CASE5

University of Texas Health Center at Tyler

Mark J. Kroll and Godwin Osuagwu

OVERVIEW

This is a decision-oriented case that examines the unique circumstances facing a research and teaching hospital in the University of Texas System. The University of Texas Health Center at Tyler (UTHCT) has a tripartite mission of providing health care services (especially in the area of pulmonary diseases), providing medical education, and conducting research focused on pulmonary diseases. Students will be asked to develop strategies that allow the institution to maintain financial stability in the face of rising demands for indigent care, inadequate state support for such care, and ever tighter pricing demands being made by third-party payors, such as Medicare. At the same time, students will be asked to develop strategies that allow UTHCT to enhance its position as a research center and training facility for physicians and nurses.

UTHCT has grown markedly since its days as a state chest hospital, but it confronts a number of critical challenges. The health center is required to provide a great deal of indigent care to the state's poor, yet it is inadequately funded. In its effort to generate revenues from paying patients, the center must confront competition from two larger health care institutions in the community that aggressively market their services. Finally, UTHCT's efforts to build its research component have been reasonably successful, with its first medical patents being awarded in the past five years; however, the absolute level of research funding has leveled off.

KEY ISSUES

- 1. University research and teaching hospitals have been squeezed by the shortage of funds for universities in general.
- 2. Specialty hospitals are finding it more difficult to survive with the decreasing number of inpatient procedures and patient days.
- 3. Problems associated with developing strategy for a very broad mission providing health services (to a wide market segment), research, and teaching.
- 4. Requirements for the latest in technology to treat patients, research, and teach despite a deteriorating financial situation.
- 5. Fulfilling mission with reduced staff and financial support.

TEACHING OBJECTIVES

- 1. Develop a better understanding of the complex mission of a university-affiliated hospital that typically involves teaching, patient care, and research.
- 2. Appreciate the pressures health care providers are now under to rein in costs and deliver medical care much more efficiently than was the case in the past.
- 3. Understand the complexity of strategic planning for health care organizations given the uncertainties and pricing pressures such institutions now face.
- 4. Develop a greater awareness of the ethical dilemma health care organizations must contend with in determining the appropriate level of indigent care.
- 5. Provide an opportunity to debate the moral and financial issues surrounding the decision to provide or deny care to indigents.

SUGGESTIONS FOR EFFECTIVE TEACHING

If your university includes a hospital, try to obtain information about its funding over the past several years. Provide (or ask students to find) data to document general inflation and medical inflation over the same time period. Has your university hospital "kept up?" What are the implications of underfunding?

Alternatively, we have divided students into three groups that must coordinate their activities. The first group develops a detailed analysis of the evolution of the health care industry/market particularly concentrating on the specialty hospital portion. This group scans the health center's external environment, identifies and extends trends, and profiles the future (next five years) of the health care environment both in Texas and nationally. Internet competitor site of interest: www.etmc.org

The analysis of the first group is forwarded to the second group and presented to the class on the designated presentation day. The second group uses the analysis to develop strategies for UTHCT that will fulfill its mission and respond to the forecasted changes (provided by the first group) in the health care environment.

The written report of the second group, along with that of the first group, should be forwarded to the third (last) group to develop implementation strategies. The coordination and reliance of one group on the work of the others simulates the current work environment.

Each group is required to write a formal report that is passed on to the next group and submitted to the instructor as well as to make an oral presentation on the designated day. This approach requires some coordination on the instructor's part, but it is quite effective. Although the students will work on the case over several weeks, class time need not be used until presentation day.

STRENGTHS/WEAKNESSES AND OPPORTUNITIES/THREATS

A summary of University of Texas Health Center at Tyler's internal strengths and weaknesses and external opportunities and threats is provided below.

Strengths

- 1. The UTHCT has a solid reputation for the treatment of and research on pulmonary diseases.
- 2. The center has successfully negotiated HMO arrangements with some of the area's employers.
- 3. The health center has built a potentially significant occupational health unit.
- 4. Given its role as a teaching and research hospital, in some instances a synergistic relationship can be achieved (e.g., in the area of lung diseases).

Opportunities

- 1. HMO penetration in the region is low.
- 2. A number of smaller rural hospitals are located in the region.
- 3. There is increasing demand by HMOs for primary care physicians.
- 4. Alliances with other major hospitals have reduced the necessity for duplicating facilities and services in some areas.

STRATEGIC ALTERNATIVES

Adaptive Strategies.

- 1. Expansion/market development bring more people for specialized cardiopulmonary disease.
- 2. Expansion/product development primary care education.

Weaknesses

- 1. The center is much smaller and less comprehensive than its two nearby competitors.
- 2. The center suffers from an image of being a "chest hospital" for the indigent.
- 3. The center has had operating deficits due to unreimbursed indigent care and third-party payor cost containment efforts.
- 4. The center has entered the HMO competition late in comparison to its two greatest competitors.
- 5. Its success in securing research grant funding has stagnated in recent years.

Threats

- 1. Continued pressure to reduce prices by both third-party payors and government programs.
- 2. Two larger, more comprehensive and more aggressive hospitals in the area.
- 3. The Texas state legislature may continue to underfund indigent care, or even reduce funding.

- 3. Expansion/penetration more people admitted for a variety of health care problems.
- 4. Maintenance/enhancement improvement of services and funding through research (grant) success.
- 5. Maintenance/status quo fulfill three-part mission despite financial constraints.

QUESTIONS FOR CLASS DISCUSSION

1. In competing for paying customers (those covered by some form of insurance), what advantages and disadvantages does UTHCT have versus its two major competitors?

Unfortunately for UTHCT, it has few material competitive advantages in relation to the two other health care organizations located in Tyler. Perhaps its major advantage lies in the occupational health unit that emerged from its treatment of asbestosis and other industrially related pulmonary diseases. The occupational health unit has been able to sell its services to some of the major employers in the region. It is conceivable that such relationships could open the door for the health center to capture these firms as HMO clients. Unfortunately, most of the major employers already have HMO relationships with one of the other institutions. Another strength (although a weakness as well) is the health center's expertise in dealing with Medicaid patients. If the state or federal government moves toward some form of Medicaid HMO arrangement, the health center may be in a position to capture this business. However, the state or federal government may pay so poorly that such business is undesirable.

With regard to disadvantages, there are many. First of all, UTHCT is a relative newcomer to the market for paying customers in the area. The community and region have grown up with Trinity-Mother Frances and East Texas Medical Center. The community still regards UTHCT as largely a specialized center for the treatment of pulmonary diseases. Second, the other two health care centers offer a comprehensive array of services with specialized units and centers for the treatment of a variety of serious diagnoses. Additionally, over 300 physicians have affiliated with one or the other of UTHCT's two major competitors. Although UTHCT offers services in most areas of specialized care, it has neither the infrastructure, number of affiliated physicians, or experience base that the other two competitors possess. In terms of expanding market share from outside the immediate Tyler area, the other two competitors have the edge because of their networks of affiliated or owned clinics and hospitals scattered throughout the region that feed patients to them. In addition, the two competing centers entered the HMO and PPO markets well before UTHCT and have locked up the bulk of attractive HMO clients in the area. Finally, ETMC offers the emergency medical services for a large portion of the region, feeding patients into its system.

