



# Research Insights

## ■ Integration, Concentration, and Competition in the Provider Marketplace

### Summary

A substantial amount of integration and concentration has already occurred in health care markets, and this trend will likely continue, particularly as health care providers respond to provisions in the Affordable Care Act (ACA) and other factors that encourage integration. Research looking at hospital mergers suggests that this type of horizontal integration may increase prices; evidence of the impact on quality is mixed. Physician markets are characterized by shifts from practice ownership to employment and from primary care providers to specialists. However, there is little research on the impacts of these market trends. Vertical integration, such as between hospitals and physicians in accountable care organizations (ACOs), is on the rise. While some experts believe that service integration has the potential to deliver better care in a more efficient manner, other experts caution that there is little empirical evidence of success for most arrangements in terms of reducing cost or improving quality. A challenge for policymakers is to develop policies that not only promote integration, but also help maintain well-functioning, competitive health care markets. Among the levers available to policymakers are antitrust enforcement; efforts to promote greater transparency in markets; efforts to promote the use of physician assistants and nurse practitioners and alternative delivery models;

payment regulation, tax incentives; and use of the insurance rate review process to assure adequate physician networks. Although evidence from past studies can help guide the development of new policies, additional research is needed to assess the impact of new provider arrangements on cost and quality outcomes.

### Overview

The last two decades have seen an unprecedented number of hospital mergers that have rendered local hospital markets highly concentrated or dominated by a small number of hospitals controlling a large segment of the market. Additionally, physician practices have consolidated, so that markets for specialized services or services in smaller locations are highly concentrated and patients and insurers are faced with fewer choices.<sup>1</sup> More recently, many hospital systems have begun purchasing or partnering with other types of providers.<sup>2</sup> Economists and policymakers are generally concerned that a reduction in the number of health care providers in a market can lead remaining providers to charge more for their services and face decreased incentives to provide the highest quality of care. At the same time other experts and policymakers have focused on the potential clinical benefits and elimination of duplicate services that can result from integrating services for patients within a single organization.

### Genesis of this Brief

This brief is based on a meeting held for federal policymakers in Washington, D.C. on December 10, 2010. AcademyHealth convened the meeting as part of its Research Insights project with funding from the U.S. Agency for Health Care Research and Quality (Grant No. 1R13HS018888-01A1).

## Integration, Concentration, and Competition in the Provider Marketplace

In December 2010, AcademyHealth's Research Insights project convened a meeting that brought leading academic researchers together with policy audiences to identify policy-relevant research insights concerning market integration. The meeting focused on key research and policy questions including:

- What do we know about consolidation and integration in the hospital and physician markets? To what extent have they occurred? What are the consequences?
- What types of vertical integration have occurred among different types of providers? What evidence is available about the effects of vertical integration?
- What public policies can be used to promote integration and keep health care markets competitive?
- What additional research is needed?

This brief represents a summary of the December 2010 meeting. Because the session was "off-the-record," this document is intended to convey the general content of the meeting without attributing specific comments to particular participants. It also is not a systematic review of the economic literature on mergers and integration. At the end of the brief there is a bibliography of the most important current literature on the topic which comprises both individual research studies as well as systematic reviews.

### Activity in Hospital Markets

Hospital markets already are quite concentrated due in great part to a merger wave in the 1990s. After a lull, hospital merger and acquisition activity has continued through the 2000s, suggesting that perhaps a "mini-merger wave" is occurring now (Figure 1).

Meeting participants noted that various types of consolidation occur in the hospital market. Most arrangements are primarily financial; a small number of others involve considerable integration on the clinical level. The reasons for the current consolidation activity in the hospital market are not entirely clear, although the most common motivation is for hospitals to gain bargaining power with payers. Meeting participants noted that hospitals cite the need for greater leverage in the market as one of the reasons for being part of large networks. There is consistent evidence that insurers are losing bargaining power as hospitals consolidate. This occurs because insurers are eager to work with as broad a range of providers as possible so that their plans will be attractive to multiple employers. Insurers see some providers as "must haves" in order to attract employers who are reluctant to offer products that exclude providers. Hospital mergers may also be occurring in response to growth in outpatient care, including Ambulatory Surgery Centers (ASCs) that siphon off profitable services from hospitals. The volume of inpatient services has fallen as the volume of outpatient services has risen in recent years.

