup>

### Table 11. No time for teach-back?

- One study among physicians using teach-back did not demonstrate a significant increase in the length of the encounter.<sup>†</sup>
- Teach-back may actually save time by allowing physicians to tailor information to the patient's needs, limiting discussions to the most important points. Additionally, better communication and patient understanding may reduce the time or frequency of future office visits.<sup>‡</sup>
- Physicians using teach-back report it becomes easier with practice.
- Tip: Begin using teach-back with the last patient, to remove the psychological burden of other patients waiting to be seen.

<sup>†</sup> Schillinger D, Piette J, Grumbach K, et al. Closing the loop. physician communication with diabetic patients who have low health literacy. *Arch Intern Med.* 2003;163:83-90.

<sup>‡</sup> Kripalani S, Weiss BD. Teaching about health literacy and clear communication. *J Gen Intern Med.* 2006;21:888-890.

### Document what is done (SOAP UP)

It is always important to document the efforts that have been taken to improve understanding and patient safety. Physicians can build on the traditional physician documentation tool, the SOAP note, by adding “UP” as a mnemonic:

- S** – Subjective
- O** – Objective
- A** – Assessment
- P** – Plan

- U** – Use teach-back to check for understanding
- P** – Plan for health literacy help

Using this tool will cue and confirm patient understanding and planning for health literacy follow-up.

Sometimes patients will not understand despite several attempts to clarify and confirm understanding<sup>105</sup>. That is when to institute the “p” for plan. Additional measures that may be used include:

- Write out information clearly, and be sure it is taken home to share with others or to refer to later.
- Consider including a family member in the discussion.
- Establish a process where another member of the health care team can review and verify patient understanding (e.g., medical assistant, nurse educator or lay volunteer)<sup>106</sup>.
- Arrange a telephone call to review instructions or serve as a reminder.
- Arrange a return appointment in a short time—days or a week.
- Consider referral to community resources (e.g., home health or adult education programs).
- Consider group visits for patients with chronic illnesses, and the need for continuing education and support.

This important information about patient understanding should also be passed along to other providers so they will know to apply these enhanced communication techniques<sup>107</sup>.

SOAP UP can serve the health care team as a:

- Trigger or prompt to consider health literacy and use techniques for effective communication, and check for understanding
- Documentation tool to show the provider checked for understanding using teach-back and made recommendations or referrals, as appropriate, to enhance understanding
- Way to identify the need—and justify resources—for communication aids and other systemwide communication strategies, like reminder calls and additional time for educating patients

### Communication aids

- Aim for a fifth- to sixth-grade reading level on all written information.
- Offer to read aloud and explain.
- Underline, highlight or circle key points.
- Use visual aids to help navigate the health care system and understand health information (posters, models, pictures, signs, maps, etc.).
- Provide a trained interpreter, when appropriate.

Communication aids support providers and the larger health care system in communicating effectively with patients and families. Although communication aids enhance understanding, they are not substitutes for provider-patient verbal communication.

The following are examples of how to support interpersonal communication with successful communication aids.

### Print materials

Reader-friendly principles should be used for all print materials. Aiming for a fifth- to sixth-grade reading level, although challenging, can greatly improve the readability of written materials. In addition to reading level, there are multiple dimensions of “reader-friendliness,” including word choice, phrasing, layout and design (table 12). By considering these during creation, revision, selection or purchase, and actual use of print materials, health care teams can improve understanding and usability of the numerous written materials utilized in practice.

Consider the following tips:

- Begin by reviewing the forms patients are asked to complete at your practice, checking them for redundancy, readability and usability.
- Routinely offer confidential assistance, with a proactive offer to read forms aloud, explain them or help complete them.
- Review all submitted forms for signs of not understanding, such as completeness and accuracy (e.g., leaving lots of blank responses, answering all questions with a “no” response).
- Ask patients or nonmedical volunteers to review your practice’s materials for ease of reading and understanding. If possible, create a partnership with adult education groups and ask whether they would consider providing feedback on written materials. Pilot new or revised patient education information to be sure it fulfills its intended purpose.
- When using an educational handout, point out the most important concepts and underline, circle or highlight them. Patients can remember and return to those sections later, or share them with family members.

- Use universally recognized graphic symbols as effective tools for communicating important information to persons with limited English proficiency. The Hablamos Juntos (we speak together) project designed and tested a variety of symbols, and produced a series of easily understood graphic symbols that can be recognized universally in health care environments<sup>108</sup>.
- Ensure translations are accurate and appropriate. Translating a document into another language does not ensure it is understandable for a number of reasons: patients may not be literate in their own language or may speak a different dialect, the translation may be inaccurate or other nuances of language (e.g., formality) may affect understanding.
- Include maps on the back of appointment letters and laboratory requisition sheets. This has decreased no-shows and increased completion of laboratory tests.
- Make clear signs and maps available whenever patients need to navigate the health system, especially when referrals are made for evaluation or procedures in a different care setting. Proactively point out signs, maps and landmarks so patients can use them effectively.

**Table 12. Formatting checklist for easy-to-read written materials**

**General content**

- Limit content to one or two key objectives. Don't provide too much information or try to cover everything at once.
- Limit content to what patients really need to know—avoid information overload.
- Use only words that are well-known to individuals without medical training.
- Make certain content is appropriate for age and culture of the target audience.

**Text construction**

- Write at or below a sixth-grade level.
- Use one- or two-syllable words.
- Use short paragraphs.
- Use active voice.
- Avoid all but the most simple tables and graphs. Clear explanations should be placed adjacent to each table or graph, and also in the text.

**Font and typestyle**

- Use large font (minimum 12 point) with serifs.
- Don't use more than two or three font styles on a page.
- Use uppercase and lowercase text.

**Layout**

- Ensure a good amount of empty space on the page.
- Use headings and subheadings to separate blocks of text.
- Bulleted lists are preferable to blocks of text in paragraphs.
- Illustrations are useful if they depict common, easy-to-recognize objects. Images should be age- and culturally-appropriate to the target audience. Avoid complex anatomical diagrams.

Source: Weiss BD. *Help patients understand: A Manual for clinicians*. 2<sup>nd</sup> ed. Chicago: American Medical Association and American Medical Association Foundation; 2007.

## Interpretation services

Language barriers can have deleterious effects, but many patients who need medical interpreters have no access to them<sup>109</sup>. Family members and untrained bilingual employees or volunteers should not be used as interpreters. They are more likely than trained interpreters to make errors that may have adverse clinical consequences, and are unlikely to be familiar with medical terminology<sup>110</sup>. They may also have priorities that conflict with those of the patient, or have difficulty discussing sensitive subjects (e.g., sexual or psychiatric issues)<sup>111</sup>.

The National Standards on Culturally and Linguistically Appropriate Services (CLAS), developed by the U.S. Department of Health & Human Services, provide guidance to help ensure effective communication for all patients, especially those with limited English proficiency. The standards, according to the Office of Minority Health:

...are proposed as one means to correct inequities that currently exist in the provision of health services and to make these services more responsive to the individual needs of all patients/consumers. The standards are intended to be inclusive of all cultures and not limited to any particular population group or sets of groups. However, they are especially designed to address the needs of racial, ethnic, and linguistic population groups that experience unequal access to health services. Ultimately, the aim of the standards is to contribute to the elimination of racial and ethnic health disparities and to improve the health of all Americans<sup>112</sup>.

The 14 standards are divided into those that are mandates, or required for all recipients of federal funds (standards 4, 5, 6 and 7 [table 13]), guidelines for federal, state and national accrediting agencies (standards 1, 2, 3, 8, 9, 10, 11, 12 and 13), and recommendations, which are suggested for voluntary adoption by health care organizations (standard 14)<sup>113</sup>.

### Table 13. CLAS Standards

#### Standard 4

Healthcare organizations must offer and provide language assistance services, including bilingual staff and interpreter services, at no cost to each patient/consumer with limited English proficiency at all points of contact, in a timely manner during all hours of operation.

#### Standard 5

Healthcare organizations must provide to patients/consumers in their preferred language both verbal offers and written notices informing them of their right to receive language assistance services.