2. Given UTHCT's current resources, what strategies should it pursue to build its patient base?

Given that the health center has little in the way of features or services that allow it to differentiate itself (other than perhaps in the areas of pulmonary diseases and industrial wellness programs), it will likely have to compete on a low cost-low price basis. As HMO and PPO arrangements tend to focus on costs, the health center may have a bit of an advantage. The health center may be in a position to deliver low cost medical services, especially in the primary care area, because of its family practice residency program. As is generally true, the recent medical school graduates who are in the three-year family practice program do not make high salaries. At any given time the health center has eighteen of these doctors who staff the family practice clinic. The clinic provides primary care for its patients. By using the family practice clinic as the primary delivery mechanism for HMO services, the health center could offer some very attractive HMO rates.

The potential problem is that patients and employers would have to be convinced that the care they were receiving was as good as that received from traditional medical providers. This might be somewhat difficult given that every three years patients would have to change their primary care physician as each class of residents graduated and left UTHCT. Convincing patients they are in good hands may be possible by reminding them that the residents work under very experienced MDs who hold professorial rank and are always available for consultation if residents feel they need help with a case.

Further, the health center should consider identifying areas with high concentrations of senior citizens to open satellite clinics that would emphasize geriatric patient care. However, it would be best to locate such clinics away from those already established by Trinity-Mother Frances or ETMC.

Finally, the health center might expand its role as an educational institution. It could do this by adding to its current educational activities by offering approved continuing medical education courses not only for physicians, but also for other paramedical professionals in the region who need continuing education credits.

3. What is the UTHCT's financial condition? Has it been improving or deteriorating in recent years?

The health center's financial condition has been deteriorating for the past several years. As can be seen in Exhibit 5-3, the health center ran a deficit in both fiscal 1994 and 1995. This is in large part because of the decline in UTHCT's volume of hospital services to paying customers. Unfortunately, although patient volume has grown, especially in outpatients (see Exhibit 5-9), collections for these visits have not grown at the same rate. For inpatient services, both in terms of gross revenues and collections, the numbers have declined. In order to reflect the new realities of inpatient versus outpatient services, the health center has significantly cut the number of inpatient beds available (from 199 in 1993 to 123 in 1995). These data, especially the inpatient numbers, point out the critical need for the health center to increase the number of paying patients flowing through the facility or reduce the amount of services it provides the indigent to cut costs. The Health Center may also be able to help itself by doing a better job of capturing all costs associated with inpatient and outpatient services and making sure all costs are submitted for reimbursement. Likewise, there is perhaps a need to more carefully track and document the medically indigent in order to identify "fakes" and charge them accordingly.

4. Should UTHCT attempt to expand its service offerings to match those of the two competing institutions or remain more narrowly focused?

A review of the sizes and specialized units of the health center's two major competitors, Trinity-Mother Frances and East Texas Medical Center, clearly demonstrate that both facilities are much larger and have a number of sophisticated service units that UTHCT does not have. Given that the region already has two large, comprehensive health care facilities that are already integrated into separate networks of regional clinics and smaller feeder hospitals, it is very unlikely the region could support yet another set of such specialized service units. Unfortunately, this puts the health center at a real competitive disadvantage. For instance, although the health center is capable of performing most any kind of coronary procedure, both Trinity-Mother Frances and ETMC boast acclaimed, high volume, state-of-the-art cardiac care institutes. The question for the patient then becomes why (unless compelled by an HMO arrangement) seek care at UTHCT? It appears that the health center suffers from a classic case of first mover advantage, or in this case – last mover disadvantage. Although the market will likely not support a third medical facility the size of Trinity-Mother Frances or ETMC, it will be tough to attract customers to one that is considered to be something less.

The better strategy for the health center may be to pursue cooperative arrangements with the two larger institutions and position itself as essentially a primary care provider with referral options to one of the two larger facilities for more serious cases. In this way potential HMO and PPO clients would be assured that they were giving up nothing by selecting the health center as their provider. Such a strategy would have the obvious downside of relegating UTHCT to something of a second-class status in the community for the foreseeable future. It might also make it difficult to hold high quality medical specialists who were unwilling to accept such a status in the medical community.

A more comprehensive solution would be for all three institutions to form a health care services network to eliminate the current duplication of services and to reduce costs. Each unit could continue to do those things it does well, and leave to another of the institutions those things it did not do as well as the leader in that particular area. For instance, Trinity-Mother Frances has the strongest obstetrics/gynecological unit in the area, yet ETMC recently spent very heavily to catch up, and essentially duplicate Trinity-Mother Frances's capabilities. On the other hand, Trinity-Mother Frances maintains a level II trauma center although ETMC is designated to serve as the region's trauma center. Both institutions maintain helicopter services. If the three facilities could agree to permit each others' specialty areas to be accessed by the other institutions using some form of cost sharing scheme, a great deal of money might be saved through reduced duplication. However, given the intensity of the rivalry, such cooperation may be difficult to achieve.

5. Does the fact that UTHCT has historically focused on pulmonary problems – especially tuberculosis – and operates as a teaching hospital reduce its appeal to paying clients?

Although no market surveys have been done that the authors are aware of, there is little question that the health center has the image in the region as the "chest hospital."

This is especially true among the elderly. First, it is damaging because people consider it a place where those with tuberculosis go - giving it a bit of a "leper colony" image. Second, it leaves potential customers with the impression that the institution is not a truly comprehensive facility and is not able to meet all of their medical needs. This second impression is of course not entirely inaccurate when UTHCT is compared with the two larger health care providers in the area.

Recently, in an attempt to counter this image, the health center initiated informational advertising, attempting to create an image for itself of an institution that has cutting edge technology and expertise. The tag line used in the advertising has been "University of Texas Health Center at Tyler – Bringing You Tomorrow's Medicine Today." Unfortunately, because of its relative size and financial constraints, this effort has not been anything like the advertising campaigns mounted by Trinity-Mother Frances or East Texas Medical Center. The success of UTHCT's promotional work is still unknown; however, there is no compelling evidence that it has taken any market share from the other two institutions.

6. How can UTHCT best capitalize on its strengths in the area of industrial illnesses, especially those related to the pulmonary system?

The Health Center has already developed relationships with a number of the area's larger industrial firms to provide informational and medical services to reduce the risks of job related diseases as well as provide preventative medical care. The health center has established these relationships with employers who have already contracted with one of the two other medical care providers for their employees' health care needs off the job. As a result, it may be difficult for UTHCT to use its occupational medicine unit as a means to attract HMO clients. On the other hand, given that the region does have a number of major manufacturers, refiners, and chemical plants, occupational health may have growth potential. Additionally, the Health Center could market its specialized services in the major metropolitan areas of the state in an attempt to build its occupational health volume. Unlike a number of other specialty areas, the health center has a great deal of credibility in this market niche, especially in the area of pulmonary industrial diseases.