Figure 1: Announced Hospital Mergers and Acquisitions, 1988-2008



Source: Irving Levin Associates, Inc., The Health Care Acquisition Report, Fifteenth Edition, 2009 as cited in American Hospital Association TrendWatch Chartbook, 2010.

### What are the consequences of hospital consolidation for prices?

Current research shows that hospital consolidation increases prices in both the nonprofit and for profit sectors. Price increases are greater when the consolidation occurs among hospitals that are geographically closer. Price increases due to merger can be very large when the merging hospitals are close competitors and the merger leaves fewer hospitals to compete with the new entity. While agreeing that local concentration is probably the most important factor in explaining price increases, meeting participants noted that other factors, such as multi-hospital systems merging over large geographic areas, may also influence prices. These mergers may not appear to be overly concentrated in the traditional sense of being near each other geographically, but they still exert substantial market power.

One participant pointed out that price increases do not always follow mergers. The Federal Trade Commission (FTC) reviews of the impacts of mergers on prices for health care services have been mixed. Researchers at the meeting agreed that while concentration is generally associated with price increases in hospital markets, it would be useful to have a better understanding of why prices increase in some cases and not others. They also noted that price is just one factor that influences hospital choice. As one researcher noted, the voice of referring physicians often trumps price. Perceptions about quality among providers and consumers can play an important role in choosing hospitals.

A trend in affiliations between community hospitals and "star" hospitals that have reputations for high quality care and the capacity to treat the most difficult cases is also occurring. Star hospitals in markets that are not concentrated may command higher prices because of perceived higher quality. Whether the merger of a star hospital with a small community hospital has a positive or negative impact on prices or access to care is not always clear. Moreover, consumer perceptions of star hospitals are a complicating factor in assessing market power. Separately, participants concluded that specialty hospitals probably do not increase competition significantly at

this juncture, probably because their presence is too small to exert a significant force in the market.

The concept of “tiering” was raised as a strategy that insurers can use to lower premiums by making it more attractive financially for consumers to use certain hospitals on specified tiers. Participants pointed out that while tiering can be effective with drug formularies, which involve relatively simple products, the hospital situation is more complex. For example, high tier physicians do not necessarily practice at high tier hospitals. Also, hospitals may not be eager to be placed in the top tier. This may be a desired distinction in terms of quality, but it may reduce volume if insurers or consumers are reluctant to pay the higher prices associated with providers who are identified as higher quality providers. There is also the risk that tiering could shift volume toward the most expensive hospitals if the distinctions increase the demand for top tier hospitals. Consumers may also be reluctant to have their choice of hospital restricted in any way. One participant suggested that consumers who choose narrower, less expensive tiers when they are healthy often express dissatisfaction with what is available when they need care.

### What are the consequences of hospital consolidation for quality of care?

Research findings are mixed, but the preponderance of evidence tilts toward a negative relationship between consolidation and quality. Meeting participants pointed out that the distinction between financial and clinical integration may be important in this regard. The assumption that quality will improve when hospitals merge is based in part on research that shows that outcomes are better when high volumes of procedures are performed. If clinical services continue to be provided in separate settings however, the merger may not affect the way services are delivered and therefore may not affect quality. Relatively few hospital mergers to date have achieved clinical integration. Some data show that quality is higher in areas where there is price competition – as long as prices are fixed above marginal costs – but more evidence is needed.

### Activity in Physician Markets

Data on the market structure of physician services are very limited. Certain practice trends have been reported. Tracking studies show a shift away from solo practices towards mid-size groups between the mid-1990s and mid-2000s. A decline in multi-specialty groups and growth in single-specialty groups occurred during the same period (Table 1).

