

Managing the Care of Health and the Cure of Disease—Part II: Integration

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The development of appropriate levels of integration in the system of health care and disease cure will require stronger collective cultures and enhanced communication among the key actors. Part II of this paper uses this line of argument to reframe four major issues in this system: coordination of acute care and of community care, and collaboration in institutions and in the system at large.

Systems that are highly differentiated generally require correspondingly high degrees of integration. We concluded in Part I that the system properly labeled “health care and disease cure” is characterized by an enormously high degree of differentiation yet rather low levels of integration. Either differentiation has to be reduced or integration increased. Since differentiation is not only the very essence of this system, but also a source of its great strength; it is the level of integration that shall have to be increased.

STRENGTHENING THE MECHANISMS OF COORDINATION

Six basic mechanisms exist to integrate, or coordinate, work in organizations.¹ These are illustrated in Figure 1 and described below.

Mutual adjustment is the most direct form of coordination: Two or more people simply adapt to each other as their work progresses, usually by informal communication. This mechanism tends to be relied upon in the simplest of situations (such as two people canoeing through rapids) as well as in the most complex (as in teams designing a new aircraft).

Direct supervision focuses responsibility for coordinating the work on someone who does not actually do it; a “supervisor,” “boss,” or “manager” is named (and a “hierarchy of authority” thus created) to issue directives to the different people doing the work.

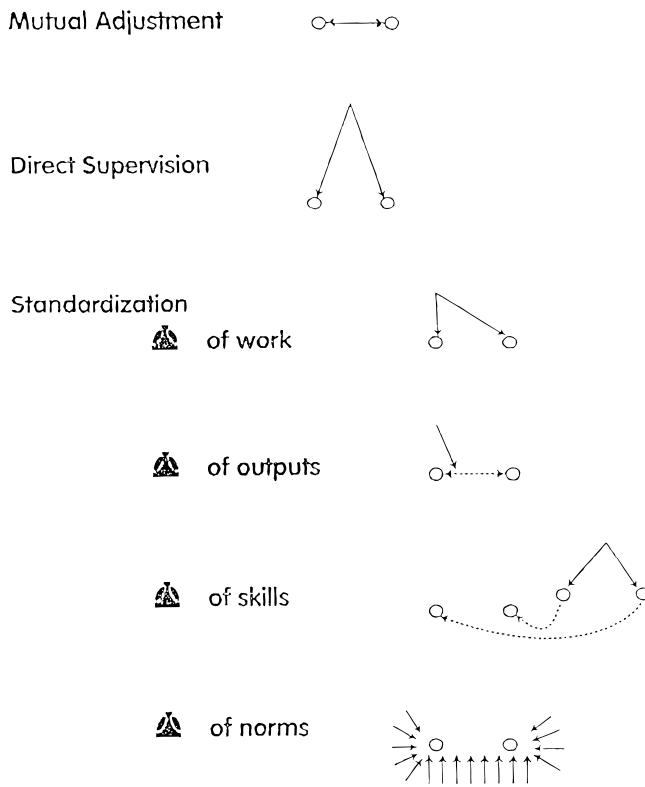
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This article is based on a variety of small research interventions. These include: the observation of a range of health system managers from the chief executive of the National Health Service in England to practicing clinical directors; visits to a wide variety of health system sites; and a series of seminars over several years conducted with the support of the King Edward’s Hospital Fund for London. Our deep appreciation goes to the many thoughtful people in the English system, including those of the King’s Fund, who participated in these experiences. We do not have the space to acknowledge all the individuals and groups who have contributed to this work, but we wish to mention the following who have been especially helpful: C. Karel Musch and his group in the Netherlands, Richard Higgins, Richard James, Anton Obholzer and members of the TMP Learning Set in the UK, Charles McDougall, Stephen Herbert, Harold Frank in Canada, and Jo Ivey Boufford in the United States.

FIGURE 1



Coordination can also be achieved by four forms of *standardization*:

1. When *work* itself is standardized, procedures are specified, usually by work-study analysis (as in the job instructions for assembly work in an automobile factory); coordination thus takes place in the design of the work.
2. When *outputs* are standardized, the results or consequences of the work are standardized, thus focusing coordination at the interface of different activities (as in a worker instructed to produce so many products in a day or a manager held responsible for a certain level of financial performance).
3. When *skills and knowledge* are standardized, different people are trained to know what to expect of each other; they can, therefore, coordinate in almost automatic fashion (as generally happens

between a surgeon and an anesthetist in an operating room).

4. When *norms* are standardized, socialization is used to establish common values and beliefs so that people work toward common expectations (as do monks in religious orders or workers in many Japanese corporations).

Most organizations make some use of all six coordinating mechanisms. But many tend to favor one or another in their operating work, which significantly influences the structure they adopt. We believe that the system of health care and disease cure favors the standardization of skills and knowledge, especially—but not only—in its acute cure clinical operations. Highly trained professionals are engaged and then left rather free to carry out their work. But we shall argue that, pushed to the limit, as is too often the case in this system, this mechanism of coordination fails, and must be supplemented by two others—mutual adjustment and the standardization of norms, in other words, informed communication embedded in a strong culture. This, in our opinion, is where the needed integration will be found. Let us consider more carefully these various mechanisms of coordination.

COORDINATION BY SPECIALIZATION

Professional work in the health system is not about open-ended problem solving so much as about closed-ended *pigeonholing*—slotting the conditions of the client into one or more of the available procedures of the provider. Thus, one well-known vascular surgeon wrote about surgical training to evoke “an automatic reflex,” so automatic, in fact, that he kept a series of surgical “cookbooks.” There he listed, even for complex operations, the essential steps as chains of 30 to 40 symbols on a single sheet of paper, to “be reviewed mentally in sixty to 120 seconds at some time during the day proceeding the operation.”² (pp.1179,1182)

Coordination by the standardization of skills and knowledge is the source of the great strength of the system of health care and disease cure as well as of its debilitating weakness. The great strength is the ease by which work gets coordinated—as noted above, almost automatically. There is barely any need for discussion in the operating rooms, and a few words scribbled on a piece of paper often suffice to coordinate the work of physicians consulting with each other.