#### Standard 6

Healthcare organizations must assure the competence of language assistance provided to limited English proficient patients/consumers by interpreters and bilingual staff. Family and friends should not be used to provide interpretation services (except on request by the patient/consumer).

#### Standard 7

Healthcare organizations must make available easily understood patient-related materials and post signage in the languages of the commonly encountered groups and/or groups represented in the service area.

## Systemwide communication

- Improve office safety culture through training for all staff.
- Simplify the patient's paperwork demands and avoid duplications.
- Ensure medication review and/or reconciliation for all patients, at all encounters.
- Schedule time for patient education and questions.
- Provide reminder calls to patients.
- Use SBAR (Situation-Background-Assessment-Recommendation) for staff-to-staff communication about patient understanding.
- Identify community literacy resources.

Adapting individual tools to improve interpersonal communication and communication aids will help patients better understand how to manage their care, but to create a safer and shame-free environment, systemwide communications must also be addressed. Communication adverse events can be caused by failures of organization or design and thus systemwide strategies need to be put in place to increase reliability of outcomes. The universal strategies presented below demonstrate and provide system support for individual providers and staff in using effective communication techniques and tools.

## Staff development

Ensuring that all members of the staff understand the importance of health literacy and their role in using Safe Communication Universal Precautions requires ongoing commitment to education, training and awareness-building. Office policies should be in place for annual review to ensure that all new personnel are educated and current staff receives updates. Staff should be made aware of local literacy data and encouraged to identify or share stories where lack of understanding had an emotional or physical impact on patients' care experience.

Position descriptions should be modified to incorporate health literacy-related responsibilities and skills, including working together as a team, managers should be asked to identify health literacy-related planning objectives and employee evaluations should include elements relating to clear, empathic communication skills. Consideration should be given to establishing staff competencies in key health literacy skills like teach-back. Health literacy-related responsibilities should be considered during prospective employee interviews (table 14).

**Table 14. Behavioral questions—receptionists as “directors of first impressions”**

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Front office staff are critical to setting the stage for the patient’s visit, and conveying the office culture to patients. In addition to culture setting, the receptionist often observes behavior that other staff may not see, such as a patient struggling with forms. This may be the only clue to deeper problems, such as low literacy.

The receptionist should be considered the “director of first impressions” for physician offices. Based on this job definition, the following key attributes and behavioral questions may be helpful in conducting prospective employee interviews to identify applicants with the needed skills and behaviors.

**Winning patients**

Continually exceeds patient expectations; uses the patient’s name; finds a way to “say yes” for the patient; takes personal responsibility for satisfying the patient; makes extraordinary situations out of normal events; builds great patient relations.

1. Can you give me an example of how you greeted patients in     (in your last job)     office? What did you do first, second and so on?
2. Give me an example of a time when a patient/customer asked for something that was not allowed by policy or procedure. How did you explain that the answer was “no?”
3. Have you ever received an outstanding citation for customer service by a patient/customer? Explain the circumstances that led to the citation and specifically what you did and/or said to the customer to earn the citation.
4. Give me an example of a time when a patient/customer became very upset in the office or on the phone and acted angry toward you. How did you handle this situation?

**Sensitivity**

Observes and appropriately responds to the needs of others; shows empathy and concern to the patient; genuinely concerned about the well-being of others.

1. Have you ever observed a patient/customer having a hard time filling out paperwork? What did you do?
2. Can you think of a time when a patient/customer came into your office who seemed to be having emotional difficulty? How did you handle this person? What did you say and/or do to respond to their situation?
3. Have you ever observed a co-worker act insensitively toward a patient/customer? Describe the situation and how you responded.

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Developed by Ann Rhoades for AMA Health Literacy Program 2006.

## Simplify paperwork

Patients are often frustrated and confused by the paperwork they must sort through before they can get the care they require. Medical history questionnaires ask unclear questions that may lead patients to skip over them and leave records incomplete. When referred to a new doctor, they must again fill out similar forms. Included among health care documents are informed consent forms. These are generally at a readability level far exceeding that of the majority of U.S. adults, which can result in patients signing them without true understanding.

Providers should critically examine the number and type of documents that patients and their families are asked to read, understand and complete. Efforts should be made to reduce the number and complexity of forms. This is an office flow issue that must be undertaken by the whole health care team. Documents should be assessed to determine

what information is truly needed and how forms are designed. The focus should be on patient-centeredness and creating documents that are reader-friendly, and the principles of reader-friendly print materials should be utilized<sup>114</sup>.

Iowa Health System is undertaking such a critical examination of its surgical consent form and process. Several factors precipitated this change, including the complexity of the consent form, the national focus on health literacy and patient safety concerns about lack of full comprehension of the informed consent process. With collaborative input from health literacy teams, new readers/adult learners, risk managers, providers, surgical services personnel and the Iowa Health System Law Department, a new health-literate surgical consent form was developed (table 15). The original consent form was revised from a 16+ grade level to a 7+ grade level.

**Table 15: Iowa Health System surgical consent form sample**

### Original

I, \_\_\_\_\_, hereby authorize Dr. \_\_\_\_\_ and/or such assistants as may be selected by him/her and \_\_\_\_\_ Hospital, its staff, employees or designees, to treat the condition or conditions which appear indicated by the diagnostic studies already performed.

### Health literate

I, \_\_\_\_\_ (patient's name), agree for Dr. \_\_\_\_\_, along with any assistants the doctor may choose, to do this surgery or procedure on me at \_\_\_\_\_ (facility):

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Name of surgery or name of procedure in medical words—including left, right or level  
(Doctor or healthcare worker fills this out)

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Name of surgery or name of procedure in my own words  
(What the patient or family says back to the doctor or healthcare worker—quote patient or family)

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Several Iowa Health System affiliates have implemented the reader-friendly consent form, and have received positive feedback from providers, hospital staff, patients and their families. Nurses report they are able to clearly evaluate the patient's understanding of their surgery and value the use of teach-back in the process. Some patients and families report liking the easier-to-read consent form and being asked to state back in their own words their understanding of the procedure.

### Medication management

Medication management is among the top patient safety issues for physicians. More than 40 percent of Americans take at least one prescription drug; 16 percent take at least three<sup>115</sup>. Prescription medication spending comprises about one-tenth of total U.S. health care expenditures and is the fastest growing health care cost<sup>116</sup>. Medication-related errors and severe adverse drug events have been documented at high rates<sup>117</sup>. These medication errors stem, in large part, from poor communication. The National Quality Forum considers inadequate provider-patient communication and patient confusion over basic directions to be issues of high priority for improvement.<sup>118</sup>

The increasing prevalence of chronic diseases, like diabetes and cardiovascular conditions, makes it incumbent on health systems to ensure patients have the knowledge and skills to manage their health and medications.<sup>119</sup> Problems arise when there are discrepancies between what the physician and the patient understand to be the prescribed medication treatment. In a study of patients prescribed hypertensive medications, when asked what they were taking for this condition, only 23 percent could name two or more of their antihypertensive medications.<sup>120</sup> Patients with low health literacy are at even greater risk. In the same study, of individuals with inadequate health literacy, 60 percent could not name any of their hypertension medications.<sup>120</sup> This type of medication

miscommunication leads to poor health outcomes.<sup>121</sup> It has been shown that during office visits physicians explicitly instructed only 55 percent of patients about the number of tablets to take, only 58 percent of the time did they explain the frequency and timing of dosing and only 34 percent of the time the duration of the regimen.<sup>122</sup> The 2003 National Assessment of Adult Literacy demonstrates that close to 50 percent of the population is at risk for misunderstanding simple prescription labels.<sup>6</sup> Recent studies have confirmed this risk, showing that many patients have difficulties understanding common prescription labels and dosing instructions, and subsequently cannot demonstrate correctly how to take medications.<sup>123,124,125</sup>

To make the system of medication management more reliable, processes can be standardized. For medication management, the physician needs to elicit understanding, identify information gaps and assist patient management of care. The following advance organizers<sup>126</sup> are useful prompts for the physician to organize the medication discussion and for the patient to teach it back.

- What is the name of the medication?
- How do I need to take it (e.g., time[s] of day taken, with food, at work or away from home)
- Why is it important for me to take it?
- What other medicines, herbals, supplements, drops or sprays am I taking?
- Did I take it the way you told me to? (When was the last time I took it? When was the time before that? What do I do when I make a mistake? Do I ever skip medications or double up?)
- Is it making me feel better or worse?

