THE PROSPECT OF HEALTH REFORM HAS UNLEASHED A FRENZY OF activity in healthcare: mergers, consolidations, alliances, physician-hospital organization development, practice acquisition, and the like. These strategies assume managed care-based reform, in which funding for those who are newly enfranchised will flow not to individual providers, but to systems and networks. This assumption is probably valid. Yet the current, frantic restructuring of health services in search of the illusive "integrated" healthcare organization may actually make it more difficult for hospitals and physicians to function under capitation.

What those realigning healthcare systems seek in creating an integrated system is the ability to accept a single check from a sponsor (public or private) of an enrolled population, and to manage the pool of funds thus created to cover the health needs of the population while assuring that everyone involved in their care gets paid. it is assumed that it will be easier to do this if all the pieces of the health system needed to care for the population are integrated into—that is, owned by or employed by—a single organization.

In the footsteps of industry

Where did the idea of "integration" in healthcare come from? The most comprehensive discussion in the business literature is found in the writings of Alfred DuPont Chandler, the historian of business at the Harvard Business School. Writing in 1962, Chandler detailed how successful firms in manufacturing and retailing used horizontal and vertical integration, and organizational realignment, to dominate their respective industries (Strategy and Structure: Chapters in the History of the American Industrial Enterprise, MIT Press).

Firms like DuPont, Standard Oil, and General Motors followed a common pattern: acquisition of competing firms and integration of suppliers and distributors into their organizations, incorporating the middlemen and their profits into the larger organization, as well as acquisition of raw material feedstocks and transport systems to procure ingredients for manufacture more cheaply. Some firms, like General Electric and the large automakers, also integrated into the financing of their products, expanding the market for their goods.

By coordinating the production and marketing of their goods, the large integrated firms created a crushing cost and service advantage over their less-integrated competitors, enabling them to dominate their respective industries.

In the late Seventies, it appeared that the same pattern was establishing itself in healthcare. Investor-owned hospital systems were acquiring large numbers of small, freestanding hospitals, spurring not-for-profit system formation in their areas.

Prepaid plans like Kaiser and the group health cooperatives, which integrated financing and delivery, were experiencing rapid growth. Visionary leaders like Dr. James Campbell, who built the Rush-Presbyterian-St. Luke's Health System in Chicago, had assembled, by the early Seventies, most of the pieces of a vertically integrated health system: academic health center, a regional network of community hospital affiliates, a staff model prepaid health plan, an inner-city community health center system for the unfunded, and a broad base of private practitioners.
Surveying these developments, and influenced by Campbell's example in particular, I forecast in 1980, in _Can Hospitals survive?_ the replication of Chandler's pattern in healthcare. The intervening years have seen multiple waves of organizational change in healthcare: mergers, consolidations, corporate reorganization and diversification, and creation of hospital-linked or hospital-owned physician organizations. The recasting of healthcare organizations has become a billion-dollar business for healthcare attorneys and consultants, which has grown explosively during the past two years of impending health reform.

**Little hard evidence**

It is fair to ask, after better than 20 years of system development, how valid is Chandler's model for healthcare organizations. Is the forecast of a health system dominated by large, industrial-style integrated organizations a valid picture of the future?

After surveying the literature and reflecting on 14 years of consulting experience working with systems, I find it stunning how little hard evidence of economic advantage to share gain has accrued from system development in healthcare.

Stephen Shortell has spent a good part of the past decade studying health systems. He summarized a lot of the results; in the late Eighties, concluding that belief in the inevitability of systems -- not hard, measurable economic advantages -- were propelling system growth in healthcare. "There is little support," he wrote in _Medical Care Review_, "for any of the alleged advantages of system hospitals relative to their nonsystem counterparts. Little, if any, economic or service 'value added' appears to be present."

There is little evidence of economies of scale or co-ordination in healthcare. Larger healthcare organizations have not been able to produce care at a lower price, or of demonstrably superior quality, than smaller, less integrated competitors. If anything, larger healthcare organizations have actually displayed dis-economies both of scale and coordination.