7. If authorized to do so, should UTHCT place even more stringent limits on the indigent care it provides? What should those limits be?

These questions can begin a discussion concerning the financing of health care in this country. As both the states and federal government attempt to reduce the burden on the taxpayer, they have placed unprecedented pressure on health care providers in the United States to assume greater portions of health care costs for the poor. As health care costs have escalated, private insurers have increased premiums thereby reducing the availability of private coverage to the point it is no longer within reach of millions of Americans. Because of its mandate to provide indigent care, the health center has borne more than its fair share from these changes. At some point, health care providers such as UTHCT will no longer be able to deliver high quality care nor bear the costs without putting themselves in grave financial risk. Additionally, given the aging of the U.S. population and the increasing pressures of Medicare and Medicaid, the problems are not likely to improve. The health center has already begun to reign in its indigent services by

reducing the availability of free prescription drugs. The question now is not whether the health center will limit indigent care, but rather by how much? Students will likely be sympathetic with the health center's plight, and some may recommend drastic curtailment of indigent care. Others will feel strongly that poor sick people have a right to health care. The amount of indigent care cannot be so great as to seriously jeopardize the viability of the institution. In all likelihood, state auditors would not permit this to occur even if the health center were to go that far. On the other hand, it would be neither politically possible nor lawful for the health center to refuse all indigent patients. Within these two extremes the administration of the center and the governing board of the UT System must set a dollar amount that the health center can afford to commit to indigent care without hurting its ability to compete for paying patients and carry out the other two components of its mission.

The actual amount will depend on the health center's ability to generate offsetting revenues from paying customers. The more of those dollars that come in, the more indigent care can be delivered. In terms of what the ratio might be, the current volume of indigent care to paying patients is probably a little too high. The fact that the health center has been running deficits for the past two years suggests it is likely at the limit of what it can afford to commit to indigent care given its current volume of paying customers. Until it appreciably expands the paying patient base, it will need to take whatever steps necessary to at least keep indigent care spending from rising. This may be difficult, but it is necessary for the institution's long-term health.

CASE6

Calumet Community Hospital

V. Aline Arnold

OVERVIEW

Calumet Community Hospital has served Randolph County since 1935. The 45bed rural hospital faced intense competition, a declining occupancy rate, and a shortage of physicians. Two physicians, who admit 75 percent of inpatients, are near retirement age. Because of declining revenues from inpatient treatment, management has looked for other sources of revenue. Home health care, an in-house laboratory, and conversion of 14 beds from acute care to substance abuse and alcoholism care have generated additional revenues.

The physical plant is outdated and in need of major remodeling and expansion if the hospital is to compete with other hospitals in the region. A consultants' study recommends remodeling and expansion of selected areas of the hospital. Yet there are no resources to implement the expansion. The hospital administrator and board of directors are considering other options such as affiliation with a larger hospital, converting to outpatient and emergency treatment only, or converting to a day care for senior citizens and nursing home facility. They face tough decisions and are asking, "What should be our future direction?"

KEY ISSUES

- 1. Survival of a small community hospital.
- 2. Dynamics of the environment dictate the need to be flexible, creative, and costconscious.
- 3. Development of defensive strategies.
- 4. General state of rural health care.

TEACHING OBJECTIVES

- 1. To understand the plight of small rural health care providers in today's environment.
- 2. To see the importance of strategic planning and marketing for small, not-forprofit organizations.
- 3. To illustrate how a manager's style determines the extent of strategic planning and marketing.
- 4. To show the complexity in developing feasible strategic alternatives in some difficult circumstances.

SUGGESTIONS FOR EFFECTIVE TEACHING

A good way to start discussion of this case is to ask students, "Will any rural community hospitals exist beyond the year 2005?" In the discussion that follows, research on which hospitals have closed and the characteristics they have in common, followed by the characteristics of the hospitals that are doing well and why they are doing well, should be included. This will present the proper environment for discussion of Calumet. Can Calumet position itself to be one of the survivors?

Most students have a difficult time recommending that an organization, particularly a health care provider, cease operations. This case causes them to have to look at such a disagreeable option. Calumet cannot afford (nor does it appear to be able to finance) any of the alternatives developed by the consultants. The traditional strategies to "grow the organization" seem to be beyond its means. The major issue is survival. Are contraction strategies the only alternative? Creative solutions requiring little funding are needed or significant fund raising is necessary.

The case particularly emphasizes the impact of the external environment, the necessity for strategic planning, utilization of marketing techniques, and the importance of managerial style.

STRENGTHS/WEAKNESS AND OPPORTUNITIES/ THREATS

Strengths

- 1. Dedicated staff.
- 2. All rooms are private.
- 3. Services offered are good quality.
- 4. Well-equipped for its size.
- 5. Only hospital in Calumet.
- 6. Strong administration and leadership.

Opportunities

- 1. Stable economy in the area.
- 2. Aging population is increasing.
- 3. Aging population is less likely to travel for care.
- 4. Underserved market.

- 2. Loss of medical staff.
- 3. Lack of strategic planning.
- 4. Limited public relations/ marketing.

Weaknesses

1. Heavy dependence on two physicians.

- 5. Community image.
- 6. Small size.

Threats

- 1. Increasing competition from larger hospitals that are farther away.
- 2. Number of substance abuse programs are increasing.
- 3. Costs of high tech care.
- 4. Reduction of county tax support.
- 5. Government reimbursement policy changes.

STRATEGIC ALTERNATIVES

- 1. Divestiture.
- 2. Liquidation.
- 3. Retrenchment -- change the mission and become a specialty hospital.
- 4. Market development -- joint venture or alliance (market entry strategy) as a feeder institution for a larger health care provider.

QUESTIONS FOR CLASS DISCUSSION

1. What is your analysis of the external environment for a small rural hospital?

All health care providers are facing the impact of competition, increasing amounts of government regulation, escalating costs for high technology, and changing consumer needs and wants. The external environment of the small rural hospital has all of the complexities of the larger facilities, plus many others that leave small hospitals particularly vulnerable.

The case points out several problem areas for health care in general and small hospitals in particular:

- 1. Competition has intensified in the health care field.
- 2. It is difficult to recruit physicians and other health professionals to rural areas primarily due to lack of cultural amenities in most small towns.
- 3. Population exodus from rural communities.
- 4. Government reimbursement for Medicare patients is lower for rural than for urban hospitals.
- 5. Small hospitals often do not have highly trained administrators with the necessary conceptual skills such as planning.
- 6. Small hospitals lack personnel with marketing skills.
- 7. Small hospitals are not able to achieve the economies of scale found in larger hospitals.
- 8. A small hospital often is the only hospital in town and thus tries to "be all things to all people."
- 2. How important are strategic planning and marketing to a small hospital? To what extent can a small hospital utilize marketing techniques in the planning process?

Historically, hospital administrators believed that they did not have competition if they were the only hospital in town. Today, all hospitals are facing stiff competition, not only from other hospitals, but also from physician providers and other alternative health delivery systems.