Patients' ability to name their medications and describe their purposes and dosing can be an indicator of understanding.<sup>128</sup> Patients with low health literacy may rely on the appearance of the tablet or capsule, or a few key letters in the medication's name, to determine what they are taking. Tools are available that can assist in determining a patient's understanding of medication management.

A process called medication reconciliation can help clarify a patient's medication regimen. Medication reconciliation is "a process of identifying the most accurate list of all medications a patient is taking—including name, dosage, frequency and route."<sup>127</sup> Conducting medication reconciliation provides a list of all the patient's prescribed medications, but this may differ from what the patient is actually taking. "Brown bag medication review," i.e., asking patients to bring all their medications to the medical encounter and reviewing them with their provider, is a useful tool to assess a patient's understanding of medication use and dosing and to clarify what medications the patient is actually taking.

Other approaches include a DRUGS protocol in which patients demonstrate what they know about their medicines and how accurately they can explain what these medications do.<sup>128, 129</sup> Visual medication schedules and the use of teach-back appear to improve concordance and promote safety.<sup>130</sup> Formal lists, patient records on smart cards, talking pill bottles, automated telephone management and electronic medical record systems with after-visit summaries are all being tested to determine if they can improve patient understanding and medication safety.

The Joint Commission has added a clarification to its 2007 National Patient Safety Goals stating that "the complete list of medications is also provided to the patient on discharge."<sup>47</sup> In other words, the patient has the need and the right to know and understand his or her own medications. Nevertheless, written materials alone are not as effective as interactive ways of communicating medication management. Tools that have proved most effective are those that encourage dialogue with the patient, use visuals to explain regimens and ask the patient to demonstrate how to follow prescription directions as a means of ensuring understanding so that patients can comply.<sup>101, 125, 131</sup>

## SBAR

To ensure that the entire health care team adopts the processes of improving health literacy and safety, a tool like SBAR—Situation, Background, Assessment, Recommendation—can be used to convey important information about communication needs and understanding.

SBAR is a standardized communication tool adapted from the U.S. Navy that is increasingly used in patient safety. SBAR provides structured communication based on key words and critical language. It enhances the predictability of how communication occurs, dictates succinct information exchange and empowers everyone on the health care team to monitor patient safety (figure 6).

### Figure 6. SBAR in action

#### S—Situation

**The problem I see is:** Mrs. Jones may have difficulty reading.

#### B—Background

**Here is where I saw a problem:** She had the clipboard twice as long as other patients, and it was only half completed.

#### A—Assessment

**Here is what's been happening:** She missed two appointments and never asks questions. Today, she took a "Need help reading?" pamphlet.

#### R—Recommendation

**Be sure all her questions are answered and she understands directions.** When the time seems right, address her comfort with reading.

Adapted from: Nielsen G. Health Literacy: Helping Your Patients Understand. Presented at: IHI 18th Annual National Forum on Quality Improvement in Health Care; Dec. 10, 2006; Orlando, FL.

SBAR is useful for all interstaff communication, including physician-to-physician, nurse-to-physician, nurse-to-nurse or receptionist-to-medical assistant. SBAR empowers staff to speak assertively and "stop the line," if needed, to address a safety concern. Using this tool creates an environment of respect, promotes critical thinking and streamlines communication, ensuring no crucial information is omitted.

Adapting this safety tool to health literacy creates a vehicle for all members of the health care team to convey information about potential health literacy difficulties as patients move through health care encounters. Observations of communication red flags (e.g., frequent failure to keep appointments) should be passed along to other staff and providers so they can check for and ensure understanding of important health information. SBAR is a useful tool for front office staff to transmit health literacy and communication concerns to clinical staff for further assessment, increased assurance of understanding and possibly additional interventions. It should also be used to pass such information along to subsequent care providers at all patient handoffs, including referrals, and hospital admissions and discharges. In situations where it is critical that patients understand and participate in decision making, such as the consent process, SBAR can be a tool to enable staff to request additional clarification and information for patients (figure 7).

## Figure 7. SBAR in action: Informed consent

### S—Situation

**The problem I see is:** Mr. Smith may not understand the procedure.

### B—Background

**Here is where I saw a problem:** He says he is having surgery on his right knee and the consent form says the left knee. Or, he (his family) is showing signs of not understanding the procedure (language barrier). Or, he wants to speak to the physician right now.

### A—Assessment

**Here is what's been happening:** He is frustrated, dissatisfied or confused. I believe the patient may not be informed.

### R—Recommendation

**I suggest you affirm that Mr. Smith has given consent.** Or, I suggest you elicit patient understanding. Or, I suggest we call an interpreter to assist the patient in understanding and giving consent.

## Patient education

Reducing a patient's risk of communication adverse events extends beyond the office visit. A patient's safety can be at even greater risk if proper self-management is not understood once the patient leaves the office. Patient education that ensures understanding is crucial for effective self-management. Every practice should consider how to put processes in place that will enhance the patient capacity for self-management.

For example, a patient may have multiple chronic conditions and the staff has noticed red flags for communication issues in the past. The provider, having done a teach-back, recognizes the need for a plan for health literacy help. These are the important first steps, but processes must be in place to then implement the next steps. The front office staff, knowing a patient needs more time for education, could schedule a longer visit. A nurse practitioner could complete several teach-backs with the patient or a medical assistant could inform the patient about community resources and place calls on his or her behalf to establish contact. Whatever the process to elicit understanding is, the health care team needs to have a plan in place for removing barriers and implementing the educational process.

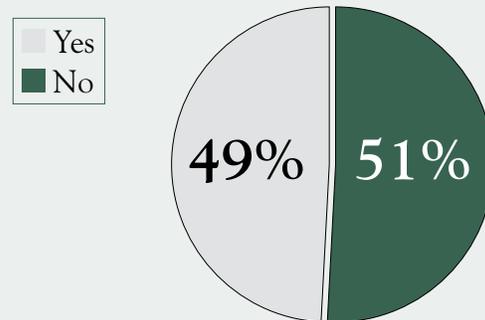
A diabetes disease-management program that improved care for a vulnerable population with type 2 diabetes mellitus was implemented with modest labor and cost. The intervention included 12 months of intensive management from clinical pharmacists as well as a diabetes care coordinator who provided education, applied algorithms for medication management and addressed barriers to care. The incremental program cost was \$36.97 (sensitivity analysis, \$6.22-\$88.56) per patient per month.<sup>132</sup> This cost is modest in comparison with the usual care response to patients whose diabetes is out of control (i.e., prescribing additional medications, potential hospitalization).

Time and resource inefficiencies are inherent in traditional methods of educating patients about self-management of chronic health conditions, and current patient education models may not be effective. Attention to low health literacy in patient education has led to new approaches that show improved patient outcomes through patient-centered education models. Different approaches may work better for different patients. An automated telephone disease-management program has been demonstrated to be a useful self-management support system for identifying adverse events and promoting safety among patients with diabetes and language and literacy barriers.<sup>133</sup>

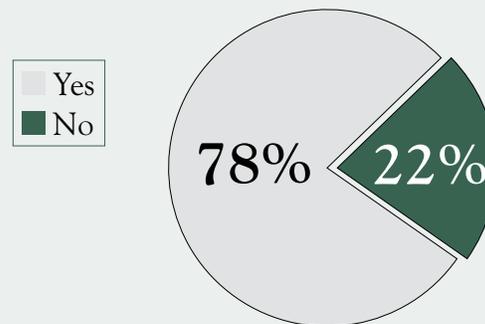
A combination of education tactics can be employed for better results. In a small pilot study assessing patients' understanding of discharge education about daily weighing and congestive heart failure, a telephone call following discharge determined that only about half the patients were weighing themselves correctly. Teach-back was then used to re-educate the patients about appropriate weighing. At an additional call a week later, three-fourths of the patients were weighing themselves correctly (figure 8).

**Figure 8. Percentage of patients self-weighing correctly: Use of teach-back during first call post-discharge**

**At the first callback**



**At the one-week callback**



**Iowa Health System:**

Health literacy post-discharge intervention with CHF patients. Failure to weigh daily determined to be a primary contributor to readmission. Patients are called at 48 hours and one week post-discharge. Teach-back is used to clarify patient understanding.