The great weakness is the misuse of this all-too-easy mechanism of coordination: Unfortunately, it becomes habit forming. Physicians may be quick to suspend their standard procedures under crises, but it must also be asked how often these crises arise precisely because standardized procedures were relied upon inappropriately.

To pigeonhole is to impersonalize, in the sense of allowing the category to replace the person ("the heart in Room 5"). Can the necessary information always be captured in a few words on a piece of paper or a short entry in a computer? Similarly, is standardization not simply bureaucratization in its most literal sense? (see Mintzberg¹ (p86); also, for a characterization of hospitals as "professional bureaucracies," see p. 348 ff). This is the model that drives medicine, but it works only when the patient and his or her condition cooperate fully.

Medicine is the most influential component of this system. So the approach it favors gets reflected throughout the system, not only in nursing and physiotherapy, and so forth, that seek ever more "professional" status, and thereby into community care, but also at all levels of management. In other words, activities are pigeonholed into pat categories and then assumed to be coordinated by virtue of what everyone is supposed to know about the work of everyone else (for example, what hospital presidents are presumed to know about directors of medical and nursing services). Even to the extent that these pigeonholes work in medicine—which is becoming less true—they work less well beyond medicine, and so this assumption leads to all kinds of duplications, misunderstandings, and mistakes.

Here, then, lies the heart of the issues addressed in this article. *The problems of coordinating the services of disease cure and health care can overwhelm the favored method of coordination, namely rather standardized exchanges based on what are assumed to be identifiable and isolatable spheres of expertise.* This rather automatic means of coordination—that if everyone does as expected, the system will work smoothly—too often fails because problems arise that cannot be predicted. This claim may seem like a simplification on our part, but we maintain that the simplification is in the way the system tends to organize itself at least as much as in our depiction of these processes.

COORDINATION BY MANAGEMENT

Five coordinating mechanisms remain. Three are intrinsically managerial, in that they depend on the

hierarchy of authority, and in turn reinforce it. We believe that, for the most part, they apply barely to health care and disease cure: only in limited spheres or else only with the utmost of nuance.

The most obvious of these mechanisms is direct supervision. Few people today picture hospital managers issuing direct orders to the clinicians. But direct supervision is no less present, even if in more circumscribed forms. It takes the form, for example, of "putting someone in charge" of a problem, someone disconnected from actually doing the work—a unit manager, a case manager, a program manager, whatever. A new box on the organigram. With this come paper solutions: perpetual reorganizations, strategic planning as a wish list, grand studies with big reports. Somehow it is assumed that shuffling words and boxes on pieces of paper will solve the problems driven by technology and professional specialization.³

The other two coordinating mechanisms embedded in hierarchy are the standardization of outputs and of work. The former has become a virtual obsession in the health system—in some ways, perhaps, its own disease. Specific technologies come and go, but the basic principle remains measure and control. Currently we have "evidence-based medicine," a lovely label for a Pandora's box. (Recall our story of the liver transplant surgeon in Part I.) If the institutions fail to impose performance measurements, then the governments, or else the insurance companies are close behind. As for the standardization of work, although there are no time-study analysts standing over surgeons, there has been an increasing tendency of late to promote detailed policy manuals for telling professionals how to use care maps and other standardized work processes. Anything to control costs. But that is precisely the problem. Costs are more easily specified than benefits. So analysts race around cutting the costs with no *measurable* effect on the benefits. Efficiency thus becomes confused with economy, and performance deteriorates.⁴

Work becomes professional precisely because it requires nuanced judgment. It cannot, therefore, be controlled technocratically. This means that the managers of the health system will have to distance themselves from a century of management thought as well as from the current kaleidoscope of trendy technique. Instead, they will have to oversee a system that relies for enhanced integration on our two remaining mechanisms of coordination.

OPENING UP COMMUNICATION

Mutual adjustment means flexible communication among peers, so that the unexpected can be dealt with adaptively and collaboratively. This is about informal meetings in the halls, about networking in general and championing in particular, also about quasiformal arrangements such as teams, task forces, and other work groups.

Here coordination is effected beyond hierarchy. Adult human beings self-organize: they work things out for themselves. Indeed, this is how the system now operates at its best. We may be mesmerized by all that technocratic management, all those fancy measurements and control techniques. But when the really difficult coordination does take place, whether the solving of complex administrative problems or the delivery of some of the most sophisticated disease cures, it happens by mutual adjustment: Responsible people respond to each other's needs and ideas.

ENHANCING CULTURE

The most powerful way to enhance mutual adjustment is to strengthen the standardization of norms. Standardizing norms means promoting a common system of beliefs—a common culture—whereby externalized controls can be replaced by internalized attitudes. When people share beliefs and values, they can coordinate their efforts; they just know what they have to do.

Of course, the health system hardly lacks for strong cultures. What it lacks is a single strong culture. Aside from all its specialized cultures, the system needs cooperative culture—clinical, institutional, and systemwide identifications. Clinical operations need to be viewed as networks of cooperating specialists, not as chimneys of disassociated expertise. And attitudes of understanding, mutual respect, and trust have to spread across community care and into administration. For the simple fact is that human systems cannot

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function effectively without a significant degree of goodwill cooperation.

In a system so often characterized by something closer to cold war than warm peace, this may seem like a curious set of attitudes to promote. But anyone who considers them too soft and lofty might wish to consider how the Japanese have used them to outperform so much of western business. If the system of health care and disease cure is to be brought under control—and that means more than just cutting costs—then this is where a great deal of that will have to happen.

LEVERAGING BEST PRACTICE

We do not present these two mechanisms of coordination as great revelations for health care and disease cure. They are present in the system, and always have been. Indeed, what has likely kept this system together so far are the shared norms of the providers: the plain, old-fashioned altruism of concerned physicians, committed nurses, and dedicated managers, among others. And what has likely maintained the adaptiveness of the system has been significant mutual adjustment; whether to deal with unexpected complications in a patient or unanticipated pressures on an administration. The problem is that the forces of specialization, of managerialism, and of fiscal restraint have put both these mechanisms under increasing attack to the detriment of overall performance. These trends have to be reversed by leveraging the best of behaviors still present in the system.