Although some marketing activities were carried out in the past (e.g. public relations, newsletters, open houses, and others), marketing per se was considered unethical for health care providers. As a general rule, the marketing concept was not understood and applied systematically in developing health services.

Strategic planning and marketing are critical for survival of the small hospital in today's environment. No longer can the small hospital attempt to provide all health care services for a community. Utilizing the marketing concept, the hospital should first identify what specific health services local consumers need and want.

The small, rural hospital can utilize the basic marketing techniques practiced by a business, with some adaptation as appropriate. For example, the 4 Ps (marketing mix) would be products (various services); price (costs per patient day, charges for medications from the pharmacy, prescribed treatments, and so on); place (distribution of services, e.g. home health care); and promotion (communication with the many publics of the hospital, e.g. physicians, patients, employees/staff, volunteers, the general public).

The hospital uses the concept of market segmentation as it recognizes its service area as Randolph County and has targeted adolescent substance abuse as a differentiating product. Marketing research techniques were used by the consultants in conducting a marketing analysis and in studying the medical staff. A marketing audit would examine how the hospital is presently communicating with its publics and provide useful information to assist in enhancing the image of the hospital.

3. How would you describe Smyth's management style? What are the strengths and weaknesses of this style in an organization such as Calumet Community Hospital?

The students will likely describe Smyth's style as participative because of statements he made. A closer examination, however, will indicate that Smyth maintains fairly tight control. He wants to be involved in all decisions and to know what is going on at all times. He practices "management by wandering around" so that he can "keep on top of things."

The fact that all department heads report directly to him indicates that he does not delegate to any great extent. This implies centralization of decisions at the top.

The strengths of Smyth's style are that he is accessible, friendly, and visible in the hospital. He is popular with the employees because he is out on the floor talking with them.

The major weakness of his style is that he can become so bogged down in day-today operations that there is little time to function as a CEO. He can stock the Coke machine and handle the phones, but who can do the necessary strategic planning? This weakness relates to "time management," prioritizing one's activities, and delegation.

4. How does Smyth's management style relate to strategic planning and marketing? What would you do, if you were Smyth, to strengthen the planning and marketing functions?

Students need to learn to recognize the implications of various management styles in different situations. For example, a "participatory style" may seem appropriate in a small hospital. However, most hospital department heads are health professionals and seldom trained in management.

Someone must assume responsibility for the strategic planning and marketing functions for the hospital as a whole. Some structure and direction should be provided as a support service for the department managers. Because the Administrator in a small, not-for-profit organization often is the only individual in "top management," he or she must delegate to the greatest extent possible.

There is little time for strategic management when a manager is a "hands on" individual who wants to know everything going on in the organization. The Administrator must ensure that the strategic planning and marketing functions are carried out if the organization is to be successful in the long term.

To strengthen the planning and marketing functions, Smyth might consider one or more of the following courses of action:

- A. Assign someone in the organization the responsibility for coordinating activities associated with data gathering, employee attitude surveys, news media, and so on.
- B. Contact Central State University's College of Business for assistance in conducting marketing studies.
- C. Contract for planning/marketing consulting services on a regular or as needed basis -- preferably from a Central State University business professor.

Smyth also needs to reevaluate his own activities and block out time each week for strategic planning and marketing functions.

To allow more time for top management activities, Smyth should consider delegating more authority to department heads. He might also consider appointing a department head, such as the Director of Nursing, to a new position of Assistant Administrator to whom some of the department heads would report rather than to him.

5. Smyth now is faced with implementation of the consultants recommendations. Which of these recommendations, if any, should be adopted? Are there other alternatives? The consultants' recommendations emphasize facilities planning more than product/services planning. However, the SWOT analysis does point out several areas for further study.

A retrenchment strategy, that is retrenching into a specialty hospital, is a possible alternative for Calumet. However, because construction and remodeling costs will be expensive, Smyth and the Board should proceed cautiously. Several questions need to be answered and these require further study. For example, what are the prospects for securing additional physicians in the near future? Will the population base support additional specialists? Can the hospital realistically compete with larger hospitals?

Another market entry alternative not mentioned by the consultants is the possibility of a merger, affiliation, or strategic alliance. What is the possibility of affiliating with one of the larger hospitals in the adjacent county? Would this make Calumet more attractive to new and younger physician specialists? Would this make the hospital more attractive to citizens now traveling to other hospitals in the area? What economies of scale could be achieved by affiliating with a larger hospital?

Should the mission of the hospital be changed to some type of specialty facility such as a skilled nursing facility or outpatient facility? These and other questions need to be addressed before proceeding with the consultants' recommendations.

CASE 7

Indian Health Service: Creating a Climate for Change

Robert J. Tosatto, Terrie C. Reeves, W. Jack Duncan, and Peter M. Ginter

OVERVIEW

The Indian Health Service (IHS) was dedicated to providing comprehensive health care services to more than 1.4 million American Indians and Alaska Natives (AI/ANs). The basis for this responsibility was established and confirmed by numerous treaties, statutes, and executive orders as well as a special government-togovernment relationship between the Indian tribes and the United States. The IHS had a budget of over \$2 billion, over 15,000 employees, and was responsible for the operation of more than 500 facilities.

IHS Director Dr. Michael Trujillo knew that in order to accomplish the agency's mission, IHS must honor past treaties and respect the beliefs and spiritual convictions of the various tribes. The need to respect local traditions and beliefs was formally recognized in Indian self-determination. Despite the appreciation of the importance of self-determination, IHS was considered a discretionary agency in the Congressional budget process, had not developed an adequate third-party payor billing system, faced difficulty recruiting professional staff, and served a population whose health status was below that of the rest of the United States. Dr. Trujillo must decide how to lead the IHS through challenging times. He recognized the necessity to continue to increase the health status of the IHS's population in order to gain continued Congressional funding and support. He understood, however, based on the experience of the past four years that the likelihood of increased funding above normal cost-of-living increases was very low. One of his most important challenges was to determine more effective ways to accomplish the IHS mission and honor his philosophical commitment to self-determination.

KEY ISSUES

- 1. Balancing the tension between the need for centralized planning and direction to focus resources in a manner that would increase health status in the most efficient way while allowing local communities (tribes) to define their own health needs.
- 2. Planning for and managing on-going organizational change in a public bureaucracy with a rigid structure.
- 3. Instituting innovative ways of mission accomplishment in a changing health care setting with evolving philosophical perspectives (decentralization of health needs assessment).
- 4. Leading the culture changes necessary to accommodate a change in philosophy away from a centralized and controlling bureaucracy to a more decentralized and facilitating organization.
- 5. Specifying the activities necessary to implement a new organizational strategy for mission accomplishment.