Adapted from: Small pilot study. Iowa Health System, 2004.

Some communication initiatives have been shown to save money. In one setting, providing organized, simplified, concrete pre-operative instructions incorporated into reminder calls reduced same-day surgical procedure cancellations from 8 percent to 0.8 percent, resulting in substantial savings since unused operating time was estimated to cost \$70 per minute.<sup>134</sup>

### Community literacy resources

Partnering with patients and adult literacy programs brings new perspectives, sensitivity and resources to the practitioner and can help providers learn about adult literacy resources in their communities. When a referral is made to an adult literacy program, it should be done in the context of the patient-provider relationship, with sensitivity to the shame and stigma associated with low literacy.

One office process that encourages open, nonjudgmental communication is the DIRECT tool (table 16). The DIRECT tool can be a useful way to approach patients with low health literacy in the outpatient setting. Use of this tool at an inner city clinic resulted in increased identification of low literacy, such that referrals to adult education increased from eight over a two-year period to two to three referrals per week.<sup>135</sup> For this approach to succeed, the health care team must be armed with useful information and knowledge of local resources once low literacy has been determined.

**Table 16. DIRECT**

- D**—Ask about **difficulty reading**: “Have you ever had a problem with reading?”
- I**— Ask if they have an **interest in improving**: “Would you be interested in a program to help you improve your reading?”
- R**—Have **referral information** for adults and family literacy programs ready to give to patients identified with reading difficulty.
- E**—Ask **everyone** about their literacy skills. Let patients know it is your policy to ask everyone.
- C**—Emphasize that low literacy is a **common problem** and they are not alone: “Half of Americans have some difficulty with reading!”
- T**—**Take down barriers** to joining literacy classes (e.g., help with the initial phone call, have informational sessions at the clinic, make follow-up contact with patients to see if they were able to find the right class, etc.).

Most importantly, **take down barriers** to providing effective care (e.g., ensure patient understanding of treatment plan, provide appropriate handouts, do “medication reviews,” etc.).

Patient barriers to attending adult and family literacy programs include lack of knowledge about programs, transportation, inconvenient times, busy schedules, lack of child care, space limitations, long waiting lists and intensive time commitments.<sup>136</sup> Practices can lessen these barriers by having a list of appropriate referrals in various locations, helping patients make the initial call, hosting information sessions at the clinic and following up with patients to see if they were able to find the right class. Efforts will vary between literacy sites, depending on the patient population and program availability.

To find appropriate local programs, providers can contact:

- The National Institute for Literacy: (888) 228-8813; [www.literacydirectory.org](http://www.literacydirectory.org)
- ProLiteracy Worldwide: (888) 528-2224; [www.proliteracy.org/locator](http://www.proliteracy.org/locator)
- Local public libraries, community colleges and mutual aid societies

### Table 17. Resources for partnering with adult literacy programs

- Archie Willard home page: [www.readiowa.org/archiew.html](http://www.readiowa.org/archiew.html)
- VALUE: [www.literacynet.org/value](http://www.literacynet.org/value)
- World Education: [www.worlded.org](http://www.worlded.org)
- Health Literacy Consulting: [www.healthliteracy.com](http://www.healthliteracy.com)
- Health Literacy Month: [www.healthliteracymonth.org](http://www.healthliteracymonth.org)
- Plain Language Association International: [www.plainlanguagenetwork.org](http://www.plainlanguagenetwork.org)
- U.S. Department of Health and Human Services, Office of Minority Health: [www.omhrc.gov](http://www.omhrc.gov)

## Implementing the approaches and tools

The previous section presented many tools to address health literacy issues and to transform a practice environment. Putting these new tools and skills into action can seem like a daunting task. In this implementation phase, the health care team needs to maintain a personal sense of accountability to try out new skills and strive for improvement. It will be easier to break with the status quo if there is a sense of manageable change and steady progress.

Small tests of change called PDSA (Plan-Do-Study-Act) cycles, enable physicians and their office teams to quickly and easily adapt health literacy strategies for their settings, rather than try to implement sweeping policies that require major changes to longstanding practice patterns. Testing small changes and then continuing to test them with more patients under a variety of conditions can lead to sustained changes that result in improvement. When teams are comfortable with use of the PDSA process, tests can be conducted with additional health literacy-related interventions (table 18). Many of the tools and approaches in this monograph were developed through small tests of change that proved effective.<sup>137</sup>

### Table 18. Plan-Do-Study-Act cycle

#### Step 1: Plan

Plan the test or observation, including a plan for collecting data.

- State the objective of the test.
- Make predictions about what will happen and why.
- Develop a plan to test the change. (Who? What? When? Where? What data needs to be collected?)

#### Step 2: Do

Try out the test on a small scale.

- Carry out the test.
- Document problems and unexpected observations.
- Begin analysis of the data.

#### Step 3: Study

Set aside time to analyze the data and study the results.

- Complete the analysis of the data.
- Compare the data to your predictions.
- Summarize and reflect on what was learned.

#### Step 4: Act

Refine the change, based on what was learned from the test.

- Determine what modifications should be made.
- Prepare a plan for the next test.

Source: Institute for Health Care Improvement. Available at: <http://www.ihc.org/IHI/Topics/Improvement/ImprovementMethods/HowToImprove/testingchanges.htm>. Accessed February 26, 2007.

## Assessing progress

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As part of a health literacy and patient safety strategy, physicians should set goals to drive and assess progress. A long-term goal provides guidance and motivation, but beginning with one or two key areas provides focus and allows everyone to observe and experience progress. Start with discrete goals like using teach-back with patients who have diabetes, changing a patient handout or implementing a standard to offer every patient help with forms. Assessments used initially for baseline data can become useful tools to track improvements. They can demonstrate changes that are the result of small initiatives, as well as major improvements over time.

New processes tested through PDSA cycles that appear promising can be expanded to test for efficacy and feasibility over time and under a variety of conditions (e.g., slow and busy times, with numerous providers, for patients with a variety of conditions). Eventually, for the processes to have lasting effect, they must be hard-wired into normal operating procedures, such as job descriptions, office policies and system flow. Ultimately, addressing health literacy requires a cultural shift and a commitment to continuous improvement.

# Conclusion

Recognition is increasing nationally about the importance of health literacy, and will likely result in additional recommendations and standards for patient care. In addition to the AMA, health organizations addressing health literacy include, among others: the American Academy of Family Physicians, American Academy of Neurology, American Academy of Pediatrics, American College of Physicians, Centers for Medicare and Medicaid Services, Joint Commission, National Quality Forum, Institute for Healthcare Improvement, National Patient Safety Foundation, and America's Health Insurance Plans.

Reducing communication adverse events and creating a safer health care environment for everyone will have important benefits to patients, physicians and the health care system. Patients will better understand what they need to do to care for themselves or their loved ones, and will feel comfortable asking for clearer or additional information. This will enhance satisfaction, self-efficacy and, potentially, health outcomes. Physicians who use strategies to ensure patient understanding will have a more smoothly run and personally satisfying practice environment, experience increased patient, staff and professional satisfaction, reduce liability, and have the ability to demonstrate delivery of care that is safe, patient-centered, equitable and of high quality. By integrating health literacy principles into routine operations, the health care system will experience a positive impact on efficiency, costs and quality.

15th Annual New Readers Conference, 2004  
Adult Learners' Statement

About communicating with new readers:

*"We have always been here. We've always been the backbone of this country. We need help from doctors now. We need the best explanations about tests, procedures, and prescriptions and their side effects. We want to tell doctors that we need help to help ourselves and our families. Slow down and take your time. Treat us as you would like to be treated. Simplify your work so that it can be cost-efficient for both patients and doctors. Once you find out we have reading problems, you should do follow-ups. We are human beings that need to be understood. Make sure that we understand. It's about human respect. Yes, we lack a skill. But we're not 'less than'."*

# Continuing Medical Education questions

This is a continuing medical education (CME) activity sponsored by the AMA. A certificate documenting your participation in the CME activity will be forwarded to you upon successful achievement of a score of 70 percent.