One clear trend for physician practices is a move away from ownership to employment. The proportion of physicians who fully or partially owned their practices declined from 62 percent in 1996-96 to 54 percent in 2004-2005.<sup>3</sup> A researcher at the meeting noted that currently more than 40 percent of physicians are employees.

**Table 1. Physicians by Practice Setting, 1996-97 to 2004-05**

| Practice Setting           | 1996-97 | 2004-05 |
|----------------------------|---------|---------|
| Solo/2 Physician Practices | 40.7%   | 32.5%   |
| 3-5 Physician Practices    | 12.2%   | 9.8%    |
| 6-50 Physician Practices   | 15.9%   | 21.8%   |
| >50 Physician Practices    | 2.9%    | 4.2%    |
| Other*                     | 31.2%   | 36.0%   |

Source: Liebhaver, A. and J. Grossman, “Physicians Moving to Mid-Sized, Single-Specialty Practices,” Tracking Report, No. 18, Center for Studying Health System Change, August 2007.

Hospitals are moving away from less formal arrangements with physicians to become employers, not only of hospitalists but also of primary and specialty care physicians. In certain communities close to all of the physicians are employees of hospital systems.

### The Supply of Physicians

A major policy issue is whether there are too many, too few or just enough physicians. Barriers to entry, which are significant for physicians, have a big impact on the number of doctors. Organized medicine limits the number of slots provided for both medical school and residency training. On the other hand, the heavy subsidization of training encourages demand for entry into the physician market. Statistics cited at the meeting indicate that the number of physicians *per capita* has grown substantially since 1960. At the same time, the share of international medical graduates has been relatively stable.

Policymakers are concerned about a shift among physicians away from primary care and toward the medical specialties. A meeting participant reported that the shift began in the decades after World War II, but since then the pattern has not particularly accelerated. Currently, only 35 to 40 percent of physicians practice primary care medicine. Earnings by specialists are substantially higher. Participants said that this is due to a number of factors, including the greater training, but also control of the number of residency training slots by specialty societies, which limits entry into specialties.

Supply may also be affected by the number of hours that physicians are willing to work. There is a perception that physicians, particularly young physicians, want to work fewer hours and have more predictable hours than their predecessors. Growth in the share of physicians who are women is one reason often cited for physicians’ preference to work fewer hours though little research has been done on this factor.

Changes in the demand for physician services also affect the adequacy of supply. In the coming years, the need for physicians will increase due to the aging of the population, rising national income, and increased access to health insurance, which is anticipated as the Affordable Care Act is implemented.



The role that ancillary personnel such as physician assistants and nurse practitioners will play going forward is unclear given variations across states in allowed scopes of practice for non-physician providers and the intensity of debate surrounding proposals to change them. Although one argument in favor of substituting ancillary personnel for physicians is the potential to lower costs, evidence at this point suggests that price does not have a significant impact on choices consumers make between physicians and non-physician personnel. Similarly, participants noted that while discussion of the effect of technology on the demand for physician services is common, there is not agreement on the topic.

There is strong evidence that physicians respond to economic incentives and when payment methods change, physician behavior changes. Efforts to control spending for physician services are difficult. If fees are cut for one procedure, physicians may substitute another. In response to pay cuts in their core business, physicians may respond with increases in volume. But for marginal services they may decrease the volume. Facing fee cuts for certain procedures and services performed in the office, some cardiologists have become hospital employees to take advantage of higher fees paid for hospital services.

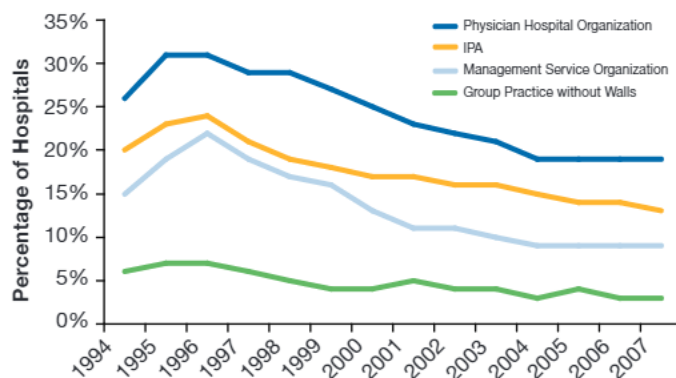
### Physician Concentration and the Adequacy of Physician Networks