TEACHING OBJECTIVES

After analyzing this case, students should be able to:

- 1. Understand and analyze the range of responses possible for the managers of governmental agencies and other bureaucratic organizations when faced with environmental changes.
- 2. Understand the ongoing dilemma faced by leaders and managers attempting to balance the positive and negative aspects of organizational centralization and decentralization.
- 3. Develop innovative ways to accomplish a mission that has become increasingly difficult to accomplish using conventional approaches because of stable or declining resources.
- 4. Apply strategic management concepts to bureaucratic and government entities.
- 5. Demonstrate the use of visionary or transformational leadership tactics.
- 6. Develop a strategy to accomplish the mission / vision of Dr. Trujillo.

SUGGESTIONS FOR EFFECTIVE TEACHING

The Indian Health Service case is intended for use in either a health care management course or a public health strategy and policy course. We have used the case effectively with graduate health administration students because of their ability to draw a parallel between the dilemmas faced by the IHS and other specialized health care systems such as the Veterans Administration. A familiarity with the general health care environment is needed as a basis for comparison with the situation faced by the Indian Health Service. Further, the students need to be aware of the trend in public health toward community-based health needs assessment. The case is an illustration of the potential culture change problems that will likely result from efforts to implement radical paradigm shifts in operational philosophies. It provides an immediate and concrete illustration of the ongoing dilemma between centralization and decentralization in management.

Students interested in providing health care services to American Indians and Alaska Natives should find that the case provides good background information on these groups. It is likely that students will take sides on the issue of trying to change the bureaucracy or the structure of an entity versus making changes within the existing bureaucracy or structure: the health administration students may be more likely to want to recommend wholesale change whereas public health students may be more inclined to suggest working "within the system." Students may also become partisans of either greater centralization and control of the IHS or greater decentralization.

Students may be tempted to apply strategic management principles to the IHS in a traditional way. Although these may be useful and valid, students need to realize the importance of the various IHS stakeholders, the impact the stakeholders can have

on the organization, and the need for continued involvement by stakeholders. Students need to be aware of the roles other governmental units play in the strategic decisions made by HIS – the IHS must operate in an atmosphere of compromise and cooperation, it cannot "go it alone" no matter how attractive an independent alternative may appear. It is important that students understand that treaties between the United States government and sovereign states imply policy issues far beyond the immediate problems faced by the IHS. Thus, the normal SWOT approach to analyzing the case may be an appropriate method of analysis only if it is supplemented with other analytic tools.

We have found it particularly useful to allow students to attempt these applications and struggle with issues such as the following:

1. Difficulties in identifying stakeholders for organizations such as the Indian Health Service.

Stakeholder maps often become large and complex when students begin to think seriously about the various tribal councils; other government agencies such as the Bureau of Indian Affairs; state, local, and national public health organizations; private sector health care facilities; and so on.

2. Multiple priorities present complications to rational, linear decision making.

Dr. Trujillo has a very strong personal commitment to self-determination and has the formal authority necessary to move the agency in the direction of communitybased decentralization. This move, however, may not be the most direct method of achieving the concrete results lawmakers want relative to the improvement of the health status of Native Americans and Alaska Natives. Balancing his philosophical commitment to self-determination and the realistic need to produce results that will be instrumental in acquiring future resources presents Dr. Trujillo with a complex dilemma – the need for centralization to control and focus on the one hand and the need for decentralization to achieve involvement and commitment on the other.

3. Managing a large and complex bureaucracy and leading it toward a new operational paradigm.

Government bureaucracies tend toward centralization and control. Yet, the mission of IHS and the philosophy of self-determination argue for involving local communities more in the assessment of health care needs and providing the means that would be most effective for addressing the needs. This dilemma provides an opportunity to discuss topics such as transformational leadership, coalition building among local stakeholders, and culture change. In fact, our classes consistently focus more on these topics than any others.

This case provides a detailed description of the environment faced by the IHS for students to identify and discuss the major strategic issues. Further research would add depth and greater insight to the discussions.

Role playing can be used to facilitate learning and to bring out the various environmental factors. For example, students can be separated into stakeholder groups (such as the Indian tribal leaders and members of several different tribes, Congressional committees, IHS employees, and IHS leaders) and asked to discuss the environmental issues from these vantage points. Stakeholder groups might be asked to define their expectations of the IHS for the future, given environmental changes, and how the expectations of one stakeholder group differs from or are in conflict with those of another group. Based on input from other groups, the IHS leader group can be asked to decide upon a strategic course for the IHS.

We have had particular success using a role-playing exercise whereby we have Dr. Trujillo interacting with tribal leaders in one of his frequent visits to the Southwest. In this meeting the leaders present Dr. Trujillo with a wish list of needs including a primary care physician, new laboratory facility, and transportation services to the clinic. The leaders continually refer to "self-determination" as the basis for their need and insist that he should provide them the resources to solve their local health problems. Dr. Trujillo is very sympathetic with their requests but emphasizes his need to use resources most effectively for the "total system" and offers to assist the leaders in building partnerships with other local public and private organizations to address their problems. The tribal leaders insist that it is his responsibility to find the resources and Dr. Trujillo struggles attempting to explain how he must balance ensuring results for IHS while being sensitive to local needs.

Good sources for identifying stakeholders "who really count" and managing those stakeholders are:

R. K. Mitchell, B. R. Agle, and D. J. Wood, "Toward a Theory of Stakeholder Identification and Salience: Defining the Principle of Who and What Really Counts," Academy of Management Journal 22, no. 4 (1997), pp. 853-886.

John D. Blair and Myron D. Fottler, Challenges in Health Care Management: Strategic Perspectives for Managing Key Stakeholders (San Francisco: Jossey-Bass, 1990).

Another possibility using role playing is to divide the class into two groups, one of IHS leaders and one of Indian Affairs Committee members. The IHS leaders can be asked to justify IHS programs and initiatives while the committee members search for justification for program cuts or reallocations. This approach works particularly well with students interested primarily in public policy.

The case can be used as the basis for a written analysis, either as presented, or with additional outside research required. Students can also be assigned a research topic pertaining to the case (individually or in teams) such as the legal, policy, epidemiological, cultural, or financial implications of changes in the IHS. This approach can help bring out the importance of the IHS's different stakeholders. Excellent sources include the following: Indian Health Design Team, Design for a New IHS: Preliminary Recommendations of the Indian Health Design Team (Washington, DC: Indian Health Service, 1995).

Indian Health Design Team, Design for a New IHS: Final Recommendations of the Indian Health Design Team (Washington, DC: Indian Health Service, 1997).

F. Mullan, Plagues and Politics: The Story of the United States Public Health Service (New York: Basic Books, 1989).

Indian Health Service, Trends in Indian Health (Washington, DC: Indian Health Service, Division of Program Statistics, 1996).

The Internet is a good source for governmental statements and testimony, for epidemiological data, and for government policy. In addition, there are many excellent sources for the beliefs and practices of individual Indian tribes or Alaskan Native groups.

Finally the case lends itself to an analysis of the strategic options available to the HIS under different scenarios. For example, scenarios could be developed around the following questions:

- What will happen to the IHS with the passage of the balanced budget amendment?
- What will happen to the IHS if comprehensive health care reform is legislated?
- What are the implications for the IHS if national mandates are instituted for Medicare or Medicaid?

