

## THE BUSINESS CASE FOR QUALITY: ENDING BUSINESS AS USUAL IN AMERICAN HEALTH CARE

David Blumenthal and Timothy Ferris
Institute for Health Policy
Massachusetts General Hospital

July 2004

**ABSTRACT:** The absence of a "business case" for improving health care quality—evidence that those who invest in quality improvement will see a return on investment within a reasonable time—is widely acknowledged to be a major obstacle to improving health care in the United States. This paper extends the investigation into the causes and possible solutions. Others have previously identified obstacles to creating a business case for quality, among them: the failure of the current health system to pay for quality; consumers' inability perceive quality differences; displacement of the benefits of quality improvement; and an administrative pricing system that does not allow purchasers to pay more for higher-quality care. The authors of this report cite five additional root causes: difficulties in changing provider behavior; the primitive state of quality measurement; inadequate health care system infrastructure; major legal obstacles; and fiscal challenges faced by federal, state, and local government.

Support for this research was provided by The Commonwealth Fund. The views presented here are those of the authors and should not be attributed to The Commonwealth Fund or its directors, officers, or staff.

Additional copies of this (#715) and other Commonwealth Fund publications are available online at <a href="www.cmwf.org">www.cmwf.org</a>. To learn about new Fund publications when they appear, visit the Fund's website and <a href="register to receive e-mail alerts">register to receive e-mail alerts</a>.

#### **CONTENTS**

About the Authors	iv
About the Commonwealth Fund Colloquia on Quality Improvement	v
Executive Summary	vii
Root Causes	2
Potential Solutions	4
Conclusions	14
References	17
Appendix. The Commonwealth Fund Quality Improvement Colloquia,	
"The Business Case for Quality," November 18–19, 2002—List of Attendees .	18

#### ABOUT THE AUTHORS

David Blumenthal, M.D., M.P.P., is director of the Institute for Health Policy at Massachusetts General Hospital/Partners HealthCare System in Boston. He also holds the Samuel O. Thier Professorship in Medicine at Harvard Medical School. Currently, he leads the Fund's Quality Improvement Colloquia Series and was previously executive director of The Commonwealth Fund Task Force on Academic Health Centers and chairman of the Board of the Massachusetts Peer Review Organization. His research interests include the future of academic health centers under health care reform, quality management in health care, the determinants of physician behavior, access to health services, and the extent and consequences of academic—industrial relationships in the health sciences.

Timothy Ferris, M.D., M.Phil., M.P.H., is a practicing general internist and pediatrician with training and research experience in health services research and health policy. Since completing his general medicine fellowship at Massachusetts General Hospital, he has been a senior scientist at MGH/Partners HealthCare System's Institute for Health Policy. His research has focused on the measurement and improvement of quality of healthcare for adults and children. He has served on a national advisory panel for the development of quality indicators for child health and is a member of the Agency for Healthcare Research and Quality's Health Care Quality and Effectiveness Research study section.

#### About the Commonwealth Fund Colloquia on Quality Improvement

The Commonwealth Fund Colloquia on Quality Improvement are aimed at leaders in health care interested in developing practical plans for improving the quality of U. S. health care. The goals of the series are to identify barriers to quality improvement and develop specific recommendations to reduce or eliminate those barriers. The colloquia bring together industry leaders representing the major stakeholders in the delivery of medical services in the United States, including health care purchasers, providers, and insurance organizations. Invited leaders of these organizations become members of The Commonwealth Fund Quality Improvement Leaders Network, which serves as a sounding board and dissemination route for new ideas for improving health care quality. The Massachusetts General Hospital Institute for Health Policy hosts the colloquia.

The first colloquium, **The Business Case for Quality** (Nov. 18–19, 2002), was designed to engage health care industry leaders in a discussion of ways to improve the ability of health care organizations to generate financial returns on investments in quality of care. The colloquium grew out of increasing attention to the problem of financing quality improvement activities. The second colloquium, **Accelerating** Information Technology Adoption in Health Care (May 19-20, 2003), focused on methods to accelerate the adoption of information technology. This colloquium grew out of a widespread view that information technology has been poised to transform health care as suggested by several specific examples, but that consistent widespread adoption of information technology has been slow because of specific barriers. The third colloquium, Overuse of Care as a Quality Problem (Oct. 10-11, 2003), explored the overuse of health care services, which leads to problems of both quality and cost. Participants explored interventions that can reduce overuse as well as possible next steps to institute such changes more broadly. The fourth and most recent colloquium, Physician Clinical Performance Assessment (Jan. 22–23, 2004), addressed the following questions: Should physician performance be assessed on an individual or group level? And should the results of such clinical assessments be made public?

#### **EXECUTIVE SUMMARY**

The absence of a "business case" for improving the quality of health care—that is, evidence that health systems, providers, and others who invest in quality improvement will see a return on investment within a reasonable time frame—is widely acknowledged to be one of the most important obstacles to improving health care in the United States. This paper uses work conducted as part of the Commonwealth Fund Colloquia on Quality Improvement\* to extend the investigation of the causes of and solutions to this problem. In so doing, the paper includes comments on quality provisions of the Medicare Prescription Drug, Improvement and Modernization Act of 2003.

#### Root Causes

Leatherman, Berwick, and colleagues<sup>13</sup> have identified the following obstacles to creating a business case for quality in the U.S. health care system:

- 1. The current system fails to pay for quality, while paying for defective care.
- 2. Consumers are unable to perceive quality differences.
- 3. The benefits of quality improvement are often displaced in time and space.
- 4. Administrative pricing prevents consumers and organized purchasers who want to pay for higher quality from doing so.
- 5. Clinicians do not have access to information about best practices.

The Commonwealth Fund Colloquium process identified an additional five root causes:

- 6. Ways of changing provider behavior are not well understood.
- 7. The science of quality measurement is still primitive.
- 8. The health care system's infrastructure is inadequate.
- 9. There are major legal obstacles.
- 10. Governments at all levels are in difficult fiscal shape.

#### **Potential Solutions**

An effort to create a business case for quality has to be strategic, realistic, and organized for the long haul. The interventions described in this paper are neither exhaustive nor conclusive; they could, however, be the basis of a comprehensive strategy. Taken

<sup>\*</sup> See box on page v for more information about the Colloquia.

together, they illustrate the types of immediate, short-term, private, and public actions that may start us off in the right direction.

Readers should note that collective action, mediated through nonmarket mechanisms, will be required to overcome some obstacles to the business case for quality. Currently this is not a popular political message, but it seems almost inescapable. The question is whether that collective action can be accomplished voluntarily, in the private sector, or whether some governmental involvement will be required. For the writers, it is hard to imagine a scenario in which a business case for quality will evolve without some involvement of the public sector. Building coalitions to support collective action generally, and public action in particular, therefore becomes a priority in moving the quality debate forward.