The educational program *Help patients understand: Reducing the risk by designing a safer, shame-free health care environment* contains the correct answers for the following 13 questions. Record your answer to each question by circling the corresponding letter on the CME answer sheet provided.

The AMA designates this education activity for a maximum of 2.5 AMA PRA Category 1 Credits™. Physicians should only claim credit commensurate with the extent of their participation in the activity.

1. As long as a physician discloses information to a patient the physician has fulfilled the duty of informed consent.
  - a) True
  - b) False
2. Patients who miss appointments may have a viable lawsuit if they can prove their failed appointment resulted from a physician's unclear, inadequate or omitted instructions and/or advice.
  - a) True
  - b) False
3. In a medical office environment, who should be trained to identify red flags?
  - a) Physicians
  - b) Patients
  - c) Front office staff
  - d) A and c
  - e) A, b and c
4. Which is not a characteristic of a shame-free environment?
  - a) Providing assistance to patients in completing check-in forms
  - b) Utilizing clear and easy to follow signage
  - c) Administering literacy tests to patients
  - d) Providing directions to the sites of patients' referrals
5. The teach-back method assesses understanding by asking the questions, "Do you understand?" or "Do you have any questions?"
  - a) True
  - b) False
6. Low health literacy can lead to:
  - a) Shame and failure to seek care
  - b) Costs of repeat visits
  - c) Complications from improper medication dosing
  - d) All of the above
7. Red flags for low health literacy include:
  - a) Skipped tests and referrals
  - b) Lack of questions
  - c) Incomplete registration forms
  - d) A and c
  - e) A, b and c
8. To minimize communication adverse events, health literacy tools should only underlie encounters with individuals identified as low literacy patients.
  - a) True
  - b) False

9. In order to successfully transform a practice environment, who needs to be involved?
- a) Physicians
  - b) Executive management
  - d) Front office staff
  - c) Nursing staff
  - d) All of the above
10. Patient information materials can be improved by:
- a) Including graphs and charts from research articles
  - b) Eliciting patient feedback on written materials
  - c) Utilizing universally recognized images
  - d) A and c
  - e) B and c
11. Health literacy interventions are increasingly necessary in today's health care settings because of:
- a) More pharmaceuticals in the market
  - b) Complex self-management regimens
  - c) An increasingly older population with more chronic conditions
  - d) Shorter hospital stays
  - e) All of the above
12. A high reliability organization is one in which there is collaboration across ranks to seek solutions to vulnerabilities.
- a) True
  - b) False
13. The continuum of confusion demonstrates:
- a) How a patient should manage care
  - b) Financial harm to the health care system
  - c) The patient's right to understand
  - d) Points of contact where misunderstanding can occur

# Continuing Medical Education answer sheet

Please return this form and program evaluation via mail or fax to:

Division of Continuing Physician Professional Development  
American Medical Association  
515 N. State St.  
Chicago, IL 60610  
Fax: (312) 464-4567

Circle your responses

- |       |   |   |   |   |   |
|-------|---|---|---|---|---|
| Q 1.  | a | b |   |   |   |
| Q 2.  | a | b |   |   |   |
| Q 3.  | a | b | c | d | e |
| Q 4.  | a | b | c | d |   |
| Q 5.  | a | b |   |   |   |
| Q 6.  | a | b | c | d |   |
| Q 7.  | a | b | c | d | e |
| Q 8.  | a | b |   |   |   |
| Q 9.  | a | b | c | d | e |
| Q 10. | a | b | c | d | e |
| Q 11. | a | b | c | d | e |
| Q 12. | a | b |   |   |   |
| Q 13. | a | b | c | d |   |

Please print and include all information requested:

Name \_\_\_\_\_

Address \_\_\_\_\_

City \_\_\_\_\_

State/ZIP \_\_\_\_\_

Phone \_\_\_\_\_

Fax \_\_\_\_\_

Medical school \_\_\_\_\_

Year of graduation \_\_\_\_\_

ME#\* \_\_\_\_\_

Hours of participation claimed (not to exceed 2.5) \_\_\_\_\_

Signature \_\_\_\_\_

\*The Medical Education Number (ME#) is an 11-digit number assigned to every physician in the United States by the AMA. It is found on your AMA membership card and the mailing labels of *JAMA*, *American Medical News* and *Archives* specialty journals, or you can obtain your ME# by calling the AMA at (800) 262-3211.

What change(s) do you plan to make in your practice as a result of studying the materials in this *Help patients understand: Reducing the risk by designing a safer, shame-free health care environment* monograph?

Comments:

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

Did you perceive commercial bias during this activity?

Yes  No

If yes, please specify:

\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

(continued on back page)

## Program evaluation

Please rate how this activity helped you to do the following:

	<b>Strongly agree</b>	<b>Agree</b>	<b>Neutral</b>	<b>Disagree</b>	<b>Strongly disagree</b>
Defined the scope of patient safety problems caused by low health literacy	<input type="checkbox"/>				
Provided me with ethical and legal foundations for safe medical practices and patient-centered care	<input type="checkbox"/>				
Explained patient safety practices that reduce risks for patients with low health literacy	<input type="checkbox"/>				
Identified steps toward establishing a climate for change to mitigate health literacy risks	<input type="checkbox"/>				
Provided me with tools and resources for creating safer practice environments	<input type="checkbox"/>				
Demonstrated how to utilize and implement these tools	<input type="checkbox"/>				
	<b>Excellent</b>	<b>Above</b>	<b>Good</b>	<b>Below</b>	<b>Poor</b>
Overall quality and organization of the content	5	4	3	2	1
Usefulness in my practice	5	4	3	2	1
Would recommend it to my peers	5	4	3	2	1
Would recommend it to my office staff	5	4	3	2	1

## Communication Assessment Tool

Communication with patients is a very important part of quality medical care. We would like to know how you feel about the way your doctor communicated with you. Your answers are completely confidential, so please be open and honest. Thank you very much.

**1**                      **2**                      **3**                      **4**                      **5**  
**poor**                      **fair**                      **good**                      **very good**                      **excellent**

**Please use this scale to rate the way the doctor communicated with you. Circle your answer for each item below.**

<b>The doctor</b>	<b>poor</b> <b>excellent</b>				
Greeted me in a way that made me feel comfortable	1	2	3	4	5
Treated me with respect	1	2	3	4	5
Showed interest in my ideas about my health	1	2	3	4	5
Understood my main health concerns	1	2	3	4	5
Paid attention to me (looked at me, listened carefully)	1	2	3	4	5
Let me talk without interruptions	1	2	3	4	5
Gave me as much information as I wanted	1	2	3	4	5
Talked in terms I could understand	1	2	3	4	5
Checked to be sure I understood everything	1	2	3	4	5
Encouraged me to ask questions	1	2	3	4	5
Involved me in decisions as much as I wanted	1	2	3	4	5
Discussed next steps, including any follow-up plans	1	2	3	4	5
Showed care and concern	1	2	3	4	5
Spent the right amount of time with me	1	2	3	4	5
<b>The doctor's staff</b>	<b>poor</b> <b>excellent</b>				
Treated me with respect	1	2	3	4	5

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## Patient safety culture survey: Ambulatory care

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The purpose of this questionnaire is to understand how you feel about medication safety in your clinic. This survey is completely anonymous. Results of the survey will be reported out by clinic or work group in aggregate. Information from this survey will be used for research purposes associated with the PeaceHealth Shared Medication List study. **For each statement please indicate how much you agree—disagree with each statement.**

1. The culture of this clinic makes it easy to learn from the medication mistakes of others.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

2. Medication errors are handled appropriately in this clinic.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

3. The management/leadership in our clinic listens to me and cares about my medication safety concerns.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

4. The physicians in our clinic listen to me and care about my medication safety concerns.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

5. Leadership in [region] is facilitating us to be a medication safety-centered clinic.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

6. My suggestions about medication safety would be acted upon if I expressed them to clinic management.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

7. The management/leadership of this clinic does not knowingly compromise safety concerns for the sake of productivity.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

8. I am encouraged by my colleagues in this clinic to report any medication safety concerns I may have.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

9. I know the proper channels to direct questions regarding medication safety in this clinic.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

10. If a member of my immediate family were to be a patient in this clinic (not my patient) I would have no concern at all about possible medication errors.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