Students may be asked to develop realistic scenarios that might face IHS in the future. They should analyze the implications of each scenario for IHS and decide what strategic actions best fit a given scenario. Included in the analysis may be a prioritization of the various IHS programs under different scenarios. Or, students may envision new or different programs for the IHS under different scenarios. If so, they should be asked to justify the inclusion of these programs. Further reading on scenarios may be found in:

P. Leemhuis, "Using Scenarios to Develop Strategies," Long Range Planning 18 (1985), pp. 30-37.

A. Schriefer, "Getting the Most Out of Scenarios: Advice from Experts," Planning Review 23, no. 5 (1995), pp. 33-35.

Strategic analysis of the case might be centered on the following issues:

• Effective health services for American Indians and Alaska Natives must continue to integrate the philosophies and values of the tribes while remaining consistent with the overall mandates of the IHS for system-wide health status improvements.

- Alcohol and substance abuse among AI/ANs must be addressed.
- More efficient business practices are needed to maintain the IHS's viability.
- More effective philosophical approaches (community based self-determination) to mission accomplishment must be developed.
- Empowerment at the local level to determine and act on the changes needed to best serve each tribe or community must occur.
- Lack of increases in budget allocations from the Federal government and ways of leveraging limited resources must be considered.

STRENGTHS/WEAKNESSES AND OPPORTUNITIES/THREATS

Regardless of the particular issue selected, we have found it useful to insist that the students begin with a general situation analysis as a basis of addressing the various strategic issues. Perceptive students quickly realize that the difference between internal and external factors is not as clear in the case of the IHS as with some other organizations. Because of the heavy involvement of the tribes in Indian health care in general, and in the IHS, specifically, and because of belief differences between AI/ANs and many others in the United States, the concepts of "internal" and "external" may be different for the IHS. These differences can lead to interesting classroom discussion.

Strengths

- 1. Reputation for quality care
- 2. Education and training capabilities
- 3. Dedicated and enthusiastic personnel
- 4. Improved health status
- 5. Lobbying power of American Indian groups
- 6. Community orientation and sensitivity to Indian culture
- 7. Dr. Trujillo, a strong leader

Opportunities

- 1. Tribal interest in IHS involvement
- 2. "Reinventing government" initiative
- 3. Young service population
- 4. Public's interest in American Indian issues
- 5. Physician surplus making IHS more attractive to medical personnel
- 6. Advanced technology

Weaknesses

- 1. Dependence on the political process.
- 2. Budget constraints
- 3. Staff recruitment and retention
- 4. Poor billing and collecting capabilities
- 5. Bureaucratic, top heavy organizational structure
- 6. Inferior pay for health professionals comparable with the private sector

Threats

- 1. Increases in health care costs
- 2. "Reinventing government" initiative
- 3. Downsizing of the Federal workforce
- 4. "Free" nature of IHS may encourage overuse
- 5. Increases in diabetes, cancer, and other debilitating diseases among service population
- 6. Service population's economic disadvantages

- 7. Government-to-government relationship between Federal and tribal governments
- 7. Differences in socioeconomic and other factors among tribes
- 8. Financial strain experienced by rural hospitals and clinics affects IHS and tribal facilities
- 9. General attitude favoring decentralization and getting services closer to the people
- 10. Shift from direct Federal support to "block grants" to states

We have found over time that our most productive discussions have evolved around the centralization/decentralization question at a strategic rather than an organizational level. It is critically important for Dr. Trujillo to emphasize and demonstrate his commitment to self-determination but also to communicate his responsibility for "system-wide" performance. He correctly identifies one of his primary challenges as "managing" expectations and behaving in a manner that conveys his sensitivity to local needs while making it clear that the IHS cannot "be everything to everyone." We suggest that the class be asked to develop an outline of the philosophical position of the IHS relative to local needs. Essentially, this exercise results in a definition of the roles the agency is willing to play relative to local health needs.

The IHS should be challenged to look at the issue of Indian Self-Determination in much the same way as the larger public health community has looked at community-based health needs assessment. By "tuning in" to local concerns, the IHS may actually be able to more effectively leverage its limited resources than by continuing to operate as a centralized bureaucracy. However, the agency should be very careful in decentralizing its strategic decision making to avoid the creation of false expectations. Specifically, we recommend the following approach for discussion.

Dr. Trujillo's commitment to self-determination creates both an opportunity and a threat for the IHS. Ultimately, the mission of the IHS is to improve the "physical, mental, social, and spiritual health" of the American Indian and Alaska Native peoples. The mission explicitly states that this improvement should take place "in partnership" with the peoples. Interestingly, Indian self-determination is a reflection of the "community based" movement taking place in the larger public health community. Therefore, it is possible to draw some analogies from the public health sector and apply them to Dr. Trujillo's decision making.

Public health agencies have learned, sometimes the hard way, that advocating community-based initiatives can create false expectations that central authorities will automatically and promptly respond to requests for new resources from local communities. In an era of limited resources such as that faced by the IHS, it is important to very carefully specify the role of the central authority and the roles it can perform for tribal communities.

Discussions in class suggest that the best strategy for the IHS is to avoid creating the impression that it will be able to grant all community requests but at the same time ensure local leaders that it can provide valuable assistance. It is suggested, therefore, that the following approach be implemented.

Decision 1. Determine precisely the role of the IHS in Indian self determination and community involvement.

We suggest that the IHS carefully avoid creating the impression that it can supply all needs. Instead, there are some services it is uniquely equipped to offer.

IHS as Data Collector. There are examples of state public health agencies that have functioned essentially as data collectors for local health departments and communities. The IHS could do the same. In such a case the agency would focus its resources on assembling location-specific data sets and relevant demographics, vital statistics, and other relevant data as inputs for local communities in accomplishing their own community health needs assessments with the aid of the data supplied.

IHS as Facilitator. Some state public health agencies function as a facilitator in community health needs assessment by organizing forums, facilitating discussions, leading focus groups, and so on while distancing themselves from actually doing the needs assessment. In this case the local units and communities are responsible for all of the assessment with the state department functioning only as an objective facilitator and conflict resolver. As facilitator the state agency suggests and negotiates the appropriate process to be used. The IHS could be an extremely important facilitator of local health initiatives.

IHS as Technical Consultant. In this model the central agency is available to provide subject area experts and technical assistance in all aspects of community health needs assessment. As technical consultant the IHS would be expected to have skilled experts to assist in coalition building, survey research, interview protocols, and related areas.

IHS as Advocate of Native American Health. Although this is an important role for the IHS, it is a risky role. As the advocate, the IHS might find itself in the role of problem solver or at least the responsible party for funding the solving of problems. The proper advocacy role for the IHS is political in nature. Political advocacy for the health needs of the Indian peoples is a legitimate role of the central authority.

Decision 2. Agreeing on Philosophy.

To present a consistent message, it is important that the IHS make its philosophy of how self-determination and the health status of the Indian peoples relate to one another. We suggest that following aspects of this philosophy should be made explicit.