In my consulting experience, "systems" in healthcare have been characterized by more management layers, higher-paid executives, greater dependence on expensive external advisers, slower decision-making, and systemic problems relating to those health professionals—such as physicians and nurses—who are in closest contact with the patient and community.

This last problem may be the most critical. The gulf between system executives and professionals widened during the Eighties and early Nineties, as executives perceived that they would be less dependent on professional support and so invested little energy in attempting to make all the organizational restructuring meaningful to those who get blood on their shoes. The consequences of this gulf and the inevitable mistrust that has grown as the gulf has widened, have been to create an explosive and dangerous organizational milieu (described in my "Driving the Nitroglycerin Truck," in the March/April 1993 issue of this journal).

**Physician networks at the center**

The central question about integration in healthcare is this: How is value created in health services? Merely having a large asset base, owning a lot of beds or health-related businesses, or employing a lot of physicians does not, by itself, create value. What many healthcare executives
really seem to be seeking in integration is to maximize the use of their assets, not reduce the per capita cost of care or improve the health of their communities. Contemporary strategies such as physician-hospital organization development or physician practice acquisition are, for many organizations, really no more than exceptionally risky efforts to prop up excess capacity and fixed cost by buying utilization or market share wholesale.

In this strategic scenario, the hospital and its empty beds remain firmly imbedded in the center of the health system; the continuum of care continues to pass through the hospital. In the American Hospital Association's vision of a reformed health system, the core architecture is a network or cartel of local hospitals that has absorbed and reorganized the rest of healthcare delivery in the local community.

If you examine what is happening in California, it is clear that the hospital is not the center of the emerging healthcare delivery system. Where this center is, exactly, may vary from place to place inside the state, but it is somewhere inside the physician community. Physician groups and networks that span metropolitan areas or regions are the emerging superstructure of health delivery in California, and how physicians organize is becoming the crucial determinant of how health dollars will flow.

The wisdom of emulating Kaiser

Many hospital systems in the state realize this, and several of the most progressive of them—Sharp in San Diego, Sutter in Sacramento and the Bay Area, and UniHealth in metropolitan Los Angeles—have refocused their strategies around organizing physicians. Overtly or covertly, these systems have modeled their efforts around those of the Kaiser Permanente Medical Care Program, whose core architecture is a powerful multi-specialty physician organization: the Permanente Medical Group.

It is worth evaluating Kaiser's market experience to determine how wise it is to emulate this model. Kaiser is the exemplar of vertical integration in healthcare: a medical care plan that owns its own facilities and, through a captive group, employs its own physician cadre. Kaiser is the largest actor in California's health insurance market, and at $10 billion in annual revenues the largest HMO in the United States. While other health plans suffered massive underwriting losses in the 1986-87 health insurance crash, Kaiser remained solidly profitable.

However, by the early Nineties, Kaiser was losing market share in Most of its major Pacific markets and losing enrollment at a rate of 3 percent annually (for the past two years) in Southern California, the scariest and most dynamic health insurance market in the United States. It was also adding fixed cost and capacity through a multi-billion-dollar "catch-up" building program further eroding its cost advantage relative to the newer, sleeker, hungrier, and less-integrated health plans like PacifiCare, FHP, HealthNet, and Wellpoint.

These plans, which are taking share from Kaiser in California, have several key things in common: They do not own hospitals (except FHP, which owns one small hospital in Los Angeles) and they do not employ doctors. They rely upon relationships with physician groups or networks to provide medical services to their subscribers, and they have been extremely aggressive both in controlling hospital use and in paying bottom dollar for the hospital services they do use.
Their principal assets are information systems and cash—not bricks and mortar. And they not only have far more sophisticated mechanisms for evaluating practice patterns than Kaiser, but have experimented intensely with the best methods of paying physicians. While Kaiser pays its physicians on salary, these plans increasingly capitate their physicians.