COORDINATION AND COLLABORATION TIMES TWO

The problems of this system cannot be solved in any one of the quadrants of care, cure, control, and community, nor in all four of them working separately. These are systemic problems, which will have to be solved systemically. We identify two main sets of “management” problems here—one of coordination and one of collaboration, each found within the institutions as well as at the systems level:

1. First is the management of the *service*—the direct delivery of cure and care. The essential problem here is one of *coordination*, and it manifests itself most obviously in the question of who coordinates the delivery of service to the hospital patient and how. Astonishingly, there is no established

answer, even about whom. A less obvious but perhaps ultimately more significant manifestation of the problem is how to get the whole range of community and institutional services to function in a coherent way. There is a remarkable lack of coordinated order in the immense variety of services facing the user.

2. Second is the overall management of the *institution* as well as the whole *system*. Who or what really manages each and how? Because we have hardly addressed the how, we may be misguided about the who. The obvious answer in one case—the managers of the hospital—may be the wrong answer. And the obvious question in the other case—whether to rely on state controls or open markets—may be the wrong answer. And the obvious question in the other case—whether to rely on state controls or open markets—may be the wrong question. The essential issue here is one of *collaboration*: how to draw the four worlds together, into collaborative working relationships, both within the institutions and in the system at large.

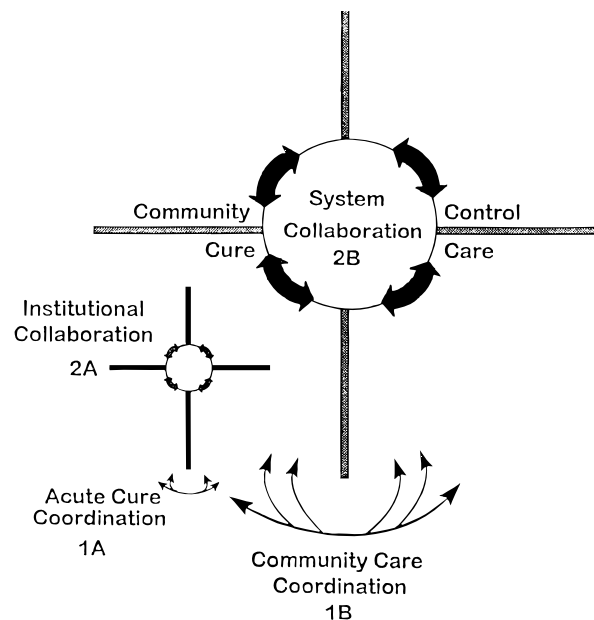
We label these problems of coordination and collaboration, although both are, of course, problems of *cooperation*—of attitude. Figure 2 illustrates them in terms of our framework, the first by multiheaded arrows to designate coordination, the second by circles to indicate that collaboration has to occur where the four worlds meet.

Our intention in what follows is not to propose definitive solutions to these complex problems. That could hardly be done in a few pages, let alone by two people. Such solutions have to emerge from a great many efforts and experiments spanning a wide range of activities, carried out cooperatively by the large numbers of people who live them every day. What we can do here is reframe these issues, so that they can be seen, and therefore addressed, in a new way. The following is therefore meant to stimulate new lines of thinking in order to encourage new means of acting.

1A. COORDINATING THE ACUTE CLINICAL OPERATIONS: BENEATH THE CONCRETE FLOOR

If better informal communication, reinforced by stronger culture, holds the key to more effective coordination of clinical operations in hospitals, then where can that solution be found? We have little doubt about the answer: in the clinical operations themselves.

FIGURE 2



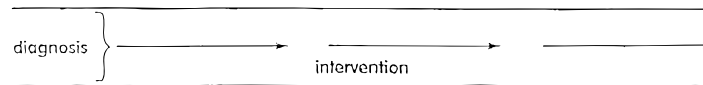
Everything points to one central fact: Clinical activities cannot be coordinated by managerial interventions—not by outside bosses or coordinators, not by administrative systems, not by discussions of “quality” disconnected from the delivery of it, not by all that constant reorganizing. All of this happens, in a sense, above a concrete floor, through which such efforts do not penetrate. *Management of clinical operations will have to be effected by the managed, not by the managers.*⁵

Toward a Web Model

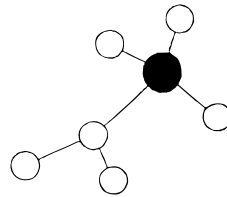
Recent research by Lamothe⁶ uncovered three different models of clinical operations in a teaching hospital, illustrated in Figure 3. Of the activities studied, cataract surgery stood at one extreme: highly programmed, tightly controlled (for example, accepting no patients with other complications), and executed by a fixed sequence of activities that require little mutual adjustment. We call this the *chain* model, the classic case of professional pigeonholing. At the other extreme stood geriatrics, where cases tends to be so complicated that mutual adjustment is unavoidable. Teams function across the professions, taking the

FIGURE 3

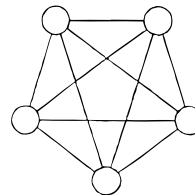
Model 1: Programmed Chain (e.g. Cataract Surgery)
 coordination by set design



Model 2: Consultative Hub (e.g. Rheumatology)
 coordination by established category



Model 3: Problem-solving Web (e.g. Geriatrics)
 coordination by open discussion



form of a *web* to share their information easily. In between was rheumatology: more variable than cataract surgery but nonetheless still largely dependent on the standardization of skills for coordination. Here the physician-in-charge stands at the center of a *hub* of specialists, consulting them for the testing and treatment of patients as necessary, with communication between them effected largely by those few words scribbled on pieces of paper.

Particularly interesting about these findings is that, while the image of medicine seems to remain with the chain-type interventions, needs—especially in cutting-edge work, such as organ transplantation—are shifting toward the web relationship, with its greater capacity for adaptation, customization, cooperation, and self-organization. It follows that geriatrics may be a more appropriate model for the evolving practice of medicine than, say, most surgery.