Due to the lack of data, research on concentration in physician markets is sparse. Anecdotal evidence suggests that physician markets may be becoming more concentrated. Much of the activity in this regard is among specialists; practices are consolidating within or across specialties to form networks in multi-county areas or even statewide. Physicians may be motivated to consolidate if they believe that with more volume they are in a better position to negotiate with insurers for higher prices. As with hospitals, insurers are concerned with developing good physician networks. This is especially true in smaller markets with limited number of specialists. Insurers have been willing to increase premiums to pay providers a level necessary to maintain networks that are appealing to employers. A few participants commented that the formation of networks often occurs “under the radar” and does not trigger review by regulators.<sup>4</sup> Physicians may also affiliate so that they can bring ancillary services into their practices, making them more profitable. The supposition is that market concentration and price are related, but that remains to be seen. The relationship between concentration and quality is ambiguous.

### Data for Research and Policy

Commenting on the lack of reliable data regarding the physician market, several speakers suggested that this area is ripe for investment. The development of databases with information about physicians is needed in order to define markets, measure competition, and evaluate the adequacy of physician networks in terms of

Figure 2: Physician-Hospital Trends, 1994-2007



Source: American Hospital Association *TrendWatch Chartbook 2010*; American Hospital Association *TrendWatch Chartbook 2003*.

access, price and quality. In particular, information about where physicians practice would be useful because they often work in several locations. More data on physician negotiating units, which may be available from some health plans, are also needed to better understand physician markets.<sup>5</sup>

### Vertical Integration

A substantial amount of vertical integration has already occurred in the health care system and the trend will likely continue as ACOs are established.<sup>6</sup> Vertical integration, which occurs among different types of providers such as hospitals, outpatient facilities and physicians, is already characterized by a great diversity of arrangements in the broad health care market. Figure 2 shows trends in some of these arrangements.

Organizations such as the Mayo Clinic or the Cleveland Clinic, which own hospitals and employ salaried physicians, are often cited as exemplary models of vertically integrated systems that provide care effectively and efficiently. This type of group employment model is relatively rare, however, and is used by just about six percent of the population. Changes in the payment and delivery systems for health care may facilitate the spread of these models.<sup>7</sup> Most of the well-known group employment models were established in the early 1900s. The 1970s and 1980s saw the development of health maintenance organizations (HMOs) that linked insurers and providers. The 1990s also saw high interest in vertical integration as the Clinton health plan was formulated and relied on the concept of managed care organizations (MCOs). Independent practitioner associations (IPAs), affiliations of solo practitioners and small physician groups, have been developed by groups of physicians, independently or in association with hospitals to share resources and improve bargaining power. Physician hospital organizations (PHOs) have also been formed. Currently, the most common types of vertical integration involve physicians and hospitals, but a hospital-based insurance plan trend is continuing and because of the Affordable Care Act there may be interest from providers in establishing their own plans. Other entities such as

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surgery centers, imaging centers, labs, specialty hospitals and clinics may also be involved in vertical integration efforts.

### Hospitals and physicians

Hospitals have re-engaged in buying medical practices but instead of paying salaries, as was common practice in the past, they are basing compensation in part on productivity. Hospitals may be motivated to employ physicians in an effort to increase patient referrals and to better manage the delivery of care. Hospitals may also see the potential to achieve efficiencies and cut costs if they have more control over protocols or practices for physician employees. For example, if all procedures are done in a similar manner, the hospital may be able to purchase one type of device rather than several to accommodate individual surgeons' preferences. Hospitals assume that physicians will be more likely to do the kind of reporting that is needed to measure quality and improve performance in the hospitals if they are employees. Increasingly, payers are requiring that hospitals report certain information and there is a perception that requirements will increase in the future. Another motivation for hospitals that employ physicians may be to augment the supply of primary care physicians in the community. Anticipating a severe shortage of primary care physicians when more people have health insurance, hospitals want to assure that their facility and the community more broadly has a sufficient supply of physicians.