Kaiser's problem may be that it is too integrated. The physician's economic risk and commitment in Kaiser's system may have been so thoroughly diffused by the large regional groups as to have disappeared at the point of patient contact. The bureaucracy that is needed to administer a huge, capital-intensive, captive health system has become an impediment to Kaiser's ability to respond to changing market conditions. If Kaiser is not to become the IBM of American healthcare, its senior leadership must find a way to re-animate this system.

**A new model: virtual integration**

The core flaw in the integration movement in healthcare is the use of an obsolete, 19th-century, asset-based model of integration, in which accumulation of assets in a conglomerate style is assumed by itself to confer meaningful economic advantage. To respond effectively to the evolution of healthcare payment, healthcare managers will need a new model of integration, and clues to its logic may he derived from studying the nation's biotechnology industry.

Capital has been so costly and difficult to accumulate in the biotech arena that even wealthy companies like Chiron and Genentech have been unable to assemble all of the resources to invent, manufacture, and market their products under one corporate umbrella. The biotechnology industry today is in elaborate web of corporate alliances and licensing and marketing agreements that sometimes knit together firms that otherwise compete with one another.

Rather than vertical integration, biotechnology firms have pursued what Steven Burrill, Ernst and Young's biotechnology guru, refers to as virtual integration. Corporate arrangements to develop and market products are usual product- or market-specific, mid tailored to the unique corporate competencies of strategic allies.

Firms like PacifiCare, United Healthcare, and Humana are virtually integrated healthcare organizations. What holds them together and makes them profitable is two elements: (1) the operating system—that is, the framework of agreements and protocols that governs how patients are cared for, as well as the information systems that monitor that flow; and (2) the framework of incentives that governs how physicians and hospitals are paid.

Both frameworks are "learning systems," which are evolving and changing as more is understood—particularly about how to encourage physicians to conserve clinical resources and improve how care is provided. All these Virtual healthcare systems invest substantial resources in developing and maintaining their provider networks, focusing primarily on the community-based network of physicians participating in the plan.

Humana's decision to divest itself of its hospitals in 1992 represented a shift in strategy from the old, industrial model of vertical integration to the newer model of virtual integration. Humana concluded that its two main businesses—hospitals and health plans—were fundamentally incompatible, and decided to divest the low-return business by selling its hospitals.
Interestingly, Humana and its old hospitals remain linked through virtual integration: Humana and the firm that purchased Humana's hospitals, Columbia/HCA, have marketing agreements in the markets where Humana sells health insurance. For example, Humana (not Medicare) is the largest payer for Columbia/HCA's Florida hospitals, based upon deep discounts offered Humana health plans by Columbia/HCA facilities. Humana derives benefits from its working relationship with Columbia/HCA without bearing the capital risk of maintaining a hospital network or the political risk of all the hospitals' interpenetrating economic ties to physicians.

**Muddling toward workability**

Many of the new entities presently being created by merger and practice acquisition will prove ungovernable and unprofitable, and the latter part of the Nineties and the first decade of the next century will be spent unwinding mergers, shedding fixed cost and capacity, reducing administrative cost, and spinning off health-related businesses and employed physicians into self-governing entities tied to their former sponsors by marketing agreements and pooled risk capitation.

These same strategies -- deleveraging, shedding unrelated businesses, and reducing fixed cost and administrative expense have become the major strategic challenge for many of the exemplars of Chandler's classic integration model in manufacturing and retailing such as General Motors and Sears. The classic industrial model of vertical integration no longer produces value in most major industries. Japanese firms have used elaborate networks of relationships called "keiretsu," not integrated ownership, to dominate newer industries such as consumer electronics.

The most difficult task for healthcare managers and physician leaders in the transition may be finding the right distance between partners, and finding a way of paying physicians that maximizes the value of the services they provide.

