
Editorial

Filling the Gaps between Performance Incentive Programs and Health Care Quality Improvement

Restructuring payment policies through performance incentive programs to explicitly promote improvements in the quality and value of health care has become a popular strategy for public and private health care payers. But our measures of quality are less than comprehensive, and current performance incentive strategies to improve quality may exacerbate disparities in health care.

Despite the proliferation of pay-for-performance (P4P) and other performance incentive programs, data on whether they work to improve quality are scant and, where data exist, the results have been mixed. Over 40 P4P programs are known to focus on inpatient care alone, yet only eight peer-reviewed articles have assessed the effects of these programs on clinical quality, patient experience, safety, or resource use (Mehrotra et al. 2009). These studies have found some improvements in quality, but they also noted methodological problems in the assessments, which did not preclude the possibility that the improvements were due to temporal trends alone. Some of the largest assessments have found no significant improvements in quality (Lindenauer et al. 2007). Most remarkable, however, is that not a single one of these studies has reported data on the impact of these emerging P4P programs on equity (closing racial, ethnic, linguistic, and other socioeconomic gaps in health status), which is one of the six key dimensions of quality identified by the Institute of Medicine (Institute of Medicine Committee on Quality of Health Care in America 2001).

This lack of investigation is especially striking because the potential for P4P programs to create unintended adverse consequences on equity is a well-recognized concern. Indeed, the lack of evidence regarding likely hazards of performance incentive programs for vulnerable populations and providers that care for them, such as safety net hospitals, has been a focus of particular concern and discussion for some time (Chien et al. 2007). Commentators have outlined several potential mechanisms through which

P4P could worsen health disparities—including the creation of incentives for providers to avoid patients perceived to be more likely to have low-quality scores (cherry picking), the promotion of one-size-fits-all quality improvement initiatives that may be less effective for racial or ethnic minority groups or for patients with limited health literacy, and the widening of the resource gap for providers who care for these populations. Yet empirical research in this area is lagging.

The lack of research is driven, in part, by the lack of data. Chien et al.'s (2007) search of the published literature from 1996 to 2006 led to 41,974 articles related to performance incentive programs, but only 536 of these articles contained any information about patient race and ethnicity. After excluding studies that were not empirical, not in English, and that were conducted outside the United States, they found a single research article on the impact of a public reporting, not P4P program, on disparities (Werner, Asch, and Polsky 2005). A more recent evaluation of the impact of a large P4P initiative on ethnic disparities in coronary heart disease management in the United Kingdom found improvements in quality measures across ethnic groups, but it was associated with reductions in disparities for only 2 of the 10 quality indicators (Millett et al. 2009).

In light of continuing problems of rising costs, mediocre quality, and, therefore, relatively poor value for the money spent on health care in the United States, most commentators believe efforts to link payments more closely to providers' results on health care quality measures will be a key component of U. S. health care reform strategies. Health services researchers need to be informing these efforts and the design of these programs. To do so, however, we will need to address several critical knowledge gaps. Linking performance incentive programs to quality requires that we ask, How broadly or narrowly do we envision and define the dimensions of quality? Can we develop measures of quality that explicitly address the domain of equity? And, in developing standard measures in the various domains of quality, what is our understanding of the association between these measures and health outcomes?

Key proposals to address these issues include the recent development of quality measures that are intended to directly target disparity reduction, along with the design of some P4P programs to reward quality improvement in addition to the achievement of high benchmark levels of quality (Casalino et al. 2007; Chien and Chin 2009). Here, we highlight pressing gaps in the literature and propose a set of priorities for health services researchers to advance the field of quality measurement and facilitate development of more comprehensive and effective performance incentive programs.

REINFORCING A MULTIDIMENSIONAL VIEW OF QUALITY

One of the biggest limitations of performance incentive programs to date has been the limited nature of the dimensions of quality that they incentivize. Of the six dimensions of quality outlined by the Institute of Medicine in *Crossing the Quality Chasm* (high-quality care should be safe, timely, effective, efficient, patient centered, and equitable), effectiveness—avoiding the underuse of effective therapies and, to a much lesser extent, avoiding the overuse of ineffective therapies—has been routinely incorporated into measures of clinical care (Institute of Medicine Committee on Quality of Health Care in America 2001). Safety, timeliness, and efficiency have also been occasional targets of quality measures. The development of measures of patient centeredness has recently begun to gain a little traction, yet measures of equity remain almost entirely absent.