Collective Coordination

Two common answers have generally been offered to the question of who should coordinate the delivery of clinical activity. One is the attending physician. But in common absence of that person, the other answer—*de facto*—is no one. The nurses, who are present, cannot substitute for the physicians, who have authority. And nonclinical managers get nowhere. So patients repeat their histories time and time again; information fails to get recorded on the charts, or else fails to be read once recorded there; and all too often, different specialists work at cross-purposes.

The aspects of the web model become interesting here. First, it works only if the physician really does “attend.” Compared with most hospital physicians, geriatricians spend considerable time in the operations and on the floor. Mutual adjustment simply cannot

take place on the run, through a few words written on paper or shouted down a corridor. Much of the current practice of medicine is too episodic, too disjointed, and too discontinuous for the web model. Serious consideration should thus be given to how hospital physicians divide their time as well as to how they relate to other members of what should be a team. Perhaps it is time that these “down and out” physicians be brought in.

Second, the role of the geriatrician may be central, but, in a sense, the web puts everyone in charge. (Thus, the chief of geriatrics at one of Montreal’s teaching hospitals likes to boast that his best diagnostician is a physiotherapist.) Perhaps this violates our western notions of individual responsibility. But when a culture is strong, people are prepared to take individual action for the collective need.

Clearly the problem of coordinating acute clinical operations will not be easily solved. But just as clearly, no real progress will be made until we break out of our conventional frames. Teaching hospitals in particular are characterized by their propensity to embrace technological change. But when it comes to their working relationships, nothing ever seems to change. Isn’t it time the teaching hospital engaged in some *organizational* learning?

1B. COORDINATING THE RANGE OF COMMUNITY SERVICES: ACROSS THE SPECIALIZED CURTAINS

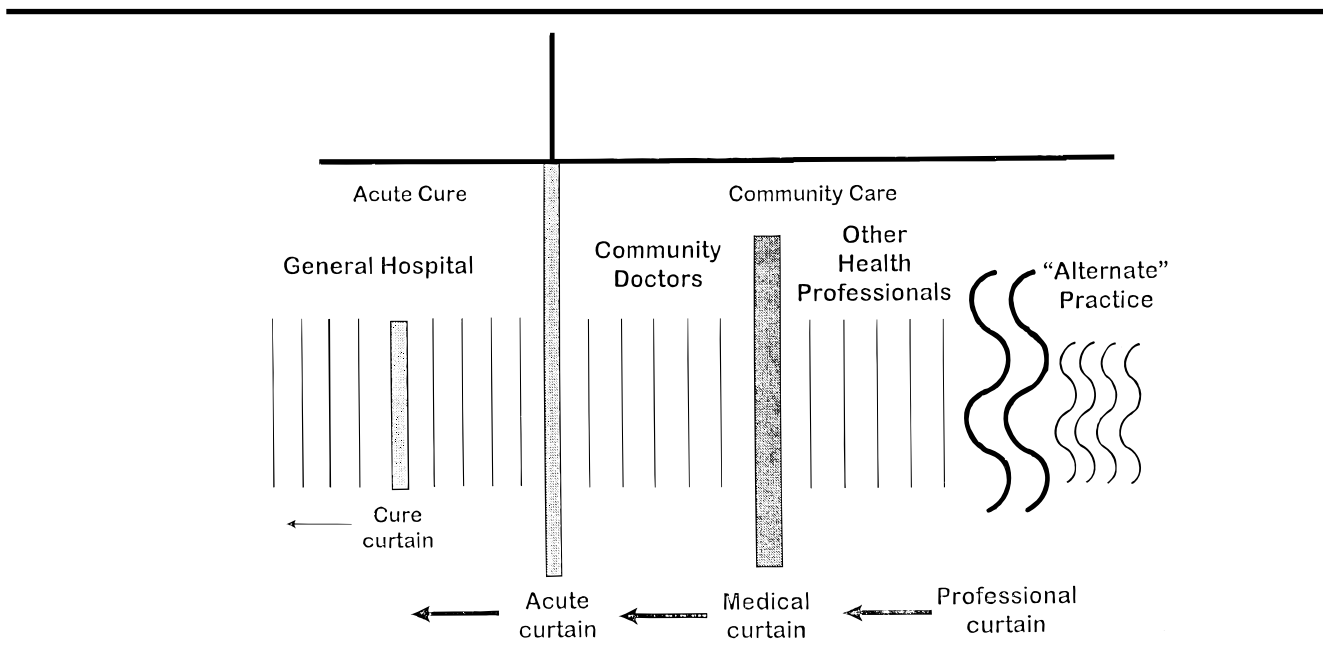
If physicians dominate acute cure hospitals, then acute hospitals dominate the whole system called health care. Rather than describing the entire system as being out of control, perhaps we should conclude that, by virtue of their funding, the hospitals throw the rest of the system out of control. In this section, we address the issue of achieving better balance, especially in that quadrant of activity called community care.

The Specialized Curtains

Just as women face glass ceilings in the world of corporations—horizontal barriers to vertical mobility—practitioners in the world of health care and disease cure face opaque curtains—vertical barriers to horizontal coordination. Here, in other words, the hierarchy lies flat, reflecting status rather than authority.

Figure 4 arrays the various practitioners of the system along their vertical “silos,” with the “hardest,” most interventionist, and therefore highest status practices to the left, and the “softest,” most craft-style

FIGURE 4



practices to the right. Between them are shown three major curtains (as well as a number of minor ones that separate the specialists of each group). The *acute curtain* hangs between the delivery of acute cure in the hospitals and that of health care in the community. (Within the hospitals is also shown the *cure curtain* between cure and care, namely between medicine and nursing.) To its right, the *medical curtain* hangs between the physicians in the community (including specialists and general practitioners) and the other health care providers. This could also be called the *scientific curtain*, since so much of what is deemed scientific falls to its left. That makes this curtain rather more opaque than the acute curtain. Finally, to the right again hangs the *professional curtain*, which separates formally certified members of practicing professions (nurses, dietitians, physiotherapists, psychologists, etc.) from so-called “alternate” practitioners (depending on the jurisdiction, possibly chiropractors, naturopaths, acupuncturists, etc.). This obviously, is the most formidable barrier of them all—the most opaque of all the curtains.