In Colloquia discussions, and in reviewing provisions of the recent Medicare drug legislation, the following concrete actions emerged as potentially valuable approaches to augmenting the business case for quality.

#### **Private Sector Actions**

- Employers, plans, and consumers must develop local and regional alliances to collectively encourage providers to produce and disclose data on quality performance.
- Employers, plans, and consumers must begin experimenting once again with new methods of compensation. These should include risk-sharing arrangements, such as capitation, partial capitation, and other approaches, that are specifically designed to create a business case for quality. Also important are "gain-sharing" options. Gain sharing means that the financial benefits of improved quality are shared by the parties whose actions make them possible. Examples might be improving quality through avoiding overuse of care or through disease management initiatives that reduce hospitalizations and physician visits.
- Employers must develop long-term partnerships with plans and providers. They must avoid the practice of putting contracts out to bid yearly.
- Employers and plans must be willing to pay more for quality without passing on any added short-term costs to consumers and patients.
- Employers and plans should recognize and reward investments in infrastructure that will enhance quality, including clinical information systems and measurable integration of clinical services within health care organizations.

- Employers should experiment with regional self-insured cooperatives, so that the benefits of investments in quality accrue to all employers.
- Employers, plans, and consumers should vigorously support statutory changes in Medicare and public investments that are necessary to create a business case for quality.

#### **Public Sector Actions**

- The federal government should invest heavily in research and development to understand the processes of care that can improve outcomes and to improve quality measures, the ability to implement them and display them, and the understanding of how paying for performance affects quality of care under a variety of circumstances.
- To realize the many positive initiatives in the Medicare Prescription Drug, Improvement and Modernization Act of 2003, the Medicare program should:
  - o Continue and expand its payment-for-quality demonstration programs.
  - o Reinvigorate its Medicare Advantage program by rapidly deploying effective risk adjustment and then assuring that plans are fairly compensated.

Congress should relax statutory provisions that prevent the Medicare program from paying for quality and should address legal restrictions that prevent plans from selectively contracting with networks of providers based on the quality of care supplied. The federal government should experiment with new forms of risk and gain sharing in traditional Medicare.

• The federal government should take the lead in developing a national health information infrastructure by providing financial assistance to fiscally challenged organizations (especially those serving disadvantaged populations), relaxing fraud and abuse statutes that inhibit local alliances between community physicians and hospitals for information technology (IT) development (with appropriate protections against abuse), and providing adequate resources to the new commission developing standards of data definition that can support interoperability between IT systems.

#### Joint Actions

- Public and private stakeholders should launch a communications effort to educate the
  public about the problems and opportunities associated with deficiencies in quality of
  care in the United States.
- Public and private stakeholders should develop ongoing mechanisms for coordinating their activities in developing a business case for quality.

The creation of a business case for quality is central to improving the functioning of our health care system. It will require the simultaneous, persistent, and steady pursuit of many of the strategies listed above, and perhaps others as well. Paradoxically, the successful creation of an economic motivation to improve quality will most likely depend on the ability of public and private actors to come together in private and public collectives motivated not by short-term economics but by a long-term commitment to an improved health care system. Making health care function in a businesslike way, therefore, will likely require ending business as usual in American health care.

### THE BUSINESS CASE FOR QUALITY: ENDING BUSINESS AS USUAL IN AMERICAN HEALTH CARE

The absence of a business case for quality in the U.S. health care system is now widely considered a fundamental obstacle to improving the performance of health care services, and thus the health and welfare of Americans.<sup>5,9,10,13</sup> Increasingly sophisticated analyses have begun to isolate the root causes of this basic and vexing obstacle to quality improvement, and to outline potential solutions. As in so many domains of health care analysis and policy development, navigating this particular journey from understanding to action is challenging and often frustrating. One reason is that the root causes extend wide and deep and entwine every health care stakeholder, from patient to physician to insurer to our most senior elected leaders.

The question in such circumstances is where to start. In an excellent first step, Leatherman et al. began the process of developing concrete initiatives to generate a business case for quality. The Commonwealth Fund then convened a colloquium, The Business Case for Quality, in Boston in November 2002. This paper extends the observations contained in previous work and in so doing draws heavily on contributions of attendees at the November 2002 colloquium. The writers focus particularly on expanding Leatherman et al.'s discussion of the private and public actions that will be necessary to create a convincing business case for quality in the U.S. health care system. Because provisions of the recently enacted Medicare Prescription Drug, Improvement and Modernization Act of 2003 could affect the business case for quality, this report takes these new statutory provisions into account.

We start by reviewing, very briefly, the obstacles to the business case for quality, emphasizing points that were not explicitly made in the Leatherman paper. Later, we pay particular attention to a second-order question: why obstacles are so difficult to overcome. This discussion does not always make for pretty reading, but it lays the groundwork for realistic proposals that can begin to change the ecology of the quality issue.

Four points are worth making before we proceed. First, we define the business case for quality as follows:

A business case for health care improvement exists if the entity that invests in the intervention realizes the financial return on investment in a reasonable time frame, using a reasonable rate of

<sup>&</sup>lt;sup>†</sup> See Appendix on page 18 for a list of Colloquium attendees.

discounting. The return may be in bankable dollars, a reduction in losses for a given program or population, or avoidable costs. A business case might exist if the investing entity believed that it could accrue an important indirect effect on organizational function and sustainability. <sup>13</sup>

Second, given the complex set of obstacles to realizing a business case for quality, overcoming them will require coordinated, persistent, and simultaneous effort on multiple fronts. No single initiative will succeed and solutions will depend on involvement by multiple stakeholders.<sup>10</sup>

Third, the business case issue is in many ways the manifestation of a fundamental market failure in the health care system. We can frequently identify an economic case and a social case for quality improvement. The monetized benefits of certain quality improvement initiatives, summing all effects on all parties, frequently exceed the costs. The problem is that the costs and benefits accrue to different parties. The social case is for the nonfinancial benefits, such as realizing the professional aspirations of health professionals, improving public health, fostering social solidarity, and increasing the pride of Americans in their health care system and their society. However, those benefits are not captured in the form of a return on investment for the parties that must make the investment.

These observations lead to the conclusion that in the domain of quality improvement, private actors pursuing their self-interest may not optimize social welfare. It follows that collective action—mediated through nonmarket mechanisms—will be required to overcome some obstacles. This is not a popular message, politically, but it seems almost inescapable. The question is whether collective action can be accomplished voluntarily in the private sector or whether some governmental involvement will be required. The writers have difficulty imagining a business case for quality evolving without some public-sector involvement. To move the debate forward, building coalitions to support public action becomes a priority.

#### **ROOT CAUSES**

Previous work has identified five obstacles to creating a business case for quality. 13

- 1. The current system fails to pay for quality, while paying for defective care.
- 2. Consumers are unable to perceive quality differences.
- 3. The benefits of quality improvement are often displaced in time and space.