It is not yet clear that employing physicians is profitable for hospitals. Payment rates are higher for hospital-based than office-based physicians, thus generating revenue, but overhead may increase and if hospitals have to pay competitive salaries for physicians the hospital may not realize financial gains.

In addition to potential financial advantages, physicians may be interested in hospital employment because of the guarantee of a predictable salary platform and of regular hours. Anecdotal evidence suggests that younger physicians do not want to set up or join small practices. They perceive that the business of running a practice has become very complicated and that reimbursement rates are low for small practices in many areas because they do not have sufficient leverage in bargaining with payers. Meeting participants observed that the trend toward hospital-physician arrangements has been established and will likely continue regardless of whether ACOs are formed.

### Does vertical integration improve quality and reduce costs?

Although a great deal of activity related to vertical integration is occurring, the evidence does not show success for most arrangements in terms of reducing cost or improving quality. One participant noted that there is some thought among researchers about the potential for positive results related to vertical integration, but most of the research does not support cost savings or quality improvements due to integration. A review of hospital-physician relationships

found a high degree of activity, but not much evidence of lower costs or higher quality associated with the arrangements. 8 Newer forms of vertical integration have not yet been studied.

The effect on prices is not as clear in the case of vertical integration as for horizontal integration. Anecdotal evidence suggests, however, that integration involving hospitals and physicians has the potential to raise prices. Some providers have said that they form alliances because they want to negotiate together. They may be able to foreclose rivals from a market or raise barriers to entry for new physicians. Even when hospital-physician alliances lead to more efficient, higher quality care, organizations may negotiate with insurers to keep those profits through higher prices rather than passing the benefit on to payers.

Participants discussed several of the reasons that positive cost and quality outcomes associated with vertical integration have not been documented. With so many different types of integration occurring, researchers have often not taken into account the degree of clinical or financial integration actually achieved. Therefore, in conducting research, it may be useful to concentrate more on the processes that underlie organizational change, for example, the extent to which protocols change when clinicians from separate organizations become part of a single organization. Another reason for the lack of empirical evidence of benefit is that some motivations for integration may not be compatible with containing costs or improving quality. For example, the primary aim of hospitals and physicians in consolidating may be to increase revenue rather than to reduce costs or improve quality. As one participant noted, the evidence so far is that providers who consolidate for reasons other than efficiency don't achieve efficiency.

### What are the implications for Accountable Care Organizations?

Integrated systems are a key component of current efforts to reform the delivery of health care services. The ACA promotes provider integration into ACOs as an intended means to reduce costs and improve quality. It establishes a Medicare shared savings program for ACOs, effective January 2012.<sup>9</sup> ACOs are defined as networks of physicians and other providers that work together and are supposed to be jointly accountable for improving the quality of health care services and reducing costs for a defined patient population. ACOs are expected to have a strong primary care component, but they may be organized in a variety of ways and may use different payment models. The challenge for regulators is to develop policies that not only promote integration, but also help maintain well-functioning competitive health care markets.<sup>10</sup>

The sense among the meeting participants is that proponents of ACOs and other forms of vertical integration among different types of providers rationalize these arrangements with the assumption that they increase efficiency by decreasing fragmentation of care and by creating economies of scale. However, meeting participants



agreed that these assumptions are not necessarily supported by academic research and expressed concern about the rush to integrate without a strong evidence base. They noted that the organizations that are often cited now as exemplary examples of vertical integration were established early in the 1900s. There are questions about whether they can be replicated under current circumstances. Expectations for ACOs are high, but there is uncertainty about how and whether they will achieve the goals, particularly because they may rely on new and unproven payment arrangements.