Focus on Community. This is the opportunity for the community to assume ownership of its own health and well-being.

Local Control and Participation. It is critical that representatives in the community conduct the actual assessment in order to facilitate ownership.

Power Sharing. There must be a willingness on the part of the state agency and the local units to share power in a meaningful way. Agency-wide initiatives must have a forum for expression in any health needs assessment and local uniqueness must be addressed as well. A balance between the two must be achieved.

Information and Problem Solving. Community health needs assessment should be data driven and decision making should be based on relevant and defensible information.

Decision 3. Inventorying IHS's Capacity for Community Health Needs Assessment.

If there is agreement on the role of IHS in self-determination and consensus on the philosophy, careful attention must be given to the capacity of the agency to deliver on the services it commits to provide for local communities.

Decision 4. Agreeing on a Process.

Finally, a process must be selected for guiding the community health needs assessment. Some of the more important activities are listed below:

- Identifying community leaders.
- Building coalitions among community leaders.
- Developing governing boards for coalitions of community leaders.
- Profiling the demographics of target populations.
- Inventorying community health assets (resources).
- Assessing community health risks and problems.
- Defining community health needs.
- Holding community forums and event analyses.
- Planning appropriate interventions to address community health needs.
- Providing ongoing technical assistance.
- Evaluation and process improvement.

It is possible to take an approach directed toward conventional strategic management concerns, if the discussion proceeds in this direction. An emphasis on strategy formulation would minimize the centralization/decentralization dilemma.

STRATEGIC ALTERNATIVES

Depending upon which stakeholders students decide have the greatest influence, several strategic options are possible. The following have been suggested by students.

Expansion: Diversification – creation of an Indian HMO product (could be developed as a maintenance strategy in which many of the services currently provided by the IHS would be offered in an HMO format instead of piecemeal).

Maintenance: Reorganization – reorganize and re-structure the IHS to give more autonomy to the tribal and local organizations.

Contraction: Divest and Reorganize – divest hospitals and clinics and become, instead, a grant/contract administering agency.

Students may suggest privatization of the IHS. If this suggestion were made, the following points should be discussed concerning implementation. What precedents are there for privatization of government entities? Reminding students of the recurring argument about the VA medical system can stimulate discussion. Many critics suggest that it makes sense to simply pay private providers the fees needed to provide medical care to veterans. The increasingly small number of veterans reinforces the economic case for doing away with the VA medical system entirely and contracting for services with private providers. Some states such as Tennessee have experimented with subcontracting with private firms for the management of prisons. Numerous states have considered "getting out" of the mental health business and contracting with private organizations for essential services. In 1996, an ambitious experiment in school reform in Hartford, Connecticut that involved hiring a for-profit company (Educational Alternatives, Inc.) to run the public school system collapsed. However, other private companies such as the Edison Project, LP and Alternative Public Schools have continued to seek business in this area. Finally, the 1994 Entitlements Commission of the United States government opened the door to the possibility of the eventual privatization of the Social Security System using the highly successful case in Chile as an example.

Are the treaty responsibilities between governments in effect forever? The most interesting perspective from which to discuss this question is by raising the ethical issue. Treaties are made to last forever or in some cases the treaty provides the means by which an agreement may be altered. Customarily, a treaty remains in force until one or more of the following conditions develop: (1) one or more parties to the agreement decide to cancel the treaty after a proper notice to the other parties of an intent to do so; (2) the failure of one party to carry out its responsibilities; (3) parties to the treaty agree to terminate the agreements; or (4) other reasons agreed on at the time of the ratification of the treaty. In other words, treaties may be looked on as legal contracts and may be terminated in much the same way as a contract.

QUESTIONS FOR CLASS DISCUSSION

1. Who are the stakeholders of the IHS and which are most important?

Many stakeholders of the IHS are obvious, but the relative power position of each may not be quite as obvious. Blair and Fottler suggest analyzing stakeholders in a manner similar to Porter's competitive forces model. The more powerful the stakeholder the more an organization must take the stakeholder into account. More powerful stakeholders probably mean that the organization must be more collaborative or adopt more compromise positions in order to accommodate the powerful stakeholder. Following is a list of the IHS's stakeholders taken from student analyses.

- The Indian and Alaskan Native Tribes. Individual Tribal members are providers, employees, and service population, but the Tribes acting as a unit are the most powerful stakeholders. Students should realize that a major consideration for the IHS is the vast differences between the individual tribes in both customs and beliefs and in relative power; to consider the tribes as one unit may not be the most effective way to analyze tribal importance to the IHS.
- The Congress and the Committees of Congress with oversight of the IHS.
- Other health and human services agencies that supply services (including some health services) for the AI/AN population.
- Lobbying groups such as the National Indian Health Board.
- Other government agencies, e.g. the Centers for Disease Control and Prevention.
- The local public health departments.
- Governments in states in which the various tribes are located.
- Regulatory, licensing, planning, and accrediting agencies (IHS hospitals and clinics are regulated and accredited like all similar facilities).
- Other primary and secondary care providers, both public and private.
- Educational institutions.
- Pharmaceutical companies.
- Health equipment supply companies.
- The American Public Health Association.
- Other professional associations, e.g. the AMA, the AHA, and so on.
- The employees of the IHS.
- Organizations that might compete with the IHS's facilities in a given location or nationally such as hospital chains, clinics, and other providers.

Stakeholder Analysis

Stakeholder	Stakeholder's Expectations	Possible Outcome Standards
Community (Indian and non-Indian)	 Access to health care and other services Quality care Sanitary environment Job security 	 access and quality of care provided improvements in health status
Indian Health Service (including all levels and parts of the organization)	 the healthiest population possible continued government funding continued viability continued support from AI/ANs continued input in decisions 	 improvements in health status improved sanitary environment continued viability input into decisions
U.S. Government	 provision of health care for the covered population quality care IHS to meet policy, regulatory, and treaty expectations 	 regulation, policy, treaty compliance decreased costs to fund greater health improvements
Indians and Alaska Natives	 quality care access to care respect of traditions involvement in IHS decisions 	 accessibility to health care quality of care provided numbers of complaints about lack of respect or understanding of traditions
Employees	 job security respect and understanding of traditions meaningful jobs 	 number of lay-offs number of complaints amount of input into IHS changes
Physicians and other health providers	 adequate reimbursement for services adequate patient base input into IHS changes 	 cash flow ease of referral input into decisions
Other health care facilities (including contract providers)	 change in AI/AN population served no increased financial demands 	• flat or decrease in services to indigent or underserved AI/ANs

2. Why is the balancing of centralization and decentralization a major challenge faced by Dr. Trujillo?

Dr. Trujillo has a complicated balancing act. The mission calls for the improvement of the health status of Native Americans and he recognizes that even stable resources will demand results. At the same time, he is committed philosophically to self-determination and localized health needs assessment as the order of the day. If Dr. Trujillo allows the IHS to lose its focus by the uncoordinated pursuit of locally defined needs, system-wide results are likely to suffer. On the other hand if he does not allow local communities input into their health needs and assist in responding to local health needs, self-determination will be little more than a slogan and local communities will view the IHS as little more than another Washington bureaucracy. It is critical that Dr. Trujillo develop a statement of precisely what role the IHS is willing to play in self-determination and carefully manage expectations based on this role statement.