11. This clinic is doing more for medication safety now than it was one year ago.  
 Strongly Disagree       Disagree       Not Sure       Agree       Strongly Agree

---

12. Medication safety in this clinic is approached as a process of care issue and not a personal blame issue.
- Strongly Disagree     Disagree     Not Sure     Agree     Strongly Agree
- 
13. The health care providers in this clinic take responsibility for patient medication safety.
- Strongly Disagree     Disagree     Not Sure     Agree     Strongly Agree
- 
14. In this clinic we have clearly defined rules and guidelines for medication safety.
- Strongly Disagree     Disagree     Not Sure     Agree     Strongly Agree
- 
15. The health care providers in this clinic frequently disregard rules or guidelines for medication safety.
- Strongly Disagree     Disagree     Not Sure     Agree     Strongly Agree
- 
16. Medication safety is constantly reinforced as a priority in this clinic.
- Strongly Disagree     Disagree     Not Sure     Agree     Strongly Agree
- 
17. I often worry about whether I have all of the information I need to make sure that a medication is prescribed safely for a patient.
- Strongly Disagree     Disagree     Not Sure     Agree     Strongly Agree
- 

Adapted from: PeaceHealth<sup>93</sup>

1. American Medical Association. Policy H-160.931 Health literacy.
2. These resources include the text, *Understanding Health Literacy: Implications for Medicine and Public Health*, Safe Communication Universal Precautions Tip Cards, and the *Health Literacy Educational Kit*. For more information visit [www.amafoundation.org/go/healthliteracy](http://www.amafoundation.org/go/healthliteracy).
3. 2004 Iowa Physicians Needs Assessment, Iowa Medical Society (IMS).
4. Ratzan SC, Parker RM. Introduction. In: Selden CR, Zorn M, Ratzan SC, Parker RM, Editors. *National Library of Medicine Current Bibliographies in Medicine: Health Literacy*. NLM Pub. No. CBM 2000-1. Bethesda, MD: National Institutes of Health, US Department of Health and Human Services; 2000.
5. Institute of Medicine. *Health Literacy. A Prescription to End Confusion*. Washington, DC: National Academies Press; 2004.
6. Kutner M, Greenberg E, Jin Y, Paulsen C. *The Health Literacy of America's Adults: Results from the 2003 National Assessment of Adult Literacy*. NCEES 2006-483. Washington, DC: National Center for Education Statistics, US Department of Education; 2006.
7. Kripalani S, Henderson LE, Chiu EY, Robertson R, Kolm P, Jacobson TA. Predictors of medication self-management skill in a low-literacy population. *J Gen Intern Med*. 2006;21:852-856.
8. Williams MV, Baker DW, Honig EG, Lee TM, Nowlan A. Inadequate literacy is a barrier to asthma knowledge and self-care. *Chest*. 1998;114:1008-1015.
9. Schillinger D, Grumbach K, Piette J, et al. Association of health literacy with diabetes outcomes. *JAMA*. 2002;288:475-482.
10. Williams MV, Baker DW, Parker RM, Nurss JR. Relationship of functional health literacy to patients' knowledge of their chronic disease. *Arch Intern Med*. 1998;158:166-172.
11. Rothman RL, Malone R, Bryant B, et al. The spoken knowledge in low literacy in diabetes scale; a diabetes knowledge scale for vulnerable patients. *Diabetes Educ*. 2005;31:215-224.
12. Sarkar U, Fisher L, Schillinger D. Is self-efficacy associated with diabetes self-management across race/ethnicity and health literacy? *Diabetes Care*. 2006;29:823-829.
13. Kalichman SC, Rompa D. Functional health literacy is associated with health status and health-related knowledge in people living with HIV-AIDS. *J Acq Imm Def Synd Hum Retrovir*. 2000;25:337-344.
14. Doak CC, Doak LG, Root JH. *Teaching Patients With Low Literacy Skills*. 2nd ed. Philadelphia: J.B. Lippincott Company; 1996:65.
15. Parikh NS, Parker RM, Nurss JR, Baker DW, Williams MV. Shame and health literacy: the unspoken connection. *Patient Educ Consel*. 1996;27:33-39.
16. Schillinger D, Bindman A, Wang F, Stewart A, Piette J. Functional health literacy and the quality of physician-patient communication among diabetes patients. *Patient Educ Couns*. 2004;52:315-323.
17. Kennen EM, Marin L, Davis TC. Stories of women, words, and well-being: the effect of literacy on women's health. *Woman Studies Q*. 2004;1/2:90-99.
18. Howard DH, Gazmararian J, Parker RM. The impact of low health literacy on the medical costs of Medicare managed care enrollees. *Am J Med*. 2005;118:371-377.
19. Baker DW, Gazmararian JA, Williams MV, et al. Functional health literacy and the risk of hospital admission among Medicare managed care enrollees. *Am J Public Health*. 2002;92:1278-1283.
20. Peterson AM, Takiya L, Finley R. Meta-analysis of trials of interventions to improve medication adherence. *Am J Health-Syst Pharm*. 2003;60:657-665.

21. National Quality Forum. *Improving Patient Safety Through Informed Consent for Patients with Limited Health Literacy, An Implementation Report*. Washington, DC: National Quality Forum; 2005:18.
22. Hickson GB, Federspiel CF, Pichert JW, Miller CS, Gauld-Jaeger J, Bost P. Patient complaints and malpractice risk. *JAMA*. 2002;287:2951-2957.
23. Physicians Insurers Association of America. *Neurology Study*. Rockville, MD: Physician Insurers Association of America; 2004.
24. Menke AM. Noncompliance: A Frequent Prelude to Malpractice Lawsuits. Ophthalmic Mutual Insurance Company. Available at: [http://www.omic.com/resources/risk\\_man/forms/managed\\_care/noncompliance.rtf](http://www.omic.com/resources/risk_man/forms/managed_care/noncompliance.rtf). Accessed February 27, 2007.
25. These efforts can be documented with the SOAP UP tool found on pg 34.
26. Centers for Disease Control and Prevention, National Center for Chronic Disease Prevention and Health Promotion. Chronic Disease Notes and Reports. Available at: <http://www.cdc.gov/nccdphp/publications/cdnr/pdf/cdfall99.pdf>. Accessed February 19, 2007.
27. Eichner J, Blumenthal D, eds. *Medicare in the 21st Century: Building a Better Chronic Care System*. Washington, DC: National Academy of Social Insurance; 2003.
28. Medical Expenditure Panel Survey. Available at: <http://www.meps.ahrq.gov>. Accessed February 19, 2007.
29. Partnership for Solutions, *Medicare: Cost and Prevalence of Chronic Conditions*. Baltimore, MD: Johns Hopkins University; 2002.
30. Kutner M, Greenberg E, Jin Y, Paulsen C. *The Health Literacy of America's Adults: Results from the 2003 National Assessment of Adult Literacy* (NCES 2006-483). US Department of Education. Washington D.C.: National Center for Education Statistics; 2006.
31. Sudore RL, Mehta KM, Simonsick EM, et al. Limited literacy in older people and disparities in health and healthcare access. *J Am Geriatr Soc*. 2006;54:770-776.
32. Flores G. Language barriers to health care in the United States. *N Engl J Med*. 2006;355:3.
33. Flores G, Laws MB, Mayo SJ, et al. Errors in medical interpretation and their potential clinical consequences in pediatric encounters. *Pediatrics*. 2003;111:6-11.
34. Flores G. The impact of medical interpreter services on the quality of health care: a systematic review. *Med Care Res Rev*. 2005;62:255-299.
35. American Medical Association, American Academy of Home Care Physicians. *Medical Management of the Home Care Patient*. Chicago: American Medical Association and American Academy of Home Care Physicians; 2007.
36. ISMIE presentation at Health Literacy Patient Safety Advisory Panel Meeting. April 2005.
37. Institute of Medicine. *Health Literacy. A Prescription to End Confusion*. Washington, DC: National Academies Press; 2004: 116.
38. Parker RM, Ratzan SC, Lurie N. Health literacy: a policy challenge for advancing high-quality health care. *Health Affairs*. 2003;22:147-153.
39. Fernald DH, Pace WD, Harris DM, West DR, Main DS, Westfall JM. Event reporting to a primary care patient safety reporting system: a report from the ASIPS Collaborative. *Ann Family Med*. 2004;2:327-332.
40. Agency for Healthcare Research and Quality. *Patient Safety Network Glossary*. Available at: <http://www.psnet.ahrq.gov/glossary.aspx#rootcauseanalysis>. Accessed February 27, 2007.
41. Loeb J. Health Literacy and Adverse Events: Learning From Error. Presented at: Reading, Writing and Arrhythmias. Health Literacy: The Foundation for Patient Safety, Empowerment, and Quality Health Care; Rosemont, IL; June 26-27, 2006.