- 4. Administrative pricing prevents consumers and organized purchasers who want to pay for higher quality from doing so.
- 5. Clinicians do not have access to information about best practices.

The following constitute, in our view, other significant obstacles to creating a business case for quality:

- 6. Ways of changing provider behavior are not well understood. An example is paying for performance. Generally this means paying providers more if they achieve certain measurable goals related to quality of care, for example, keeping a diabetic patient's blood sugars under some target level. This approach is particularly relevant in overcoming obstacles number 3 and 4. The problem is that we do not know whether or how well it will work and how large and persistent incremental payments must be to change provider behavior.
- 7. The science of quality measurement is still primitive. Much progress has been made, but available metrics are pertinent to only a modest proportion of the work providers do and the care consumers receive. A consensus on which measures to use is emerging only slowly, and providers face the daunting task of collecting different data for different stakeholders. Without effective measures, providers will have difficulty taking advantage of a business case for quality (if one exists) and consumers, plans, and purchasers will have difficulty deciding whom to reward with their business or if higher prices are justified. The lack of effective measures, in turn, reflects in part our limited knowledge of what works in health care—a deeper and more persistent problem.
- 8. The health care system's infrastructure is inadequate. The most obvious and frequently cited example is the absence of suitable information systems. Such systems would make it easier to coordinate patient care and quickly, accurately, and inexpensively furnish information to consumers about current provider performance. The organizational infrastructure of the health care system is also deficient.<sup>8</sup>
- 9. There are major legal obstacles. These include statutory prohibitions to Medicare paying for quality and recent court decisions upholding the constitutionality of state-level "any willing provider" laws. In general terms, such laws specify that health plans cannot exclude any physician who is "willing" to participate.
- 10. Governments at all levels are in difficult fiscal shape. State governments face serious deficits. They are unlikely to make changes in Medicaid—for example, paying for performance—because, although the changes may increase quality, they could also

increase short-term spending. Federal deficits and new fiscal commitments to Medicare (notably, the \$400–\$500 billion Medicare Prescription Drug, Improvement and Modernization Act of 2003) similarly limit the ability of Medicare and other federal programs to embark on quality-of-care improvements that do not pay off immediately. (Of course, when their coffers were fuller governments were not noticeably more aggressive in pursuing a quality agenda.)

#### POTENTIAL SOLUTIONS

Facing this formidable array of obstacles, efforts to create a business case for quality must be strategic and realistic. They must also plan for the long haul. The set of potential interventions identified below is neither exhaustive nor conclusive, but it illustrates the building blocks upon which a comprehensive strategy may rest and emphasizes some immediate short-term private and public actions that may start us off in the right direction. As the reader will see, certain potential solutions emerge repeatedly in the context of multiple root causes. These deserve high priority in the development of a strategy for creating a business case for quality.

#### The Current System Fails to Pay for Quality, While Paying for Defective Care

This is, in some ways, the summation of many of the other obstacles. The current system fails to pay for quality care, and pays for defective care, because consumers and other health care decision makers have trouble distinguishing good from bad quality (obstacle number 2). This confusion exists because quality measurement is inadequate (obstacle number 7), as is the infrastructure to provide such data (obstacle number 8), and so on. Displacement of quality benefits in time and space (obstacle number 3) also contributes.

However, two points are particularly relevant to understanding and overcoming this obstacle. First, the failure of the current system to pay for quality reflects many conscious and unconscious decisions by many stakeholders. These bespeak a collective inattention to quality and a collective lack of will to reward it in our health care system. The fact is that only recently (and then among only a health policy elite) has quality of care been considered problematic in the United States. Most Americans do not consider it a central failing of our health care system. <sup>2,4</sup> Without support from the grass roots, private and public stakeholders are less likely to make politically difficult decisions that may be essential to the business case for quality. Employers may be reluctant to restrict employees' access to physicians who do not perform well on quality indicators. Medicare's Quality Improvement Organizations monitor the quality of care provided to Medicare beneficiaries, but although statutory authority permits the program not to pay for substandard care it may be reluctant to do so.

Creating a business case for quality will depend on cultivating public awareness at every level concerning ways in which our health care system could be improved. Outlining such a strategy is beyond the scope of this paper, but it deserves careful consideration from groups interested in the business case. Federal and local governments, private purchasers, academicians and thought leaders, and private philanthropies have to take the lead. In certain ways, the lack of public outrage over quality problems is the most fundamental problem facing the quality movement. That lack is often the proverbial elephant in the room during the innumerable meetings on quality that occur among policy elites.

Within existing technical limits, public and private purchasers should be actively experimenting with systems to reward quality of care. The results of those experiments should be shared rapidly and widely, so that successes can be replicated and pitfalls avoided. The Robert Wood Johnson Foundation's Rewarding Results Initiative and new demonstration programs on the part of the Centers for Medicare and Medicaid Services (including those mandated under the new Medicare Prescription Drug, Improvement and Modernization Act of 2003) constitute an excellent start but more efforts are needed. Rosenthal et al. have reviewed existing experiments with paying for quality, most of which have not been systematically catalogued or compared to one another.  $^{17}$  In particular, coordinated experiments involving multiple public and private payers and purchasers in the same geographic locations are needed. The reason is that individual payers and purchasers (with the possible exception of Medicare, which, despite recent legislation, faces substantial limits to its statutory authority) often lack the market power to affect provider behavior in local areas. Success in overcoming the first root cause of the business case failure depends on voluntary collective action in many communities around the country.

#### Consumers Are Unable to Perceive Quality Differences

To increase consumer activism in choosing high-quality providers, two lines of intervention seem necessary as first steps (apart from increasing public awareness of quality as a problem). The first is to make more provider performance information available to consumers. The second is to make the data understandable and actionable.

Improved public reporting of quality data will, in itself, require multiple coordinated initiatives. One is to improve and standardize metrics for quality measurement so that consumers can learn them and get accustomed to them. Another initiative will be to motivate providers to collect the data and to share it. Prospects for improved public reporting have brightened considerably recently because of actions by and new authorities

granted to the Centers for Medicare and Medicaid Services. Prior to the recently enacted Medicare drug bill, Medicare was already using statutory reporting requirements and claims information to develop national quality data for nursing homes and home health agencies. The prescription drug legislation made some increases in hospital payment conditional on reporting quality data, which is likely to spur widespread compliance by hospitals with Medicare requests for quality data.

For the most part, however, efforts by private payers to obtain quality data on non-Medicare populations will require voluntary cooperation from providers, and this in turn will require that payers interested in reporting have the market power to persuade reluctant providers to cooperate. Employer coalitions have arisen in a number of markets, but they are neither numerous nor persistent in their quality reporting initiatives. Here again, developing mechanisms and incentives to foster collective action on the part of purchasers at the market level will prove critical to creating a business case for quality. An important question facing the business community in this regard is how to attract midsized and small employers into business coalitions.