The more difficult longer-range strategic choice involves how far to integrate into the financing of health services. Most physician-hospital organizations are intended to provide funding conduits for shared risk contracting with health insurers. However, many healthcare executives and physician groups believe that they will eventually be able to eliminate the middleman and contract directly with employer groups or regional purchasing co-operatives, assuming the underwriting risk as well as operating risk for enrolled groups.

Direct contracting of providers with employers is in its infancy, and whether it will prove a viable strategy may not be known-or even knowable-for perhaps a decade. What is known already is that over the past 20 years providers have had a deplorable track record in operating as health insurers. There are a few distinguished exceptions: Lutheran Hospital Society Of Southern California's spectacular success with PacifiCare, Humana's health plan growth, and the Henry Ford Healthcare System's dominant position in metropolitan Detroit.

But for every success story, there are equally spectacular failures: VHA's Partners National Health Plan, the HCA Equicor joint venture, AMI's and NME's entries into the health plan arena at the national level. and dozens of less publicized local failures.

There is a fundamental conflict of interest between the health insurance business and the traditional business of fee-for-service medicine, to which the vast majority of providers today continue to owe their operating margins and incomes. This conflict makes it difficult for system
executives or physician leadership to commit to wholesale changes in compensation, revenue flows, and clinical behavior without risking huge losses in at-risk arrangements. While there are some parts of the country, like the mid-Atlantic region, where market conditions may reward captive health plan development, the time is well past in many other parts of the country where the managed care shakeout is well along.

For a traditional provider network to achieve even 25 percent self-sufficiency—that is, 25 percent of revenues coming (profitably) from a captive plan or direct contracting—would be a great victory. This still leaves the fundamental challenge of making money on the 75 percent of revenues that come from direct service provision to health plans the network does not own or sponsor.

To do this latter task successfully will require a single-minded focus on cost reduction, process improvement, and value creation that has thus far eluded most traditional healthcare executives, who continue focusing on revenue-side maneuvering to sustain their business. The current integration frenzy is only the latest manifestation of intense denial of the need for cost control on the part of many healthcare professionals and managers.

Rather than invest scarce resources and capital in health plan development, many systems are focusing instead on regional network development. The problem here is that this network development is devolving into a frantic scramble to acquire medical practices. This strategy not only vitiated efforts to keep physicians at risk (by employing physicians formerly in private practice, systems have effectively eliminated the physician's risk), but it dissipates the scarce capital necessary to build the "operating system" that will enable physicians to communicate with one another—and to evaluate and change practice patterns.

Network development is a vital strategic imperative if physicians and hospitals are not simply to become pawns of health plans, locked into adverse fee schedules, unwieldy external utilization controls, and "per diem prison." But network development at any price is not effective business strategy.

An alternative path

Sensing the difficulty of successfully integrating into financing of care, some system CEOs have taken an alternative path to the captive plan: forming a market-specific strategic alliance with an established health insurer who shares their values. Blue Cross/Blue Shield of Oregon has allied with Legacy Health System in Portland, St. Joseph's Health System has allied with FHP in Albuquerque, and Good Samaritan and Bethesda Health systems have allied with ChoiceCare in Cincinnati.

How successful these partnerships will be remains to be seen, but they do represent a "virtual"—rather than "vertical"—approach to integration, which places appropriate burdens of performance on each of the partners without requiring them to master a fundamentally new business. The health systems involved can concentrate their attention on cost management and network development; the health plans can focus on new-product development and refinement of physician compensation and clinical information systems.

Conserving clinical resources, and value-engineering the provision of health services to defined populations in our communities, is the emerging business of healthcare systems.
Achieving clinical discipline and commitment on the part of physicians and other health professionals to improving the value of health services is the fundamental challenge facing all those who participate in our healthcare system. Value creation in health services is ultimately about altering and making more systematic and responsive the decision-making of practicing clinicians and other caregivers.

In business, the correct organizational structure is the one that most elegantly and simply encourages the creation of value. In healthcare, we are only now learning that structure must follow from strategy, not precede it or somehow mystically embody it.