One train of thought among meeting participants is that the amount of consolidation that has already occurred may help pave the way for ACOs to work as they should. Currently, however, hospitals employing physicians generally pay them on a productivity-oriented basis. A system that bases compensation on a volume-related metric may be appropriate to the current reimbursement environment, but it may not work in an ACO. Participants further cautioned that organizations cannot “turn on a dime” to become ACOs. At this point there is uncertainty about whether ACOs will be physician or hospital led. Primary care physicians may become a more valued commodity again as they were during the HMO era of the 1990s if they have more responsibility for managing care. However, the dynamics now will be different because so many physicians are employed by hospitals rather than by payers.

Although the Affordable Care Act promotes ACOs for Medicare, providers may be more interested in establishing ACOs if they can also enter into contracts with other payers. The extension to other payers raises issues, however. Participants observed that organizations that come together and create efficiencies for Medicare may not be able to work together in the same way on the private side without risking scrutiny from regulators. Forthcoming guidance from the Department of Health and Human Services (HHS), the FTC, and the Department of Justice may help to clarify this issue.

### Public Policies that Affect Provider Integration

There was general agreement that changes in the organization and delivery of health care services already are occurring rapidly and that more significant changes are likely as providers consider whether and how to embrace the ACO model, as well as other forms of integration that are likely to emerge as health reform is implemented. Based on the evidence that is available and on their considerable experience, meeting participants were asked to discuss what public policies can help assure that integrated markets will remain competitive and that cost containment and quality improvement will accompany integration.

### Antitrust Enforcement

Antitrust enforcement has been a common means of responding to consolidation in health care markets.<sup>11</sup> Participants commented that not all forms of integration are anti-competitive, but that the issue of whether certain arrangements give providers sufficient market power to raise prices above competitive levels is one that must continue to be addressed. One particular challenge for providers who are considering establishing ACOs is the current uncertainty about legal and regulatory issues related to provider integration. Because providers do not want to risk violating fraud, abuse or antitrust laws, the forthcoming guidance from federal agencies will be important in determining the future of such arrangements.

Some participants argued that with markets already so concentrated there is not much opportunity for antitrust activity. Others noted that although markets, especially hospital markets, have become more concentrated, they have not reached the level of concentration that makes further enforcement useless. Participants stressed the importance of considering the characteristics of individual markets in antitrust deliberations, for example, not only where hospitals are located, but also how different they are in terms of the services they offer.

There are questions about how effective antitrust enforcement can be moving forward. Antitrust has been used to block mergers of large organizations and physician-hospital consolidations have historically been challenged successfully, but there may be limits to what can be accomplished. Antitrust is not a good tool for blocking small consolidations. Small mergers of physicians or serial acquisitions of physicians, for example, pose a challenge for antitrust enforcement.

Generally, in examining relationships between physicians and health plans, enforcers have been concerned with the degree of economic integration and its relation to achieving efficiencies as well as its effect on competition in the market. Meeting participants observed that as a practical matter, it will be hard to argue that an entity the Center for Medicare and Medicaid Services (CMS) terms an ACO is not well integrated. One suggested that if ACOs meet requirements or adhere to definitions established by CMS they should be considered sufficiently integrated for antitrust purposes. If ACO certification does become a proxy for sufficient integrations, regulators will likely focus on whether the organizations have too much market power and that will be more difficult to determine and to challenge.

### Additional Policy Levers

Participants noted that concentration is not the sole cause of rising prices; therefore, policymakers should focus beyond policies that attempt to affect competition in the provider marketplace in order to control costs. Furthermore, antitrust rules are not the only policy

levers available to policymakers who are concerned about provider concentration. One approach would be to require greater transparency. For example, regulators could require insurers to disclose with which providers they are negotiating. Such reporting could provide an opportunity to look systematically at how negotiation affects price. There is also the potential for more effective monitoring going forward through requirements already in the ACA that ACOs report utilization, cost, and quality data.

Growth in the availability of outpatient services at free-standing facilities suggests that easing the entry of alternate delivery models, like ambulatory surgical centers (ASC), into a market may also help stem anti-competitive behavior. Consumer education about the availability or benefits of these alternate care settings may help increase demand for them.