Once data become available, they must be understandable and actionable for the end user. Given the complexity of the health care product, achieving this goal is particularly difficult and will require both trial and error and systematic research and development. Proponents of the business case for quality need to enlist the help of psychologists (who understand data display) and public relations experts (who understand how to communicate with large numbers of consumers).

# Benefits of Quality Improvement Are Often Displaced in Time and Space Harry Truman kept a sign on his desk that read The Buck Stops Here. The way our health care system is organized, the quality buck keeps moving—everyone passes responsibility or accountability to the next party. To make a business case for quality, multiple key decision makers must share a stake in the quality of care delivered to patients. Several changes in the payment and organization of services would further this goal.

The first is to rehabilitate financial risk sharing and gain sharing among providers. When they are at risk of financial losses or may benefit from financial gains, professionals and the organizations they work for have a stake in avoiding quality deficiencies that result in increased expenditures. In other words, risk sharing provides a mechanism for overcoming obstacle 1. Capitation, the ultimate form of risk sharing, was largely discredited during the 1990s because it was used almost entirely to contain costs and came to be seen as a cause of, rather than solution to, quality deficiencies. There is no question

that risk sharing, through capitation and other means, has the potential to cause providers to skim healthy patients and to withhold indicated services. However, all forms of compensation have risks, and it will be difficult to create a business case without the opportunity to let providers share the financial consequences of their decisions in some form.

The question is how, concretely, to create a new, responsible, quality-sensitive system of financial risk sharing in our 21st-century health care system. A variety of experiments should be undertaken, including testing alternative forms of risk sharing (including partial capitation 14,15), quality-linked payment withholds, and more widespread use of capitation at the organizational level (especially for integrated health care systems). An important reason to revitalize the part of Medicare that pays risk-sharing entities (renamed the Medicare Advantage or MA program under the recent drug bill) is that it offers this potential for giving providers and plans a stake in quality outcomes. This argues for a bipartisan effort to create the conditions that permit the success of Medicare Advantage programs. In turn, this will require continued commitment to effective risk-adjustment technologies and increases in risk-adjusted payment where these have lagged seriously behind health care inflation. Implementing this last recommendation, the Medicare prescription drug legislation provides \$14 billion in extra payments to private plans over the next 10 years.

Even financial risk sharing, however, will not lay the basis for a business case for quality if patients move constantly among providers and plans. A variety of changes will be needed. One is for purchasers to engage in long-term partnerships with plans and providers that include quality-performance goals. Achieving this will require that purchasers stop choosing plans solely on the basis of price and cease the practice of putting their health care contracts out to bid each year. Another possible way to limit the consequences of consumer mobility is to develop mechanisms within markets to share responsibility for health care risks and expenses. This might be possible if purchasing coalitions self-insure for all their members. In this circumstance, employer 1 gains from investing in smoking cessation programs even if the worker who benefits has moved to employer 2 when his cancer or heart disease develops. Here again, the value of collective action at local and regional levels becomes clear.

#### Administrative Pricing Prevents Consumers and Organized Purchasers Who Want to Pay for Higher Quality from Doing So

Solutions to this problem depend, as do so many others, on the availability of reliable quality data that can be the basis for differential pricing of provider services (see obstacle 6).

Even if such information were to become available, however, a variety of specific measures would be needed to overcome this obstacle.

First, and most important, private purchasers and payers will have to decide whether the best-quality care in a market is part of the basic benefit package or a luxury for which consumers will have to bear any added freight. Purchasers and insurers could, for example, decide to pay more for quality but pass on any added costs to patients who use high-quality providers, either in the form of higher premiums or cost sharing. This will be particularly tempting when high-quality providers charge higher prices (a characteristic of most economic sectors outside of health care) and where any return on investment is delayed in time. Passing the costs of quality on to patients creates the danger, of course, that patients with lower incomes would be frozen out of high-quality plans, a result that could prove self-defeating for purchasers and insurers in the long run. Another possibility is that purchasers will negotiate arrangements in which employees pay less for using high-quality providers, without additional compensation for the providers. This diminishes any incentive a provider has to invest in quality improvement. It is currently the case for General Motors, a founding member of the Leapfrog group.

While all the building blocks for the business case are put in place, perhaps the best we can hope for is that high-minded private stakeholders will experiment with charging less for (at least no more for) the highest-quality providers in their markets, while also paying those providers a premium. Pacificare and other plans are beginning to offer products in which high-quality networks are actually priced less. The marketability of these products should be assessed quickly and the results discussed widely.

Second, the Medicare and Medicaid programs will have to decide whether and how they can modify their administered prices to account for quality. Medicare Advantage plans have the freedom to do this now within their own networks of providers. The issue arises most directly for traditional Medicare, which currently is statutorily barred from paying more for high-quality providers. Medicare is able to do so on a demonstration basis, in fact it was mandated to undertake such experiments by the recent drug bill. Shortly before the legislation was passed, the Centers for Medicare and Medicaid Services launched a demonstration program in cooperation with hospitals belonging to the Premier organization. Medicare agreed to pay more to Premier hospitals that were in the top 20 percent of institutions in quality performance with respect to five diagnoses. Under the new bill, the Centers for Medicare and Medicaid Services is required to launch a five-year demonstration program that will pay physicians a "per beneficiary amount" when they meet specific quality performance standards. There is also provision for grants to physicians

to help them cover the costs of acquiring information technology that supports electronic prescribing. Nevertheless, even assuming that the necessary data on provider performance become available, Medicare does not currently have the authority to change its payment practices; the demonstrations are just initial steps in this direction. But Medicare authorities should make aggressive use of their existing and new payment options, and influential private sector groups should work with Medicare and the Congress to assure that demonstrations are translated as rapidly as possible into effective generalized authorities.

#### Clinicians Do Not Have Access to Information About Best Practices

This is a widely cited problem, and it constitutes the motivation for and frustration of the evidence-based medicine movement. Many related issues arise in discussing the failure of health professionals to learn and use the newest (or even long-established) medical knowledge: clinicians too busy to read; the sheer volume of new medical knowledge; the biased information disseminated so effectively by drug and device companies; and a professional culture that resists efforts to standardize practice through guidelines and protocols.

Many empirical studies have demonstrated the effectiveness of multiple interventions in getting physicians to practice evidence-based medicine. These include: reminder systems;<sup>1</sup> academic detailing;<sup>18</sup> computerized decision support;<sup>7,11</sup> and certain learning cooperatives.<sup>16</sup> None of these approaches, however, has been deployed widely enough to change the behavior of entire health care institutions or the health care system as a whole.

