VIEWPOINT

Patient-Centered Performance Management Enhancing Value for Patients and Health Care Systems

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Corresponding Author: Eve A. Kerr, MD, MPH, VA Center for Clinical Management Research, VA Ann Arbor Healthcare System, PO Box 130170, Ann Arbor, MI 48113-0170 (ekerr @umich.edu). All too often, the US health care system fails patients at 2 levels. Some patients fail to receive care that would clearly help them, whereas other patients receive care that will not benefit them (and may even be harmful). 1,2 Worse, clinicians also might fail to inform patients about the risks and benefits they might incur from even simple and common treatments. Instead, the current focus on one-size-fits-all guidelines and performance measures (eg, all patients should achieve a specified blood pressure [BP] threshold) discounts key commitments to personalizing care based on individual risks and preferences, even to the point of promoting unnecessary and harmful treatment. 3,4

As health care systems respond to pressures to cut costs, they have a rare opportunity to implement patientcentered approaches that will drive appropriate decisions for individuals rather than across-the-board adjustments that decrease utilization more or less arbitrarily. A patient-centered performance management system would help clinicians and patients make individualized decisions about optimal care for common clinical situations, explicitly incorporate patient preferences, and reinforce such decisions through patientcentered performance measures. Such a system would harness the power of comparative effectiveness research and shared decision-making to consider the full spectrum of medical interventions' net benefits by (1) comprehensively rewarding high-benefit care; (2) facilitating and documenting shared decision making for services of modest or uncertain benefit; and (3) discouraging inappropriate or harmful care.

Clinicians understand that all interventions involve a continuum of net benefit. For example, even if a medication reduced the risk of myocardial infarction by 30% for all patients, had low rates of adverse effects, and low costs, the harms of the medication would still outweigh the benefits in a healthy adolescent. Between that adolescent and the 65-year-old patient with extensive vascular disease is an undeniable continuum of net benefit, and science alone can never establish a thin bright line that separates appropriate from inappropriate care along this continuum.² Yet the current model of both clinical guidelines and performance measurement involves a discernible appropriateness threshold with high-quality care on one side of the line and inappropriate care on the other. In the development of guidelines and performance measures, the line generally is positioned to minimize undertreatment-ignoring that this promotes overtreatment and can subvert patient autonomy.⁵

As a response, medical societies have recently developed recommendations called Choosing Wisely that

suggest medical interventions that should be limited or avoided. A patient-centered performance management system integrates these approaches, basing recommendations on an individual's likelihood of benefit or harm from an intervention. The goal of patient-centered performance management is to decrease overtreatment by discouraging use of very low or negative-benefit services and to decrease undertreatment by encouraging use of high-benefit services while respecting patient preferences for care that has low or moderate benefit. Coupled with reforms in benefit design and payment policies, this system can provide clinicians and patients with the information they need to choose wisely.⁶

How would a patient-centered performance management system work? For example, a 48-year-old nonsmoker with treated hypertension and hyperlipidemia but no known cardiovascular disease presents to clinic with a systolic BP of 144/82 mm Hg. How should the clinician decide whether this patient needs to have his BP medications adjusted? Currently, because the patient does not meet the one-size-fits-all BP lower than 140/90 mm Hg measure, most physicians would likely consider adding a BP medication—without consideration or a discussion of the actual benefit of doing so. Indeed, guidelines recommend treatment until a BP of at least 140/90 mm Hg is achieved, regardless of a patient's age, risk factors, or degree of polypharmacy. However, in the quest to simplify, this one-size-fits-all goal ignores that current evidence demonstrates that the benefit of achieving this dichotomous threshold depends on patient risk.

In a patient-centered performance management system, the underpinnings of the electronic health record (EHR) could automatically calculate this patient's 10-year risk for cardiovascular disease (approximately 5%). Then, the system could present the cardiovascular risk reduction (benefit) and adverse effects of medications or other treatments in a way that both the clinician and the patient could understand. This personalized information would also suggest whether the magnitude of the proposed treatment effects had high, moderate, or low net benefit and could flag those safety hazards for which the risks outweighed the benefits.

Because the expected net benefit from additional treatments for this patient is low, the clinician and patient could decide together whether adding an additional antihypertensive medication would be the correct step. The EHR could help guide and support documentation of the patient's goals and preferences. In this way, the system not only could facilitate real-time optimal treatment but simultaneously collect per-

formance data on the efficiency of care (frequency of provision of care with high net benefit minus care that is inappropriate or harmful) and patient-centeredness of care (documentation of patient preferences in care of modest net benefit). A patient-centered performance management system therefore could improve value for clinicians and health systems (increasing appropriateness and decreasing costs) and patients (involving patients in decisions).

The essential element in this system is its commitment to directly considering the net benefit of care at the individual patient level (not using population averages)^{7,8} while also eliciting and capturing individual patient preferences for care. An individualized net benefit focus is simply the gains expected from receiving the care minus the harms from the care. A patient-centered performance management system should incorporate thresholds at which the net benefit of the care for an individual is so high that it should almost always be provided; and the threshold at which net harm is more likely than net benefit, beyond which care should almost never be provided or covered. Between high benefit and risky care lies an often broad preference-sensitive zone in which the value of care must be defined through shared patient-clinician decision making. Such a decision-making process constitutes high performance in this preference-sensitive zone.

Measures that assess performance across the full spectrum of net benefit will necessarily be more complex than simpler measures that assess performance only at the extremes. Yet, greater complexity is essential to advance quality while controlling costs.

Distinguishing between high- and low-value care requires a level of sophistication that is within the reach of clinicians and involves several steps. First, decision tools are needed for common and costly clinical scenarios, such as prevention and treatment of cardiovascular conditions that use individual patient characteristics to determine whether a medical service is appropriate for an individual in a given situation. Second, these tools must integrate with the EHR environments to automatically populate fields with patient-specific information. Third, the tools need to present information to patients and clinicians in a way that promotes informed decision making and that captures the outcomes of these discussions. All this information can then be incorporated into personalized performance measures that encourage provision of high-value care, motivate shared decision making for preference-sensitive care, and discourage provision of low- or negative-value care. In this way, the vision of decreasing unnecessary and potentially harmful care and its attendant costs can be realized along with improving appropriateness and personalization of care for all patients.

There are certainly challenges to achieving a patient-centered performance management system. However, the benefits of this approach over current guideline and performance measurement approaches are great. The policy-making, health care delivery, research, and quality-improvement communities should dedicate themselves to making patient-centered performance management a reality in the foreseeable future.

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