Participants emphasized that it is important to focus on increasing consumer knowledge about and demand for the delivery of higher quality, lower cost services. Previous research has documented that consumers often do not know what insurance product they are buying. Meeting participants suggested that more research is needed on consumer perspectives, particularly about quality. In addition, consumer education efforts would be helpful. For example, more education about the relative quality of hospitals could be useful in increasing consumers' willingness to go to community hospitals. In addition, creating greater price transparency would give consumers more of the information they need to make better health care choices. Some participants suggested that competition could be promoted by demand side policy. These participants suggested that greater cost-sharing by consumers would give them greater incentives to seek out lower prices and thereby force providers to compete more strongly. Other participants doubted how effective such policies might be.

Payment regulation and other regulatory responses could be used to maintain balanced competition in markets. For example, Maryland's all payer system sets uniform rates for all payers. There was some discussion on this point, with participants taking a variety of positions on the desirability and effectiveness of regulatory approaches. In addition, there could be ways to use tax policy to increase competition. Reducing or eliminating the income tax exclusion for employer provided health insurance would lead consumers to hold less generous health insurance policies, thereby leading to greater incentives for consumers to be cost conscious. Taxing "Cadillac," or very comprehensive policies could also affect the choices consumers make about the type of coverage they purchase. Rhode Island has adopted an innovative approach to encouraging adequate primary care in physician networks through the insurance rate review process.

### Conclusion: How can research inform current and future policy?

With the current push for more integrated health care delivery systems, participants were asked to comment on the role that research could play in helping to ensure that public policy supports markets and organizations that deliver lower cost, higher quality health care services. Policymakers in attendance identified several ways in which researchers can contribute to policy decisions:

- Comments on anticipated proposed regulations are needed, particularly regarding:
  - The criteria CMS will use in awarding ACO contracts for the Medicare shared savings programs;
  - The type of data gathering that should occur once ACOs are established;
  - The type of measures that should be reported and used to make determinations about the quality of services.
- Assessment of the effect of the new ACOs on cost and quality outcomes in the markets in which they operate is a priority for meeting participants. Results likely will not be available for some time, however, since CMS will initiate three-year contracts to the initial group of ACOs in 2011.
- Empirical evidence from past years should not be ignored. Since delivery systems continue to change, some policymakers questioned whether experience from previous periods is relevant now. But others said that it might be some time before new evidence is available. While they acknowledge some differences between current and past periods, they also expressed the belief that there is value in adding to the knowledge base about the experience of earlier forms of provider integration such as IPAs and PHOs. In addition, participants noted that because analyses of past hospital mergers showed mixed results about the impacts on prices and quality in different geographic markets, it would be helpful to continue to explore the potential reasons for such variations.
- There is a need to develop more precise definitions to guide research efforts and to help interpret findings. For example, participants observed that hospital markets have traditionally been defined geographically, but with the development of large network systems there is a need to better define and understand geographically disparate systems. Similarly, defining physician markets should take geographic practice patterns and network affiliations into account and should differentiate among primary care and specialty physicians. The presence of "star" providers is another market factor to consider and participants pointed out that even now health care organizations are developing global networks with some providers located outside the United States. There is also a need to be clear about the extent of integration.



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Beyond an agreement among different entities, how much financial or clinical integration actually occurs?

- Study related to the current variety of networks would be helpful. Participants noted that predicting the future is difficult insofar as there are unique factors in any given market that could influence actions. Accordingly, the current variety of networks that include more than one type of provider as well as the many types of relationships between providers and insurers should be studied. Other environmental factors such as for profit versus not for profit status are relevant, as well as assessing whether two organizations considering integration are competitors. The level of insurer concentration in a market is also relevant, as is the relative mix of HMO and preferred provider organizations (PPOs) insurers. Whereas choice of providers is a local phenomenon, to the extent insurers expand the reach of their offering, demand may shift to larger geographic areas.
- There is a need for more analysis on what impact demand side levers have on the market. In addition, more information on the relationship and interplay between the insurance and provider markets is needed. Participants suggested that it would be useful to explore issues around price regulation.
- Health information technology (HIT) may provide data to confirm or challenge beliefs. For example, one participant pointed out that there are many who believe that it is possible to get better value and better care from integrated health systems. HIT may also assist researchers in better defining integrated systems.
- In evaluating the impact of one set of changes it is important to take others into account, according to meeting participants. For example, given current trends, how much integration would occur even without ACOs? Other public policies have already promoted a greater exchange and different flow of information among health care providers and insurers, which can be considered a form of integration and may have a separate effect on markets.<sup>12</sup>

### About the Author

Laura Summer, M.P.H., is a senior research scholar at the Georgetown University Health Policy Institute.