At the current time, exponents of evidence-based medicine are increasingly putting their eggs in the basket of information technology (IT) development. This approach has enormous face validity. An effective health care information infrastructure, including the electronic medical record, computerized order entry, and interconnected regional health information systems, is one way to get the best relevant information to clinicians in real time. Encouraging its development will require several initiatives.

First, purchasers and payers must understand that the implementation of IT systems will be a multiyear task with an often-delayed return on what will constitute a substantial up-front investment. Therefore, payment-for-quality formulas should reward providers for investing in approved IT systems, that is, those that demonstrably change clinician behavior. The Bridges to Excellence Program, initiated by General Electric and several other purchasers, is experimenting with paying primary care providers more if they have

certain information technologies available in their offices, <sup>17</sup> and Medicare demonstration authorities will support this approach.

Second, public authorities will need to take the lead in setting standards for the interoperability of proprietary information systems. <sup>12</sup> There is no evidence to date that the private market is settling on such standards and substantial reason to doubt that it will. In the prescription drug bill, Congress mandated that the Secretary of Health and Human Services set up a commission to help establish standards for interoperability. This is a much-needed development, but so far the initiative has not been funded.

Third, the public must invest in undercapitalized providers who will otherwise never have the capital to acquire and implement state-of-the-art information systems. This is essential to avoid institutionalizing a new form of digital divide in which disenfranchised patients depend on low-quality providers because the parent organizations lack state-of-the-art information systems.

#### Ways of Changing Provider Behavior Are Not Well Understood

This point is obviously highly related to the one above, but refers specifically to limits in our understanding of how to use economic incentives to improve clinical performance. It seems absolutely obvious that paying clinicians and organizations more to do certain things or obtain certain objectives will be effective. However, several circumstances could lead to counterintuitive results.

First, because valid measures of quality are limited in number, and pertain to only a fraction of the work of many clinicians, paying for measurable improvements in quality could cause distortions in practice. Clinicians and systems could mobilize to obtain measurable objectives while neglecting the unmeasured or unmeasurable. Evaluations of payment-for-quality experiments should conscientiously track quality in areas not directly rewarded. If problems are detected, it might argue for economic incentives that involve global risk sharing unrelated to particular quality measures, accompanied by public reporting of quality information. Another approach would be to pay for quality infrastructure items (like information technology) that assist with diverse quality goals, rather than paying for narrowly defined performance objectives.

Second, some observers believe that paying for performance at the individual level is an inherently flawed concept that has produced mixed results at best in other industries.<sup>3</sup> This viewpoint suggests that personal pride, professionalism, and commitment to team members motivate individuals more powerfully than economic rewards. Perhaps the best

illustration of the power of these noneconomic motivations is the fact that most doctors work hard every day to do the right thing, even though they receive no extra financial reward for doing so. Instead, professionalism and personal pride motivate their behavior. Paying individual clinicians to improve performance may not be as effective as commonly supposed, or not as effective as alternative approaches that rely on education, changing organizational culture, and the cultivation of teamwork. Supporting this viewpoint is the argument that, in fact, the quality of health care increasingly reflects the behavior of systems of care, rather than individuals. Therefore, even if payments to individual clinicians were successful, this approach would not necessarily be effective in improving quality of care in the long run. One implication could be that payment for quality might be better aimed at organizations than individuals. Organizations would then be motivated to create the internal culture and systems that optimize quality. On the other hand, paying individual clinicians for quality improvement may create the resources necessary for them to hire other personnel, creating teams essential to quality improvement. To explore these issues, experiments with paying for quality should involve strategies that reward both individuals and organizations, and within organizations, a variety of approaches to rewarding quality-related performance should also be studied.

#### The Science of Quality Measurement Is Still Primitive

Imagine the following scenario. After a decade of paying clinicians and/or health care organizations for quality performance, researchers discover that in some years 20 percent of the hospitals or clinicians they reward actually fall below quality standards, while a comparable number who meet those standards go unrecognized. As a result, some of the latter are forced to close or merge with other organizations.

This possibility is not in the least far-fetched. Clinicians will instantly recognize it as the problem of an imperfect diagnostic test that yields false positives and false negatives. In clinical care, the difficulty is addressed by improving the test, by adding different tests to improve the precision of diagnosis, and by using other information (from the history, physical exam, and other sources).

At the current time, the properties of diagnostic tests for quality performance are simply unknown (for the most part), as are the costs and benefits of the virtually inevitable false positives and negatives that will result from early application. This is not an excuse for inaction. It is quite possible that despite mistakes of this type, measurement and public reporting will improve average quality in the short term as clinicians and organizations scramble to improve performance, so as to qualify for rewards. Nevertheless, over the middle to long term, faulty tests of quality performance will prove demoralizing and

undermine any quality measurement system and the business case for quality. Research and development is essential to improve quality measures and systems for applying them.

The problem, of course, is that our collective willingness to invest in such research and development is threatened by lack of public investment in this activity. Under current budgetary circumstances, that willingness to invest is unlikely to materialize without strong support from the business, provider, and purchaser community. The expression of such support should be a high priority for constituencies interested in quality improvement. The Medicare prescription drug bill requests that the Institute of Medicine conduct "an evaluation of health care performance measures . . . and options to implement policies that align performance with payment under the Medicare Program." Like most Institute of Medicine studies, this one will undoubtedly summarize well the existing knowledge about pay-for-performance measures and uncertainties about their use. To resolve those uncertainties, however, will require follow-up investment in research and development.

#### The Health Care System's Infrastructure Is Inadequate

Improving the health care infrastructure has been discussed, along with some practical approaches to doing so. An additional question is whether we should be reexamining the integrated health care system—its vertical and horizontal components—as critical organizational infrastructure underlying the business case for quality.

The issue here is whether integration helps to overcome several of the other obstacles to creating the business case for quality. Obstacles 3 and 5—time and location and clinician access to data—could be susceptible to vertical integration solutions, particularly in ambulatory care, inpatient care, rehabilitation, and home health care services. Thus, moving patients out of the hospital to be cared for in the community is not as economically problematic for a vertically integrated system as it would be for an independent hospital. Of course, the ability to capture gains from reducing costs is enhanced by organizational risk sharing.

An integrated organization will find it easier to create and support information systems. The necessary capital is much more likely to be available to large organizations than independent practitioners or small institutions.

After a decade of trial and error, promoting integration and size without simultaneously creating enormous waste remains puzzling. The problem here is circular. Integration often failed to achieve its goals in performance improvement because the market did not reward and motivate costly and difficult efforts to truly integrate services in

ways that would improve performance. The question is, what approaches to creating a business case for quality will support integration, assuming it will reinforce the goal of quality improvement? Here again, a concentration on paying organizations for performance, rather than paying individual clinicians and small groups, may prove useful.