Organizing Health Care

Note that everyone in this system tends to look left. For example, community physicians turn for advice to their higher-status colleagues in hospitals, rather than to other professionals in community care let alone to alternative practitioners.

In part I, we identified clinical practice as incursion, ingestion, manipulation, and mediation. We pointed out that medicine exhibits a strong bias toward the first two, systematically eschewing, for example, manipulative forms of intervention. Physicians thus appear more prepared to experiment with gold injections for arthritis or all sorts of strange surgical procedures on back disks than to study carefully the long experiences of chiropractors and naturopaths with such problems. The same conclusion could be drawn even about the milder forms of incursion and ingestion, such as acupuncture. By always favoring the most radical forms of interventionist cure, medicine puts the health system out of balance.

We are not questioning the efficacy of medicine here. Its advances have been outstanding, and will continue to be so. But these advances have been concentrated on one side of what is a rich and varied spectrum of approaches to the problems of human health. Hence we mean to question the role of medicine as the sole gatekeeper of legitimacy across this entire spectrum, its designation as *the* controller of ac-

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ceptable practice. By so favoring “science,” although much of its “research” is better labeled “development,” the *practice* of medicine has had a debilitating effect on other softer, yet often highly effective practices, both inside and outside its own sphere. This applies most obviously to the allocation of resources for operating practices. But even in research, for example, it is medicine that largely sets the agenda and designs the tests, so that alternate practices rarely even get tested. And, of course, whatever does not get tested remains “alternate.”

Medicine is not health care; it is about a rather specialized approach to disease cure. Health care itself can, in fact, be significantly about disease cure: Proper care can often prevent the eventual need for cure, or can improve its efficiency when necessary. It has been claimed, for example, that the greatest health advance of all time was simply cleaning up the water supply. What equivalent advance currently awaits the support now bestowed on rather arcane forms of medicine? Indeed, while some care is cure, some cure might be better provided as care. Childbirth—hardly a disease—can be an all-too-glaring example.

The standard argument here is that medicine must broaden its perspective to better appreciate practices unlike most of its own. This is largely futile. Indeed we argue that medicine should be recognized for what it has increasingly become—a practice focused on deep incursion and concentrated ingestion through the application of the most sophisticated techniques available—so that other acceptable practices can take their rightful place alongside it. In some cases, they must be allowed to complement what medicine does in a limited way. In some others, they must be allowed to replace what medicine does badly, or barely. Hence, in this case we wish to strengthen a form of differentiation—between the acute cure of medicine and the milder cure and care of other practices. As

medical specialization itself has taught us, there is strength in balance.

This suggests two steps. The first is more careful licensing of much alternate practice: equivalent to medicine, but beyond its reach. This would provide regulation and accountability independent of medicine. The second, of critical importance, concerns organization. We find untenable the current situation, in which a systematically trained, highly organized, and powerfully connected community on one side lines up against a disparate collection of alternate practices on the other. Ideally, there could be established a truly organized "Community of Health Care," at least among some of the more established specialties, that could begin to approach the status of medicine in structure, coherence, stature, and influence.

Lest this recommendation be seen as fanciful, we wish to point out that a limited but perfect precedent for it already exists, in which a nonmedical yet carefully certified and widely accepted profession gives rather well-balanced attention to preventive care alongside interventionist cure. We are speaking here of dentistry, which has acknowledged responsibility for our teeth. Do not other parts of our body deserve such consideration?

Coordinating Across Community Care

Community care is vast and varied, a complex and perpetually shifting network of all sorts of professions, practices, partnerships, and institutions that interact with each other every which way. Organizing some of its practices into a set of specialties, like medicine, is one thing; achieving coordination among all of this is quite another. Acute cure provides little help as a model here.

The community care network is largely self-organizing, free of much imposed control or central coordination. Indeed it is perhaps more so than its own managers sometimes realize. For example, one of us attended the inauguration of a ministry-led "networking" exercise where all the players (except for the ministry officials) were already connected to each other. "We *are* networked!" they protested, fearing that the government wanted to control and bureaucratize what was a well-functioning informal network.

Given the complexity of the whole network, self-organization will likely remain predominant. Here, too, management will have to be effected by the managed. But this cannot be used to deny the importance of li-

ensing, of regulatory oversight, or of the use of information technology, for example to cross check pharmaceutical prescriptions for possible interactive effects. Information technology, especially, will undoubtedly grow in importance and so impose various kinds of central coordination.

Moreover, there are obvious gaps where greater coordination may have to be imposed, sometimes in the form of special liaison roles. One good example is the *crossreach* arrangement, whereby one institution places one of its people inside another for purposes of coordination on site. Teams and task forces across institutions are likewise gaining in popularity, as are more permanent partnerships and joint ventures.

But these arrangements are all institutional. When it comes to the individual, for example the new user traumatized by illness and faced with a plethora of available services, there may be need for new arrangements. General practitioners have traditionally connected the patient to the system, but now they tend to play this role less often, or less well. Moreover, as noted earlier, they have always tended to do so in a way that is biased against nonmedical practices. It may be that new players will have to emerge, much as the midwife acts on behalf of pregnant women (or, for that matter, the building contractor on behalf of the builder), to help people maneuver through the complexity of the service network. In Britain, for example, some community nurses now play this role. Once again, therefore, our suggestions amount to recognizing and building upon some of the constructive, although not sufficiently recognized, tendencies that have already begun to develop in the system.

To conclude this discussion, acupuncture has been described as working by redirecting the energy flows in the body. This may serve as a metaphor to help us to think about redirecting the energy flows in the health system. We need better balance and stronger coordination among the parts. We simply have to find the critical points in the system and then insert the needles with great care—which means that we shall have to open our minds to alternative practices of management.

2A. COLLABORATIVE MANAGEMENT OF THE INSTITUTIONS: OVER THE DEPARTMENTAL WALLS

Here we turn to the issue of the collaborative management of the institutions. We address the general hospital in particular but these comments can be adapted to any institution in the system.

Manage What?