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### Endnotes

- 1 "Market concentration" is a term often used to refer to the number of firms in a market and their share of the market. When fewer firms account for a larger share of a market, it is considered to be more concentrated.
- 2 In the health care field, the "integration" has both clinical and economic meanings. Clinically, it refers to greater collaboration among health care providers in the care they provide patients. In economics, integration refers to the merger of two or more economic actors and can be either horizontal or vertical in nature. Horizontal integration refers to the consolidation of two or more organizations fulfilling the same roles within a single industry – e.g. hospital mergers or mergers among different physician groups. Vertical integration refers to the consolidation of economic factors responsible for different stages of the production and supply of particular products or services. In health care, the merger of a physician group with a hospital or the merger of a hospital with a skilled nursing facility are examples of vertical integration.
- 3 Liebhaber, A. and J. Grossman, "Physicians Moving to Mid-Sized, Single-Specialty Practices," *Tracking Report*, No. 18, Center for Studying Health System Change, August 2007. Also see <http://www.hschange.com/CONTENT/941/>
- 4 Rhode Island, which has used the insurance rate review process as a mechanism to assure an adequate supply of primary care providers in insurers' networks, is an exception.
- 5 Participants discussed the potential for agreements with health insurance companies that allow government agencies to obtain data about physician markets. These might be similar to agreements that the Centers for Disease Control has with some insurers to obtain data to monitor disease trends.

- 6 Accountable Care Organizations (ACOs) are defined as networks of physicians and other providers that work together and are jointly accountable for improving the quality of health care services and reducing costs for a defined patient population. They are discussed in more detail later in the brief.
- 7 Minott, J. et al. "The Group Employed Model as a Foundation for Health Care Delivery Reform," The Commonwealth Fund, April 2010. Also see <http://www.commonwealthfund.org/Content/Publications/Issue-Briefs/2010/Apr/The-Group-Employed-Model-as-a-Foundation-for-Health-Care-Delivery-Reform.aspx>
- 8 Burns, L. and R Muller, "Hospital-Physician Collaboration: Landscape of Economic Integration and Impact on Clinical Integration," *The Milbank Quarterly*, Vol. 86, No. 3, 2008, pp. 375-434.
- 9 Accountable Care Organizations might also be established as one of the payment and service models to be tested by the new Center for Medicare and Medicaid Innovation at the Centers for Medicare and Medicaid Services (CMS).
- 10 As of March 2011, the Department of Health and Human Services (HHS), the Federal Trade Commission, and the Department of Justice are collaborating to provide guidance to providers, and the Centers for Medicare and Medicaid Services at HHS is expected to release its regulations for ACOs for public comment in the first part of 2011.
- 11 In 1982, the U.S. Supreme Court held that efforts by non-integrated medical care associations to set fees charged to insurers constituted a *per se* restraint of trade. In order to avoid *per se* liability, physician arrangements would have to be financially integrated. In 1994, the Department of Justice and the Federal Trade Commissions issued "Statements of Antitrust Enforcement Policy in Health Care," which recognized substantial financial risk as a reliable indicator of sufficient integration. A reissued statement in 1996 identified clinical integration as an additional means for physician groups to avoid antitrust liability for the negotiation of fees. See: Burke, T., and S. Rosenbaum, *Accountable Care Organizations: Implications for Antitrust Policy, Aligning Forces for Quality*, The Robert Wood Johnson Foundation, March 2010.
- 12 The Health Information Technology for Economic and Clinical Health Act (HITECH), enacted in 2009, encourages the adoption and meaningful use of information technology to help coordinate and integrate the provision of health care services.