This discussion of the potential value of vertically integrated health care (best exemplified by such organizations as Kaiser Permanente, other group and staff model HMOs, and the Veterans Administration) should not create the impression that such models are the only approach to building an infrastructure that supports the business case for quality. If they were the only option, the prospects for creating a business case would be unhappy, indeed, for vertically integrated health care organizations have not proved appealing to large numbers of consumers. Therefore, continuing innovation is necessary to develop virtual organizations that work together to internalize the benefits and risks of quality improvement. Creating such virtual organizations would require innovative contractual relationships in which risks and gains flowing from quality improvements are shared among independent purchasers and providers. Let's say, for example, that as part of a disease management initiative a coalition of self-insured purchasers brokered a relationship between a local hospital and its admitting physicians in which physicians were rewarded for reducing admissions for congestive heart failure (CHF), but the affected hospitals were able to use some of the savings for hospital-based elements of the CHF program. Efforts to create virtual organizations through such creative measures are also needed to spur the business case.

#### There Are Major Legal Obstacles

The legal barriers to creating a business case for quality can be divided into two general types: those constraining private behavior on the one hand and public behavior on the other. In the private area, one of the two outstanding barriers has been addressed in the Medicare Modernization Act, and the other remains as a barrier. Fraud and abuse statutes under Medicare previously prevented hospitals from providing community physicians with information systems on the premise that this could encourage admissions to the hospital in question, and would constitute a kickback under federal law. This provision of the law was a roadblock to developing a national health information infrastructure, since in many communities, hospitals are most likely to have the capital and human resources required to create and support information systems. CMS recently issued Phase II of the federal physician self-referral law or "Stark Law." The second phase of the Stark Law regulations creates exceptions for technology items or services provided to a physician to enable participation in a community-wide health information system. The exception is aimed at items that will allow access to patient electronic health care records, general health

information, medical alerts, and related information for patients served by community providers. With these exceptions, the federal government has removed one of the obstacles standing in the way of adoption of electronic health records, CPOE, and a national health information infrastructure.

Antitrust exemptions are prone to abuse, so they should be confined to specific investments by hospitals in IT, and should depend on the nature and purposes of such IT investments. The systems should communicate with information systems at competing hospitals, so that physicians can provide care of comparable quality to patients in other local health care institutions. The IT investments should be laying the groundwork for electronic medical records, ambulatory physician order entry, and computerized decision support. It might be wise to confine such exemptions initially to providers participating in CMS demonstrations designed to facilitate development of community-wide IT infrastructures.

A second constraint on private behavior is the recent Supreme Court decision in Kentucky, *Association of Health Plans, Inc. v. Miller,* that, at the state level, upholds any willing provider laws. One way to mitigate the effects of this ruling is for plans to include all providers, but create classes based on performance standards. The providers that meet the standards would receive higher payments and preferred referrals compared to those not meeting those standards.

#### Governments at All Levels Are in Difficult Fiscal Shape

Solutions to this problem involve large issues of tax and fiscal policy that are beyond the scope of this paper. However, the political dimension of such solutions suggests that private sector support for public efforts to pay for quality will be essential if the public sector is to play its role in supporting a business case for quality. The involvement of the public sector, in turn, is critical to the success of private sector efforts, because few plans and purchasers have the market power to accomplish the necessary changes.

#### CONCLUSIONS

This review of the root causes of the failure to create a business case for health care quality and of some approaches to extirpating those causes suggests the following actions. For convenience, we divide these into private, public, and joint initiatives.

#### In the Private Sector

• Employers, plans, and consumers must develop local and regional alliances that will, collectively, encourage providers to produce and disclose data on quality performance.

- Employers, plans, and consumers must begin experimenting once again with new methods of compensation. These should include risk-sharing arrangements, such as capitation, partial capitation, and other approaches, that are specifically designed to create a business case for quality. Also important are gain-sharing options in which financial benefits of improved quality are shared among all the contributing parties. Avoiding overuse of care or disease management initiatives that reduce hospitalizations and physician visits are examples of gain-sharing opportunities.
- Employers must develop long-term partnerships with plans and providers. They must avoid the practice of putting contracts out to bid yearly.
- Employers and plans must be willing to pay more for quality without passing on any added short-term costs to consumers and patients.
- In paying for quality, employers and plans should recognize and reward investments in infrastructure that will enhance quality, including clinical information systems and measurable integration of clinical services within health care organizations.
- Employers should experiment with regional self-insured cooperatives, so that the benefits of investments in quality accrue to all employers.
- Employers, plans, and consumers should vigorously support statutory changes in
   Medicare and public investments that are necessary to create a business case for quality.

#### In the Public Sector

- The federal government should invest heavily in research and development. The goal
  is, first, to understand the processes of care that can improve outcomes and to improve
  quality measures. Next is the ability to implement them and display them, and
  understanding how paying for performance affects quality of care under a variety of
  circumstances.
- Building on the many positive initiatives in the Medicare Prescription Drug,
   Improvement and Modernization Act of 2003, the Medicare program should:
  - O Continue and expand demonstration programs related to paying for quality.
  - O Reinvigorate its Medicare Advantage program by rapidly deploying effective risk adjustment and then assuring that plans are fairly compensated.

Congress should relax statutory provisions that prevent the Medicare program from paying for quality. It should also address legal restrictions that prevent plans from using quality of care as criteria for selecting provider networks. The federal government should experiment with new forms of risk and gain sharing in traditional Medicare.

• The federal government should take the lead in developing a national health information infrastructure by providing financial assistance to fiscally challenged organizations (especially those serving disadvantaged populations) and providing adequate resources to the new commission developing standards of data definition that can support interoperability between IT systems.

#### Joint Actions

- Public and private stakeholders should launch a communications effort to educate the
  public about the problems and opportunities associated with deficiencies in quality of
  care in the United States.
- Public and private stakeholders should develop ongoing mechanisms for coordinating their activities in developing a business case for quality.

The creation of a business case for quality is central to improving the functioning of our health care system. It will require the simultaneous, persistent, and steady pursuit of many of the strategies listed above, and perhaps others. Paradoxically, the successful creation of an economic motivation to improve quality will most likely depend on the ability of public and private actors to come together in private and public collectives motivated not by short-term economics but by a long-term commitment to an improved health care system. Making health care function in a businesslike way, therefore, will likely require ending business as usual in American health care.