42. Rogers WJ, Canto JG, Lambrew CT, et al. Temporal trends in the treatment of over 1.5 million patients with myocardial infarction in the US from 1990 through 1999: the National Registry of Myocardial Infarction 1, 2 and 3. *J Am Coll Cardiol.* 2000;36:2056-2063.
43. Lied TR, Gonzalez J, Taparanskas W, Shukla T. Trends and current drug utilization patterns of Medicaid beneficiaries. *Health Care Financ Rev.* 2006;27(3):123-32.
44. Nodhturft V, Schneider JM, Hebert P, et al. Chronic disease self-management: improving health outcomes. *Nurs Clin North Am.* 2000;35:507-518.
45. Gandhi TK, Weingart SN, Borus J, et al. Adverse drug events in ambulatory care. *N Engl J Med.* 2003;348:1556-1564.
46. National Quality Forum. *Implementing a National Voluntary Consensus Standard for Informed Consent, A User's Guide to Healthcare Professionals.* Washington, DC: National Quality Forum; 2005.
47. 2007 National Patient Safety Goals. *Jt Commn Perspectives, The Official Joint Commission Newsletter.* 2006;26:17.
48. Smith DL. The effect of patient noncompliance on health care costs. *Med Interface.* 1993;6:74-84.
49. Sokol MC, McGuigan KM, Verbrugge RR, Epstein RS. Impact of medication adherence on hospitalization risk and healthcare cost. *Med Care.* 2005;43:521-530.
50. Howard DH, Gazmararian J, Parker RM. The impact of low health literacy on the medical costs of Medicare managed care enrollees. *Am J Med.* 2005;118:371-377.
51. Burrell CD, Levy RA. Therapeutic consequences of noncompliance. In: *Improving Medication Compliance: Proceedings of a Symposium.* Washington, DC: National Pharmaceutical Council; 1984:7-16.
52. Vermeire E, Hearnshaw H, Van Royen P, Denekens J. Patient adherence to treatment: three decades of research. A comprehensive review. *J Clin Pharm Ther.* 2001;26:331-342.
53. Peterson AM, Takiya L, Finley R. Meta-analysis of trials of interventions to improve medication adherence. *Am J Health-Syst Pharm.* 2003;60:657-665.
54. DiMatteo MR. Variations in patients' adherence to medical recommendations: a quantitative review of 50 years of research. *Med Care.* 2004;42:200-209.
55. *Union Pacific R. Co. v. Botsford*, 141 U.S. 250 (1891).
56. Mazur DJ. Influence of the law on risk and informed consent. *BMJ.* 2003;327:731-736.
57. Beauchamp TL, Childress JF. *Principles of Biomedical Ethics, 58; Moral Norms.* 5th ed. Oxford: Oxford University Press; 2001.
58. *Tashman v. Gibbs*. 263 Va. 65; 546 S.E. 2d 772; 2002 Va. LEXIS 20.
59. *Newell v. Trident Medical Center*. 359 S.C. 4; 597 S.E. 2d 776; 2004 S.C. LEXIS 108.
60. *Guido v. Murray*. 1985 Ohio App. LEXIS 6051.
61. Patient rights recognized in the United States include the legal right of every competent adult to accept or refuse medical treatment; and patients have the right to privacy, to refuse to have anyone involved in their care but their doctors, to obtain a copy of their medical record, and to be free of discrimination. Patient Rights Program, Boston University School of Public Health, Health Law Department. Available at: [www.patient-rights.org](http://www.patient-rights.org). Accessed August 17, 2006.
62. Proceedings of 2005 White House Conference on Aging, Mini-Conference on Health Literacy and Health Disparities. American Medical Association; 2005. Available at: [www.ama-assn.org/go/aging](http://www.ama-assn.org/go/aging). Accessed March 17, 2007.
63. *Canterbury v. Spence*, 464 F.2d 772 (1972).
64. *Id* at 780.
65. *Id*.
66. *Id* at 783.
67. *Id* at 782.
68. *Id* at 783.

69. Schwartzberg JG, VanGeest JB, Wang CC, eds. *Understanding Health Literacy: Implications for Medicine and Public Health*. Chicago: AMA Press; 2004.
70. *Canterbury v. Spence* at 780.
71. *Id* at 782.
72. *Id* at 779 and 782.
73. *Id* at 783.
74. *Id* at 781.
75. *Id* at 787.
76. Aspden P, Corrigan JM, Wolcott J, Erickson SM, eds. *Patient Safety: Achieving a New Standard for Care*. Washington, DC: The National Academies Press; 2004. Stating “patient safety is indistinguishable from the delivery of quality care.”
77. Institute for Healthcare Improvement. Clinical Microsystem Assessment Tool. Available at: <http://www.ihf.org/IHI/Topics/Improvement/ImprovementMethods/Tools/ClinicalMicrosystemAssessmentTool.htm>. Accessed February 27, 2007.
78. Agency for Healthcare Research and Quality. Patient Safety Network Glossary. Available at: <http://www.psnnet.ahrq.gov/glossary.aspx#adverseevent>. Accessed February 27, 2007.
79. Agency for Healthcare Research and Quality. Patient Safety Network Glossary. Available at: <http://www.psnnet.ahrq.gov/glossary.aspx#safetyculture>. Accessed February 27, 2007.
80. Roberts KH. Managing high reliability organizations. *Calif Manage Rev*. 1990;32:101-113.
81. Weick KE. Organizational culture as a source of high reliability. *Calif Manage Rev*. 1987;20:112-127.
82. Agency for Healthcare Research and Quality. *Patient Safety Network Glossary*. Available at: <http://www.psnnet.ahrq.gov/glossary.aspx#latenterror>. Accessed February 27, 2007.
83. Maurino DE, Reason J, Johnston N, Lee RE. *Beyond Aviation Human Factors*. Aldershot, Hants, England: Ashgate, 1998:14.
84. Reason J. Human error: models and management. *BMJ*. 2000;320:768-770.
85. Weiss BD. *Help patients understand: A manual for clinicians*. 2nd ed. Chicago: American Medical Association Foundation and American Medical Association; 2007.
86. American Medical Association Foundation. *Help patients understand: Instructional video*. Available at: [www.amafoundation.org/go/healthliteracy](http://www.amafoundation.org/go/healthliteracy). Accessed February 27, 2007.
87. Wynia M, Matiasek J. Promising Practices for Patient-Centered Communication with Vulnerable Populations: Examples from Eight Hospitals. The Commonwealth Fund, 2006. Pub. no. 947;11.
88. Comprehensive Adult Student Assessment System. *Adult Literacy Estimates*. Available at: <http://www.casas.org/lit/litcode/Search.cfm>. Accessed February 26, 2007.
89. Pfizer Clear Health Communication Initiative. Prevalence Calculator. Available at: <http://www.pfizerhealthliteracy.com/physicians-providers/prevalence-calculator.html>. Accessed February 26, 2007.
90. The Modern Language Association. *Language Map Data Center*. Available at: [http://www.mla.org/census\\_data](http://www.mla.org/census_data). Accessed February 26, 2007.
91. Makoul, G. Communication Assessment Tool. For more information contact [makoul@northwestern.edu](mailto:makoul@northwestern.edu).
92. Iowa Health System. Patient Satisfaction Survey. For more information contact [abramsma@ihs.org](mailto:abramsma@ihs.org)
93. Mahoney E, Stock R. The PeaceHealth Ambulatory Medication Safety Culture Survey. AHRQ Safe Practices Implementation Grant initiative. Bellevue, WA: PeaceHealth; 2004. For more information contact [rstock@peacehealth.org](mailto:rstock@peacehealth.org).
94. This tool was developed for a 2006 assessment of patient safety in physician practices conducted by the Institute for Safe Medication Practices (ISMP), Medical Group Management Association (MGMA) and the Health Research and Educational Trust (HRET) through a grant from the Commonwealth Fund.