The hospital operations cannot be managed outside of themselves. Conventional management practiced above that concrete floor simply does not work. What then does? We see three main roles for hospital managers:

1. First, managers have to *facilitate* effective self-management within the clinical operations. This means strengthening the institutional culture and enhancing the use of mutual adjustment. To take a simple example, *architectural* reorganization is likely to be a far more powerful device than *organizational* reorganization—moving people on floors instead of boxes on paper.
2. Second, managers need to manage the *boundary condition* of the organization: they need to manage up and out, to ensure the support for and legitimacy of their institutions.
3. Third, managers have to deal with the *decisions* that concern the entire institution, such as the allocation of funds for equipment purchase. But this too is about facilitation, because the managerial role is not just, or often even, to make decisions so much as to ensure collaborative decision making among the involved but differentiated players.

Let us work our way back up through these three points. A differentiated system cannot achieve integration so long as people beaver away in separate offices and on separate committees. As we have argued, systemic problems have to be solved systemically.

One of us studied a teaching hospital in Montreal. There was a crisis in the emergency department, where the number of available beds fell far short of the demand for them. The issue came up repeatedly, for years, in the Medical Executive Committee, the Nursing Executive Committee, the Management Committee, and the Advisory Committee of the Board. Nothing happened. During one 4-month period, while the Medical Executive Committee discussed this issue almost every week, the only committee truly representative of all four quadrants—called the Joint Conference Committee—never met at all! Eventually, the government threatened to cut funding if the problem was not solved. Immediately, a representative task force was struck, with the assistant head of nursing as chair, and the problem was resolved within weeks.

Here we have a wonderful example of what collaboration can do, also of how an organizational *champion* can promote the common interest, much as

professional champions have always promoted self-interest. But it is also an example of what is missing: if there was more collaborative care in the management of hospitals, there would be much less need for such interventionist cures.

Take the common decision of equipment purchase. Factoring it into the technological responsibilities of the physicians and the fiscal responsibilities of the managers is utterly unrealistic. Demanded by the physicians, bought by the managers, and paid for by the donors has always been a formula for disaster. It has encouraged wide swings between periods of permissive generosity and ones of crude austerity. Decisions such as those have to be made collaboratively and cooperatively. Yet managers themselves are often drawn away from such approaches.

To deal with the boundary condition of their hospitals, managers have to be shrewd, aggressive advocates for their organizations, with all the associated political skills. This tends to alienate community agencies and hardly encourages the skills they need when they turn the other way, into their institutions. Here these managers find themselves facing all kinds of other advocates—medical chiefs, nursing heads, and others—and so they have to be reconcilers, with all the associated human relations skills. Managing advocates is just not the same as *being* an advocate!

This amounts to a requirement for a yang and yin of management, which corresponds to cure and care in clinical practice itself: one more masculine and interventionist, the other more feminine and integrative. Medicine and nursing can be models of management too!⁷ And so the question arises as to whether one “chief executive” can do both jobs. And if not, do we risk the cleavage between managing up and managing down? Not if management becomes a collective, collaborative effort.

Managing How?

What does it mean to practice a collaborative style of management? Let us explain by contrasting it with two other styles.

Perhaps the oldest approach to managing—in hospitals and out—can be referred to as the *boss style*, exemplified by Nurse Ratched in “One Flew Over the Cuckoo’s Nest.” This is the manager who knows and controls everything.

In recent years, this has been replaced by a *professional style* of managing. Here we have the manager who has learned everything—at last about management, and at

least in a classroom (M.B.A., M.H.A.). The trouble is that the professional model—based on the standardization of skills and knowledge—hardly applies to management, where nothing can really be standardized and barely anything of significance has been codified with reliability. Control here thus risks becoming “remote control,” as the manager sits in an office and reads performance reports, disconnected from a practice he or she never experienced. “Empowerment” is a big word for these managers, but at the first sign of trouble, it becomes encroachment, as a manager who does not understand what is going on has no choice but to intervene. So back we go to the old boss-style. But this boss is ill informed.

The management we are promoting here might be called the *craft style*. One of us described it in another paper⁷ about a head nurse who spent her time on the floor she knew well. Craft managing is more about inspiring than empowering, convincing than controlling, facilitating what might be than deciding what should be. Here bridge building encourages mutual adjustment, and culture building encourages identification with collective need. It is not motivation that we need in our health institutions; we need to stop the destruction of intrinsic motivation. Responsible people in medicine and nursing, and so forth, hardly need to be empowered by managers. They need to be supported and encouraged by a leadership that understands their work, so that it knows when it has no choice but to intervene, perhaps when games are being played, and how the conventional tools of management can be used subtly and with nuance—if at all.

Who Manages?

What is amazing today is not just that hospitals get managed at all but that anyone is willing to do so. Running even the most complicated corporation must sometimes seem like child’s play compared to trying to manage almost any hospital.

The question of who should manage all this—physicians, professional managers, nurses—has long

been a burning one. It may well be the wrong question. It has resulted in the zigs and zags of power discussed in Part I. In our opinion, single-faced solutions are bound to fail because they lodge themselves in one quadrant or another, whereas the quadrants are the very problem.

We have already expressed our opinion about so-called professional managers. Management is not a profession and never has been; pretending it is only trivializes its practice.

Physicians may thus seem to be obvious candidates for the management of hospitals—they have the experience, the expertise, the influence. But their training can also work against them. For one thing, there is a lot more to hospitals than medicine. For another, medicine is about interventionist cure, whereas we have argued in favor of management as continuous care. And medicine is highly specialized, whereas management is about integration. Finally, physicians are trained to take decisions individually and decisively, whereas managers have to ponder ambiguous issues collectively. “Who opens?” reads a cartoon showing several surgeons standing around a patient. In management, that is a real question!

Well then, how about the nurses? They have the experience and they are used to working collaboratively, in continuous care. In a sense, nursing *is* management, indeed quintessentially hospital management: having to coordinate the activities of many people over whom one has little authority. But another question arises: Will the physicians accept the leadership of nurses?