#### REFERENCES

- 1. E. A. Balas, S. Weingarten, C. T. Garb et al., "Improving Preventive Care by Prompting Physicians," *Archives of Internal Medicine* 160, no. 3 (2000): 301–08.
- 2. D. M. Berwick, "Errors Today and Errors Tomorrow," New England Journal of Medicine 348, no. 25 (2003): 2570–72.
- 3. D. M. Berwick, "The Toxicity of Pay for Performance," *Quality Management in Health Care* 4, no. 1 (1995): 27–33.
- 4. R. J. Blendon and J. M. Benson, "Americans' Views on Health Policy: A Fifty-Year Historical Perspective," *Health Affairs* 20, no. 2 (2001): 33–46.
- 5. D. Blumenthal and C. M. Kilo, "A Report Card on Continuous Quality Improvement" [Comment], *Milbank Quarterly* 76, no. 4 (1998): 511, 625–48.
- 6. M. R. Chassin, "Is Health Care Ready for Six Sigma Quality?" *Milbank Quarterly* 76, no. 4 (1998): 565–91.
- 7. D. C. Classen, "Clinical Decision Support Systems to Improve Clinical Practice and Quality of Care," *Journal of the American Medical Association* 280, no. 15 (1998): 1360–61.
- 8. Committee on Quality of Health Care in America, Institute of Medicine, Crossing the Quality Chasm: A New Health System for the 21st Century (Washington, D.C.: National Academies Press, 2001), 224.
- 9. M. J. Coye, "No Toyotas in Health Care: Why Medical Care Has Not Evolved to Meet Patients' Needs" [Comment], *Health Affairs* 20, no. 6 (2001): 44–56.
- 10. R. S. Galvin, "The Business Case for Quality," Health Affairs 20, no. 6 (2001): 57-58.
- 11. A. A. Gawande and D. W. Bates, "The Use of Information Technology in Improving Medical Performance. Part II. Physician-Support Tools," *Medscape General Medicine* (2000): E13.
- 12. J. Goldsmith, D. Blumenthal, and W. Rishel, "Federal Health Information Policy: A Case of Arrested Development," *Health Affairs* 22, no. 4 (2003): 44–55.
- 13. S. Leatherman, D. Berwick, D. Iles et al., "The Business Case for Quality: Case Studies and an Analysis" [Comment], *Health Affairs* 22, no. 2 (2003): 17–30.
- 14. J. P. Newhouse, "Patients at Risk: Health Reform and Risk Adjustment" [Comment], *Health Affairs* 13, no. 1 (1994): 132–46.
- 15. J. P. Newhouse, "Risk Adjustment: Where Are We Now?" Inquiry 35, no. 2 (1998): 122-31.
- 16. G. T. O'Connor, S. K. Plume, E. M. Olmstead et al., "A Regional Intervention to Improve the Hospital Mortality Associated with Coronary Artery Bypass Graft Surgery. The Northern New England Cardiovascular Disease Study Group," *Journal of the American Medical Association* 275, no. 11 (March 20, 1996): 841–46.
- 17. M. B. Rosenthal, R. Fernandopulle, H. R. Song, and B. Landon, "Paying for Quality: Providers' Incentives for Quality Improvement," *Health Affairs* 23 (Mar./Apr. 2004): 127–41.
- 18. S. B. Soumerai, "Principles and Uses of Academic Detailing to Improve the Management of Psychiatric Disorders," *International Journal of Psychiatry in Medicine* 28, no. 1 (1998): 81–96.

# APPENDIX. THE COMMONWEALTH FUND QUALITY IMPROVEMENT COLLOQUIA, "THE BUSINESS CASE FOR QUALITY" NOVEMBER 18–19, 2002

#### LIST OF ATTENDEES

Anne-Marie J Audet, MD, MSc Robert Graham, MD

The Commonwealth Fund Center for Practice & Technology Assessment

Agency for Healthcare Research & Quality Michael Bailit

Bailit Health Purchasing, LLC Roberta Herman, MD Harvard Pilgrim HealthCare

Charles Baker

Harvard Pilgrim HealthCare Sam Ho, MD

PacifiCare Health Systems, Inc.
David W. Bates, MD

Brigham & Women's Hospital George J. Isham, MD, MS
HealthPartners

Donald M. Berwick, MD, MPP
Institute for Healthcare Improvement
Stephen Jencks, MD, MPH
Center for Medicare and Medicaid Services

David Blumenthal, MD, MPP
Institute for Health Policy
Massachusetts General Hospital
Rainu Kaushal, MD
Brigham & Women's Hospital

Bruce Bradley
Lawrence Lewin
Health Care Initiatives Dept.
Executive Consultant

Agency for Healthcare Research & Quality

North Shore Long Island Jewish Hospital

General Motors Corp.

Michelle Mello, PhD, JD

Carolyn Clancy, MD

Dept. of Health Policy & Management

Jennifer Daley, MD Gregg Meyer, MD

Harvard School of Public Health

Thomas Jefferson University

Tenet HealthCare Massachusetts General Physicians Organization

Stephen M. Davidson, PhD

Boston University School of Management

James J. Mongan, MD

Massachusetts General Hospital

Karen Davis, PhD James Mortimer
The Commonwealth Fund Midwest Business Group on Health

Michael J. Dowling David B. Nash, MD, MBA

Timothy Ferris, MD, MPH
Institute for Health Policy
Donald M. Neilsen, MD
American Hospital Association

Massachusetts General Hospital

Joseph P. Newhouse, PhD

Irene Fraser, PhD

John D. MacArthur Professor of Health Policy

Center for Organization & Delivery Studies
Agency for Health Care Research & Quality

Agency for Health Care Research & Quality

John Delivery Studies and Management

Harvard University

Samuel R. Nussbaum, MD Anthem, Inc.

Gilbert S. Omenn, MD, PhD University of Michigan Health Systems

Blair Sadler Children's Hospital & Health Center

Stephen C. Schoenbaum, MD The Commonwealth Fund Paul M. Schyve, MD Joint Commission on Accreditation of Healthcare Orgs.

George E. Thibault, MD Partners HealthCare System, Inc.

Reed V. Tuckson, MD UnitedHealth Group

Michael B. Wood, MD Mayo Foundation

#### RELATED PUBLICATIONS

In the list below, items that begin with a publication number are available from The Commonwealth Fund's website at <a href="www.cmwf.org">www.cmwf.org</a>. Other items are available from the authors and/or publishers.

#702 Use of High-Cost Operative Procedures by Medicare Beneficiaries Enrolled in For-Profit and Not-for-Profit Health Plans (January 8, 2004). Eric C. Schneider, Alan M. Zaslavsky, and Arnold M. Epstein. New England Journal of Medicine, vol. 350, no. 2 (In the Literature summary).

#701 Physician-Citizens—Public Roles and Professional Obligations (January 7, 2004). Russell L. Gruen, Steven D. Pearson, and Troyen A. Brennan. Journal of the American Medical Association, vol. 291, no. 1 (In the Literature summary).

#699 Malpractice Reform Must Include Steps to Prevent Medical Injury (January 6, 2004). Stephen C. Schoenbaum and Randall R. Bovbjerg. Annals of Internal Medicine, vol. 140, no. 1 (In the Literature summary).