95. The toolkit is currently in field testing stage but will soon be made available. American Medical Association Ethical Force Program. *Toolkit Field Testing*. Available at: <http://www.ama-assn.org/ama/pub/category/15604.html>. Accessed February 26, 2007.
96. Schillinger D, Piette J, Grumbach K, et al. Closing the loop; physician communication with diabetic patients who have low health literacy. *Arch Intern Med*. 2003;163:83-90.
97. Miller GA. The magical number seven. (*Psychology Review*. 1956;63:81). In: Doak CC, Doak LG, Root JH. *Teaching Patients With Low Literacy Skills*. 2nd ed. Philadelphia: J.B. Lippincott Company; 1996:62.
98. Ley P, Eaves D, Walker CM. A method for increasing patients' recall of information presented by doctors. *Psychological Med*. 1973;3:217. In: Doak CC, Doak LG, Root JH. *Teaching Patients With Low Literacy Skills*. 2nd ed. Philadelphia, PA: J.B. Lippincott Company; 1996:163.
99. Partnership for Clear Health Communication. Ask Me 3™ Available at: <http://www.askme3.org>. Accessed February 26, 2007.
100. Pfizer 8th National Health Literacy Conference: Health Literacy as a Cornerstone of Health Reform. Washington, DC; September 14-15, 2005.
101. Doak CC, Doak LG, Root JH. *Teaching Patients With Low Literacy Skills*. 2nd ed. Philadelphia, PA: J.B. Lippincott Company; 1996:65.
102. Kemp EC et al. Checking for Understanding: Efficacy and Patient Preferences; European Association for Communication in Healthcare Conference; Abstract. Belgium; 2004.
103. National Quality Forum. *Safe Practices for Better Healthcare*. Washington, DC: National Quality Forum; 2003.
104. Dharia C, Bennett DL, Ferguson KJ, Okon AD. Comprehension of Informed Consent for Spine Injection Radiology and Office of Consultation and Research in Medical Education, University of Iowa Carver College of Medicine, IA City, IA. 106th Annual Meeting American Roentgen Ray Society, Vancouver, April 30-May 5, 2006. p. A10. Supplement to *Am J Roentgenol*. 2006;186(4).
105. Larsen K. Teaching "Teach-back" in Limited English Proficiency Settings. Presented at: Health Literacy and Patient Safety Conference. November 16, 2006; Rosemont, IL.
106. Malone R, Shilliday BB, Ives TJ, Pignone M. Development and evolution of a primary care-based diabetes disease management program. *Clin Diabetes*. 2007;25:31-35.
107. For techniques on this communication, see SBAR pg 42.
108. Robert Wood Johnson Foundation. *Hablamos Juntos. Universal Symbols for Healthcare Environments*. Available at: <http://www.hablamosjuntos.org>. Accessed February 26, 2007.
109. Flores G. Language barriers to health care in the United States. *N Engl J Med*. 2006;355:229-231.
110. Flores G, Laws MB, Mayo SJ, et al. Errors in medical interpretation and their potential clinical consequences in pediatric encounters. *Pediatrics*. 2003;111:6-11.
111. Flores G. The impact of medical interpreter services on the quality of health care: a systematic review. *Med Care Res Rev*. 2005; 62:255-299.
112. US Department of Health and Human Services, Office of Minority Health. *National Standards for Culturally and Linguistically Appropriate Services in Health Care*. Washington DC: OPHS; 2001.
113. US Department of Health and Human Services, Office of Minority Health. *National Standards on Culturally and Linguistically Appropriate Services (CLAS)* Available at: <http://www.omhrc.gov/templates/browse.aspx?lvl=2&lvlID=15>. Accessed February 26, 2007.
114. For reader-friendly print materials see table 12.
115. Safran DG, Neuman P, Schoen C, et al. Prescription drug coverage and seniors: findings from a 2003 national survey. *Health Affairs Web Exclusive*; April 19, 2005. Available at: <http://www.healthaffairs.org>. Accessed February 27, 2007.

116. National Center for Health Statistics. Health, United States, 2004. HHS Publication No. 2004-1232. Hyattsville, MD: Department of Health and Human Services; 2004.
117. Institute of Medicine. *Preventing Medication Errors*. Aspden P, Wolcott J, Bootman L, Cronenwett LR (eds). Washington, DC: National Academy Press; 2006.
118. National Quality Forum. *Improving Use of Prescription Medications: A National Action Plan*. Washington DC: National Quality Forum; 2005.
119. See page 9 for risks to patients and the health care system
120. Persell S. Health Literacy and Implications for Chronic Illness Care: The Case of Hypertension. Presented at Health Literacy Patient Safety Conference; November 16, 2006; Rosemont, IL.
121. Schillinger D, Wang F, Rodriguez M, Bindman A, Machtinger EL. The importance of establishing regimen concordance in preventing medication errors in anticoagulant care. *J Health Commun*. 2006;11:555-567.
122. Tarn DM, Heritage J, Paterniti DA, Hays RD, Kravitz RL, Wenger NS. Physician communication when prescribing new medications. *Arch Intern Med*. 2006;166:1855-1862.
123. Wolf MS, Davis TC, Tilson H, Bass PF, Parker RM. Misunderstanding of prescription drug warning labels among patients with low literacy. *Am J Health-Syst Pharm*. 2006;63:1048-1055.
124. Davis TC, Wolf MS, Bass PF, et al. Low literacy impairs comprehension of prescription drug warning labels. *J Gen Intern Med*. 2006;21:847-851.
125. Davis TC, Wolf MS, Bass PF, et al. Literacy and misunderstanding of prescription drugs labels. *Ann Intern Med*. 2006;145:887-894.
126. For more on advance organizers see page 32 of this monograph.
127. Institute for Healthcare Improvement. Available at: <http://www.ihl.org/IHI/Topics/PatientSafety/MedicationSystems/Tools/Medication+Reconciliation+Review.htm>. Accessed on March 1, 2007.
128. Kripalani S, Henderson LE, Chiu EY, Robertson R, Kolm P, Jacobson TA. Predictors of medication self-management skill in a low-literacy population. *J Gen Intern Med*. 2006;21:852-856.
129. Edelberg HK, Shallenberger E, Wei JY. Medication management capacity in highly functioning community-living older adults: detection of early deficits. *JAGS*. 1999;47:592-596.
130. Katz MG, Kripalani S, Weiss. Use of pictorial aids in medication instructions: a review of literature. *Am J Health-Syst Pharm*. 2006;63:2391-2397.
131. Ad Hoc Committee on Health Literacy for the Council on Scientific Affairs, American Medical Association. Health literacy. Report of the Council on Scientific Affairs. *JAMA*. 1999;281:552-557.
132. Rothman RL, So SA, Shin J, et al. Labor characteristics and program costs of a successful diabetes disease management program. *Am J Manag Care*. 2006;12:277-283.
133. Sarkar U. Ambulatory Patient Safety in Diabetes Care for Diverse Populations. Presented at: Health Literacy Patient Safety Conference; November 16, 2006; Rosemont, IL.
134. National Quality Forum. *Improving Patient Safety Through Informed Consent for Patients with Limited Health Literacy, An Implementation Report*. Washington DC: National Quality Forum; 2005:18.
135. Adapted, with permission, from The DIRECT Approach to Identifying Low Literacy During the Office Visit by Mariana Glusman, MD and Barbara Bayldon, MD, 2006.
136. Cross KP. *Adults as Learners: Increasing Participation and Facilitating Learning*, San-Francisco: Jossey-Bass; 1981.
137. See table 10 and figure 8 on pages 33 and 45 for examples.

## Take this with you

This pocket-sized Safe Communication Universal Precautions tip card can serve as a quick reminder on how to prevent communication-related adverse events. It can help you:

- Make sure patients understand instructions
- Avoid adverse events due to poor or incomplete communication
- Streamline precise and complete communication among staff members