Having raised doubts about all the obvious candidates, we propose a rather simple solution: *Hospitals and the health system in general need leaders, they do not need categories.* They do not need specialists representing any one world, but rather *individuals* who can bridge these worlds to help others work collaboratively. Put differently, it is not the face that matters but the look on the face. Thus we have come across hospitals run effectively by, in one case an engineer, in another a prominent physician, and in a third a nurse (referred to as the “top nun”). And the same thinking can be applied to other managerial positions in the hospital. For example, clinical chiefs should be chosen not because they are research stars—too many of these turn out to be managerial black holes—but because they have the style and the energy to get the best out of other people.

Professionals sometimes like to describe their organizations as upside down, with themselves on the top

Craft managing is more about inspiring than empowering, convincing than controlling, facilitating what might be than deciding what should be.

and the managers on the bottom, to serve them. This is no less silly than the conventional view. “Top” and “bottom” is a metaphor. It distorts the fact that everyone is there to serve the patients. This happens best when people cooperate in a culture of mutual respect.

2B. COLLABORATIVE MANAGEMENT OF THE ENTIRE SYSTEM: THROUGH THE GLASS CEILING

Here we come to the diciest problem of all: how to manage the entire system of health care and disease cure. Or else: Should it be managed at all? No nation today seems to have a reasonable answer, let alone any idea of who should provide it.

Beyond Markets and Hierarchies

People in health care and disease cure experience the goings on at the system level, whether by government ministries or insurance companies, through a glass ceiling. To help us break through this, we must shatter the most intransigent frame of all: that all of this will be resolved in the great debate between the *hierarchies* of state control and the *markets* of so-called “free” enterprise.

We reject this all-consuming ideological dichotomy for one simple reason: hierarchies are too crude and markets are too crass to deal with the complexities of health care and disease cure. In our opinion, the solutions will have to be found in the collaborative relationships and other institutional arrangements that lie between, and beyond, markets and hierarchies.

The National Health Service of England has long been obsessively hierarchical: a ministry sat upon regions that (earlier) sat upon areas that sat upon districts that sat upon units. Much of this has now been dismantled, with many of the units (particularly hospitals) having become independent “trusts,” labeled “providers,” to differentiate them from “purchasers.” This was Margaret Thatcher’s way of introducing markets where she could not. Meanwhile, in Canada, the hospitals—long “trusts” in the current British parlance—are being reined in by the new regions that have been stacked upon them in most of the provinces. Shouldn’t the fact that each country is trying to solve *the very same problem* by doing precisely what the other is rejecting be telling us something? And all of this, of course, has happened while the American system, which maintains its obsession with

markets, was spiraling increasingly out of social control. (One curious thing about these “markets” is that because of their propensity to promote mergers, for example among hospitals, the institutions end up being obsessively hierarchical!)

We made the case for the crudeness of hierarchies in our introduction to Part II of this article, as well as with our metaphor of the ax in Part I. Health care and disease cure are complex, nuanced services. Hierarchies do not solve, so much as cap, the problems of cost control and coordination. And the higher one goes in these hierarchies, the more detached, and so often the sillier, become the interventions. Hence we find the many useless hospital reorganizations that get mirrored by even more useless state reorganizations. Meanwhile the clinicians stagger on while the cadre of managers grows.

Markets separate sellers of like products from each other by the dictate of competition, so that each is encouraged to work independently, even at cross-purposes, for example, by restricting the flow of information. (State hierarchies can have much of the same effect by forcing organizations to vie with each other for resources.) But, this system is about health care, not cornflakes; it needs easy cooperation, not hard competition.

Markets also separate buyers from sellers, setting them at arm’s length so that products and services can be bartered for money. This may be wonderful when distributing bread, but it can be awful for a nuanced service of life and death, where the seller knows a great deal more than does the buyer. There is simply too much room for manipulation, and too little hope for regulation to stop it.

Of course, where the governments don’t act, notably in the United States, then the insurance companies do. They take up the torch of measurement, which is fully compatible with market control (although hardly unknown to the hierarchies of government). The trouble with this is that everything becomes even more categorical. The physicians, for example, are driven deeper into their own pigeon-holes, on which the measurements are based, which further discourages the needed coordination. Moreover, as we noted in our introduction to Part II, services are professional because they cannot easily be measured. So the insurance companies, like the government agencies, end up cutting measurable costs at the expense of nonmeasurable benefits, so to speak. What does “quality” mean in an office while the sirens of human tragedy wail below?

Put most simply, we can trust our systems of health care and disease cure to neither markets nor hierarchies. Both have a role to play, but excessive dependence on either—or the two together—is destructive. And this, we maintain, is exactly what has been happening for decades. To return to the opening question that framed this two-part series, it is a misplaced emphasis on markets and hierarchies that explains to us why the comprehensible elements of health care and disease cure became so convoluted when embedded in the social system. Once we enter the exclusive worlds of control and/or competition, whether institutional or societal, the problems of coordination magnify. And so the whole system spins out of control.

What is the alternative? Our preference has appeared throughout this discussion: a different way to think about management, based on a different approach to coordination, reflected in a different concept of organization. Below we outline some of the components of such an alternative, repeating our qualification that we do this, not to propose any definitive solutions, but to open perspectives whereby such solutions may be found.

1. Social Ownership

Our case against markets and hierarchies in the health system amounts to an argument against both the narrowness of private ownership and the excessiveness of public ownership. We need to emphasize forms of ownership that promote trust and goodwill, and that allow problems to be addressed where they occur. There are certainly pockets where private ownership works fine (as perhaps in certain laboratory services), and others where there would perhaps be no service without public ownership (as, perhaps, in certain services for the poor). But two other forms of ownership often seem preferable here.⁸ One is *cooperative* ownership, as in the church-run hospital or the medical clinic owned by its practicing physicians. And the other is *nonownership*, namely not-for-profit organizations controlled by self-perpetuating boards of directors, as is common in many of the American and Canadian hospitals and universities. Both forms of ownership tend to be inherently engaging: People have the sense of working for some broader yet tangible good, beyond the profits of disconnected shareholders or the controls of distant bureaucrats. They thus tend to become more deeply and personally involved with the services they themselves give or receive.