To optimize the potential of performance incentive programs to advance health care quality, we need to develop performance measures that encompass the Institute of Medicine's comprehensive view of health care quality—that is, all six aims should be measured. The challenge, however, is that we also should be careful to pay for only those measures that are correlated with improved health outcomes. Measures of effectiveness, timeliness, and safety, almost by definition, have been tied to clinical outcomes. When it comes to measures of patient centeredness and equity, we not only largely lack the measures per se, we also lack rigorous assessments of any links between those measures and health outcomes.

MEASURING PATIENT-CENTERED CARE

On its face, and in numerous anecdotes, patient-centered care seems very likely to be related to better health outcomes and it may be particularly important for addressing health care disparities, since it takes into account patients' personal and social contexts and implies the tailoring of communication, education, and health care to patient values and needs (Institute of Medicine Committee on Quality of Health Care in America 2001). Certain domains of patient-centered care, including respect for patients, effective communication and education, and individualization of care, may be particularly important for racial and ethnic minorities, non-native English speakers, and low-income patients.

Drawing these connections empirically, however, has proven difficult. Despite the conceptual link between patient-centered care and health outcomes, it will be hard to connect the two without both well-validated measures

of patient centeredness *and* broader assessments of clinical outcomes, moving beyond patient satisfaction (Little et al. 2001; Beck, Daughtridge, and Sloane 2002; Mead and Bower 2002; Hobbs 2009). Adding complexity to the situation, these two steps will need to take place in concert.

Most studies of patient-centered care have focused on measures of patient–clinician communication (Stewart et al. 2000) and most have been in the outpatient setting. The Patient Assessment of Chronic Illness Care (PAC-IC), for example, is a well-validated measure of several components of patient-centered care as applied to the outpatient setting (Glasgow et al. 2005), which has been associated with improved patient self-management and quality of life (Schmittiel et al. 2008). Further studies could assess the relationship between patient centeredness as measured by the PACIC and intermediate health outcomes such as measures of chronic disease control. Sequist et al. (2008) examined the association between patient experience as measured by the Ambulatory Care Experiences Survey and clinical quality of care and health outcomes, assessed using Health Plan Employer Data and Information Set (HEDIS) data. They found positive but small associations between patient centeredness, other quality measures, and outcomes, suggesting that explicit attention to multiple quality domains will be fruitful.

In terms of inpatient care, one early randomized controlled trial of patient-centered care in the inpatient setting was associated with improvements in patient satisfaction, but not clinical outcomes (Martin et al. 1998). Today, the Hospital Consumer Assessment of Healthcare Providers and Systems Survey (HCAHPS) data are providing expanding opportunities to examine the relationships between measures of the patient experience (one way to measure patient centeredness), other quality-of-care measures (such as effectiveness measures), and outcomes (Centers for Medicare and Medicaid Services 2008). Some prior studies have suggested that patient perceptions of quality hold little relationship to clinical quality of care measured in other ways (Chang et al. 2006; Lee et al. 2008). Still, one of the first major analyses of national HCAHPS data concluded that performance on patient perceptions of care was positively related to measures of clinical quality of care (Jha et al. 2008). While this study provides important insights into the relationship between clinical quality and patient perceptions of care across hospitals nationally, it also raises intriguing questions about the nature of this relationship for racial/ethnic and linguistic minorities and whether and how these measures may vary in safety-net hospitals. For example, both not-for-profit, public status and serving a high proportion of Medicaid patients have been used as markers of “safety-net” institutions.

But Jha and colleagues found that not-for-profit public hospitals had higher patient ratings, while predominantly Medicaid-serving hospitals received lower patient ratings, after adjusting for other factors. In short, the relationship between patient experience of care measures and clinical outcomes in safety-net hospitals demands much further study.

MEASURING EQUITY

We have made very little progress in developing robust measures of equity, despite overwhelming evidence of continued racial and ethnic disparities in health care, a clear marker of poor quality care. One of the key barriers to developing measures of equity is the lack of consistent and accurate data on patient race, ethnicity, language, and other relevant sociodemographic characteristics. This suggests that our early focus for equity measures should be on developing structural measures (e.g., measuring whether organizations systematically collect race, ethnicity, and language data). For early outcome measures of equity, a promising avenue is to develop measures of equal access (e.g., amount of time Medicaid vs. commercially insured patients have to wait for an appointment, or proportion of care given to uninsured or Medicaid patients). Incorporating measures of health care equity is essential to mitigating the potential perverse effects of P4P on the allocation of resources between haves and have nots.

Ultimately, it is time for us to move beyond narrowly defining domains of quality, and the Institute of Medicine has provided us with the framework for doing so (Institute of Medicine Committee on Quality of Health Care in America 2001), especially when we are linking paying for performance to quality metrics. It is up to us to now develop robust measures of quality that are linked with better health outcomes to truly ensure we are getting value for our health care dollars.

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