#686 Obtaining Greater Value from Health Care: The Roles of the U.S. Government (November/December 2003). Stephen C. Schoenbaum, Anne-Marie J. Audet, and Karen Davis. Health Affairs, vol. 22, no. 6 (In the Literature summary).

#636 Value-Based Purchasing: A Review of the Literature (May 2003). Vittorio Maio, Neil I. Goldfarb, Chureen Carter, and David B. Nash. From their review of the literature, the authors conclude that value-based purchasing will only be effective when financial incentives are realigned with the goals of high-quality care and performance measures address purchasers' particular concerns.

#635 How Does Quality Enter into Health Insurance Purchasing Decisions? (May 2003). Neil I. Goldfarb, Vittorio Maio, Chureen Carter, Laura Pizzi, and David B. Nash. According to the authors, public and private purchasers may be able to hold physicians and insurers accountable for the quality and safety of the health care they provide. Yet, there is little evidence that current value-based purchasing activities—collecting information on the quality of care or selective contracting with high-quality providers—are having an impact.

#614 The Business Case for Tobacco Cessation Programs: A Case Study of Group Health Cooperative in Seattle (April 2003). Artemis March, The Quantum Lens. This case study looks at the business case for a smoking cessation program that was implemented through the Group Health Cooperative (GHC), a health system and health plan based in Seattle.

#613 The Business Case for Pharmaceutical Management: A Case Study of Henry Ford Health System (April 2003). Helen Smits, Barbara Zarowitz, Vinod K. Sahney, and Lucy Savitz. This case study explores the business case for two innovations in pharmacy management at the Henry Ford Health System, based in Detroit, Michigan. In an attempt to shorten hospitalization for deep vein thrombosis, Henry Ford experimented with the use of an expensive new drug, low molecular weight heparin. The study also examines a lipid clinic that was created at Henry Ford to maximize the benefit of powerful new cholesterol-lowering drugs.

#612 The Business Case for a Corporate Wellness Program: A Case Study of General Motors and the United Auto Workers Union (April 2003). Elizabeth A. McGlynn, Timothy McDonald, Laura Champagne, Bruce Bradley, and Wesley Walker. In 1996, General Motors and the United Auto Workers Union launched a comprehensive preventive health program for employees, LifeSteps, which involves education, health appraisals, counseling, and other interventions. This case study looks at the business case for this type of corporate wellness program.

#611 The Business Case for Drop-In Group Medical Appointments: A Case Study Luther Midelfort Mayo System (April 2003). Jon B. Christianson and Louise H. Warrick, Institute for Healthcare Improvement. Drop-in Group Medical Appointments (DIGMAs) are visits with a physician that take place in a supportive group setting, and that can increase access to physicians, improve patient satisfaction, and increase physician productivity. This case study examines the business case for DIGMAs as they were implemented in the Luther Midelfort Mayo System, based in Eau Claire, Wisconsin.

#610 The Business Case for Diabetes Disease Management at Two Managed Care Organizations: A Case Study of HealthPartners and Independent Health Association (April 2003). Nancy Dean Beaulieu, David M. Cutler, Katherine E. Ho, Dennis Horrigan, and George Isham. This case study looks at the business case for a diabetes disease management program at HealthPartners, an HMO in Minneapolis, Minnesota, and Independent Health Association, an HMO in Buffalo, New York. Both disease management programs emphasize patient and physician education, adherence to clinical guidelines, and nurse case management.

#609 The Business Case for Clinical Pathways and Outcomes Management: A Case Study of Children's Hospital and Health Center of San Diego (April 2003). Artemis March, The Quantum Lens. This case study describes the implementation of an outcomes center and data-based decision-making at Children's Hospital and Health Center of San Diego during the mid-1990s. It examines the business case for the core initiative: the development of a computerized physician order entry system.

The Business Case for Quality: Case Studies and An Analysis (March/April 2003). Sheila Leatherman, Donald Berwick, Debra Iles, Lawrence S. Lewin, Frank Davidoff, Thomas Nolan, and Maureen Bisognano. Health Affairs, vol. 22, no. 2. Available online at http://content.healthaffairs.org/cgi/reprint/22/2/17.pdf.

#606 Health Plan Quality Data: The Importance of Public Reporting (January 2003). Joseph W. Thompson, Sathiska D. Pinidiya, Kevin W. Ryan, Elizabeth D. McKinley, Shannon Alston, James E. Bost, Jessica Briefer French, and Pippa Simpson. American Journal of Preventive Medicine, vol. 24, no. 1 (In the Literature summary). The authors present evidence that health plan performance is highly associated with whether a plan publicly releases its performance information. The finding makes a compelling argument for the support of policies that mandate reporting of quality-of-care measures.

#603 From Place to Place: Learning from Innovations in Health Policy (January 2003). Karen Davis. In this essay—a reprint of the president's message from the Fund's 2002 Annual Report—the author discusses the variety of ways that the Fund is supporting state-led efforts to expand health insurance coverage, extend drug benefits to seniors, foster the healthy development of children, raise nursing home quality, and improve the care provided to underserved populations. Her overview shows that learning from cross-state and cross-national experiences can prompt bold solutions to longstanding problems within our nation's health care system.

#578 Exploring Consumer Perspectives on Good Physician Care: A Summary of Focus Group Results (January 2003). Donna Pillittere, Mary Beth Bigley, Judith Hibbard, and Greg Pawlson. Part of a multifaceted Commonwealth Fund-supported study, "Developing Patient-Centered Measures of Physician Quality," the authors report that consumers can understand and will value information about effectiveness and patient safety (as well as patient-centeredness) if they are presented with information in a consumer-friendly framework.

**#563** Escape Fire: Lessons for the Future of Health Care (November 2002). Donald M. Berwick. In this monograph, Dr. Berwick outlines the problems with the health care system—medical errors, confusing and inconsistent information, and a lack of personal attention and continuity in care—and then sketches an ambitious program for reform.

Achieving and Sustaining Improved Quality: Lessons from New York State and Cardiac Surgery (July/August 2002). Mark R. Chassin. Health Affairs, vol. 21, no. 4. Available online at http://content.healthaffairs.org/cgi/content/abstract/21/4/40.

Improving Quality Through Public Disclosure of Performance Information (July/August 2002). David Lansky. Health Affairs, vol. 21, no. 4. Available online at http://content.healthaffairs.org/cgi/content/abstract/21/4/52.

#534 Room for Improvement: Patients Report on the Quality of Their Health Care (April 2002). Karen Davis, Stephen C. Schoenbaum, Karen Scott Collins, Katie Tenney, Dora L. Hughes, and Anne-Marie J. Audet. Based on the Commonwealth Fund 2001 Health Care Quality Survey, this report finds that many Americans fail to get preventive health services at recommended intervals or receive substandard care for chronic conditions, which can translate into needless suffering, reduced quality of life, and higher long-term health care costs.