2. Appropriate Scale

Above all, this is a system of people. It uses a dazzling array of technologies, yet, as noted earlier, in few other places is this so concentrated in the hands of single individuals. Motivation, commitment, and sense of belonging and purpose must therefore become key attributes of the system. Personal identification depends on the scale of the institution. Economies of scale may apply to manufacturing facilities; in the health system, they can be positively dysfunctional. For example, what does it mean to merge two hospitals on paper (rather than physically), other than to enhance the power of management? And what government agency or insurance company is predisposed to forcing the closure of one big and well-connected hospital when it can close several less politically influential smaller ones instead? When costs can be measured so much more easily than benefits, do so-called economies of scale simply play into political pressures?

Small is not necessarily more beautiful, but it is usually more personal. And it enables wise judgment to take the place of impersonal numbers in the assessment of performance. Trust begins with being able to trust our own instincts.

Similarly, if there are benefits to small institutions, then there may also be benefits to small jurisdictions. For example, in Canada, because both happen to have provincial status, Ontario runs one health system for 11 1/4 million people and Prince Edward Island runs another for 137,000—and significantly cheaper on a per capita basis. (Figures for 1995 put the respective costs at \$1,223 for Prince Edward Island and \$1,565 for Ontario.⁹) There may be all kinds of reasons for this, but economies of scale is certainly not one of them! We would do well to give more attention to human scale everywhere in this system.

3. Involved Leadership

We draw the same conclusions about leadership here that we did for institutions earlier: The more involved, the more knowledgeable, and the more tangibly experienced the leaders, the better the leadership will be. The greatest source of leadership at the systems level—in advice if not in management itself—may well be the worst. Economics has no roots in clinical activity of any kind; short of the caricature of the trading floor; economists, unlike, say, psychologists or anthropologists, have nowhere to go to observe their favored behavior. So this has become a

discipline based not on field experience but on quantitative aggregation. But here, as we have stressed repeatedly, the performance numbers are most suspect.

So as the economists have taken over the system, much as the professional managers have taken over the institutions, we see the same set of destructive consequences. Health care and disease cure are not about detached statistics and market ideologies; they are about caring for and curing individuals. To break through its glass ceilings, the system requires leaders who appreciate this deep in their souls.

4. Collaborative Networks

Network is a currently popular term in the literature of management, and in this case, for good reason. It suggests the linking together of interdependent organizations in all kinds of ways; to foster better communication in order to solve mutual problems. In between the authority of the hierarchy and the competition of the market sits the network of mutual relationships. Indeed, at its best, this is precisely how the general hospital itself works. It is hardly a conventional hierarchy, and surely not a traditional market; rather it is a network of relationships among specialists and their units. Hospitals surely have a long way to go in fostering collaboration. But the overall system has still a longer way to go; attaining the level of the healthy general hospital would be a good start! Responsible institutions can work things out responsibly—if they are so treated in a society that sees collaboration as more important than competition and control.

5. Guiding Principles

Knitting all these elements together must be an inspiring set of beliefs. The ideology of the competitive marketplace no more provides this than does the knee-jerk control of bureaucracy. Both are destructive. Shared beliefs emerge from and reflect social consensus, which stems, not from bargaining and compromise, but from a sense of what an excellent service should be.

Consider the health system in Canada. To paraphrase Winston Churchill, it may be the worst one in the world except for all the alternatives. In the late 1960s, Medicare was introduced by the federal government to be operated by the provinces, based on five principles. Described in about two pages in the Canada Health Act, and administered at the federal level by about two dozen civil servants, these have

served as the guiding beliefs to the present day. They form a simple, yet powerful vision: (a) “public administration” (meaning administration by the provinces on a nonprofit basis), (b) “comprehensiveness” (meaning state provision of a full array of health services), (c) “universality” (meaning service to all residents on uniform terms and conditions), (d) “portability” (meaning that the service carries from one province to another as Canadians move or travel), and (e) “accessibility” (meaning that hospital and physician charges are fully covered by the state, etc.). Unfortunately, these are under intense pressure right now, but perhaps more by the currently trendy forces of competitive markets and the mantra of deficit reduction than by any of their own inadequacies.

CONCLUSION: RECONNECTING CARE, CURE, CONTROL, AND COMMUNITY

“All change seems impossible,” observed the French philosopher Alain, “but once accomplished, it is the state you are no longer in that seems impossible.” The system of health care and disease cure can be changed. Structures reified over a half century ago need no longer cope with the technologies of today.

Management at the institutional and systems levels has to become less opaque, more direct, involved, and natural. There is presently too much managing up, often as an excuse for the frustrations of managing down. Practitioners have to develop greater appreciation of the managerial processes, and managers as well as community representatives have to reflect a deeper understanding of the clinical operations. Care has to be strengthened and brought into better balance with cure, within the acute institutions and especially in the community at large. On the wards, in the hospitals, and across all of society, we need more informed community, more nuanced control, better connected cure, and more fortified care.

REFERENCES

1. Mintzberg, H. *Mintzberg on Management: Inside Our Strange World of Organizations*. New York: Free Press, 1989.
2. Spencer, F.C. “Oeductive Reasoning in the Lifelong Continuing Education of a Cardiovascular Surgeon.” *Archives of Surgery* (1976): 1177, 1182.
3. Glouberman, S. (ed.). *Beyond Restructuring: A Collection of Papers from a King's Fund International Seminar*. London: King's Fund Publishing, 1996.

4. Mintzberg, H. "A Note on that Dirty Word 'Efficiency'." *Interfaces* 12 (1982): 101-05.
 5. Berwick, D.M. "Eleven Worthy Aims For Clinical Leadership of Health Care Reform." *Journal of the American Medical Association* 272 (1994): 797-802.
 6. Lamothe, L. "La Structure Professionnelle Clinique de Facto D'un Hopital de Soins Ultra Specialises." Ph.D. thesis. Montreal: McGill University, Faculty of Management, 1996.
 7. Mintzberg, H. "Managing as Blended Care." *Journal of Nursing Administration* 2, no. 9 (1994): 29-36.
 8. Mintzberg, H. "Managing Government, Governing Management." *Harvard Business Review* (May-June 1996): 75-83.
 9. Statistics Canada. *Public Sector Finance* (68-212), 1995-1996.
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