3. What factors could impede changes to the Indian Health Service?

Students should recognize and discuss the unique relationship between the Indian tribes, the IHS, and the Federal government regarding health care for AI/ANs. Change is most easily accomplished when those effected by the change participate in it; because there are so many groups effected by change in the IHS, participation by all may be, at best, slow and at worst, impossible. Many organizational changes may require policy, political, or legislative changes first which means overcoming all the usual political problems confronted by governmental reformers. In addition, our political system allows a place for special interest groups who may either slow, speed, or divert legislation. H. G. Rainey maintains that there must be several conditions present in order for change to occur in a federal agency: 1) a durable power center, committed to successful change, 2) appropriate timing for collective support, and 3) a comprehensive, clear, realistic alternative process. Students should be challenged to discover whether these conditions, or some similar set of conditions, are present for the IHS. Two good change sources are:

D. N. Lombardi, Thriving in as Age of Change: Practical Strategies for Health Care Leaders (Chicago: Health Administration Press, 1996).

H. G. Rainey, Understanding and Managing Public Organizations (San Francisco: Jossey-Bass Publishers, 1997).

4. How can Dr. Trujillo overcome some of the resistance to change?

Students usually realize that Dr. Trujillo could lessen resistance to change within the IHS, and will emphasize these possibilities in their answers that might include some or all of the following points. Although organizational change is usually a form of renewal for the organization, both organizations and most individuals associated with organizations feel uncomfortable with change. Often individuals make an estimate on value for the benefits to be gained from change less the costs associated with change – learning about new situations minus time and effort needed to re-train, and compare it to the cost of not making the change – losing

a job due to down-sizing. Individuals often favor the alternative with the least cost, or with the smallest negative value, for example. Organizations may also calculate the value of change: How much will changing to adapt to environmental forces cost compared to how much will be lost (usually in lost business) if the change is not made and the organization does not adapt to changes in the environment; however similar to individuals, the relative values are often based on perceptions, and perceptions can be altered by organizational leaders.

The IHS may not be able to deal with some environmental pressures it faces either because the stakeholders involved are opposed, or because it cannot absorb the cost. However, Dr. Trujillo can alter the relative values by being aware of the reasons for resistance to change; that is, the reasons for a perception that change costs more than the cost of not changing.

• Lack of "ownership" in the change.

If those affected by change feel they have no input into the change process, they may feel no "ownership" for the change. Participation and involvement in all aspects of the process – change formulation through implementation and control – may help to alleviate this resistance to change. Students can suggest ways that all those involved in a changed IHS could feel more "ownership" of the process.

• Lack of benefits.

If those affected by change cannot see the advantages or benefits they (or their constituents) will receive, they may be unwilling to support change. Clear identification of the payoffs for each group affected may help to increase support. Payoffs can be couched in financial terms or in more qualitative terms, but must be deemed valuable by the group to whom the payoff will occur. Students may use this approach to analyze any recommended strategic changes for the IHS by assessing the payoff of a strategic change for all groups involved.

• Increased burdens.

If those affected by change feel that the change consumes inappropriate or greatly increased levels of time, resources, or energy, they may be unwilling to support change. This analysis is, in a way, the other side of the payoff analysis. Students can assess the "burden," of cost of any strategic change from the point of view of each group; the key to the analysis will be to carefully define the meaning of "burden" for the group. For example, making a strategic change that requires additional time spent in caring for a segment of patients may be burdensome for some stakeholder groups such as Congressional committees, but may be beneficial for others such as the Tribes who have different concepts of time.

• Insecurity.

If groups feel threatened economically, physically, politically, or mentally (emotionally), they may not support changes. Strong, visionary leadership, negotiation, compromise, and clear enunciation of the costs and benefits of strategic changes can minimize this source of resistance. Students may wish to discuss Dr. Trujillo's abilities to perform these leadership duties.

• Fear of failure.

If groups believe that changes will not work, they are unlikely to be supportive of change. The perceptual basis for this source of resistance should be eliminated if the first four sources of resistance are dealt with properly. Students may wish to discuss what would constitute actual failure (as opposed to the fear of failure) in a strategic change, and develop contingency plans and alternatives.

Individual reactions to and perceptions of change are covered many in organizational behavior texts.

S. P. Robbins, Essentials of Organizational Behavior, 5th ed (Saddle River, New Jersey: Prentice Hall, 1997).

J. M Kouzes and B. Z. Posner, The Leadership Challenge: How to Keep Getting Extraordinary Things Done in Organizations (San Francisco: Jossey-Bass Publishers, 1995).

F. Hesselbein, M. Goldsmith, and R Beckhard (eds), The Leader of the Future (San Francisco: Jossey-Bass Publishers, 1996).

D. K. Hurst, Crisis and Renewal: Meeting the Challenge of Organizational Change (Boston: Harvard Business School Press, 1995).

5. What are some possible sources of alternative resources that the Indian Health Service might pursue?

Although students may bring up the issue that the IHS is not collecting from third-party payors as much revenue as is due to it, the primary issues in this case are not related to revenue. However, students usually want to discuss aspects of the revenue problem because it is more concrete than some of the other issues presented in the case. Congress passed the Indian Health Care Amendments of 1988, which authorized the IHS to bill, third parties for both inpatient and outpatient services. Third parties include Medicare, Medicaid, and private health insurance providers.

American Indian and Alaska Native people who are eligible for IHS services receive their health care free of personal charge from the IHS. Those individuals who do have insurance coverage (private or government entitlement) will have their policies billed. The IHS does not collect the co-payments or deductibles that are required with some policies. Those individuals who do not have insurance coverage are not charged for the services they receive. An untapped source of revenue for the IHS is an out-of-pocket fee for services provided. This IHS revenue source, for many economic and political reasons, has not been considered.

The good student will be able to find the 1995 review by the Office of Inspector General (OIG) of the Department of Health and Human Services on the Web. In summary, that review criticizes the IHS for its inability to bill private insurors and follow up on claims effectively. The objectives of the review were to determine whether the IHS accurately billed private health insurance companies and collected for all covered services provided to patients in IHS medical facilities. To test IHS practices, the OIG looked at a 3-month period ending March 31, 1993. The OIG found that the IHS had not established the controls necessary to ensure that the amounts billed were accurate or that all covered services were billed resulting in the underbilling of private insurers by \$7,332,191 during the 3-month review period.

The OIG review found several reasons that the IHS did not file claims or filed inaccurate claims with private health insurers for covered services including:

- An absence of internal controls that allowed errors and omissions to be made and go undetected.
- Business offices that did not have sufficient resources to keep up with the workload.
- Business office staff that were not adequately trained.
- Business offices that used outdated fee schedules and pharmaceutical price lists to prepare claims.

In addition to the \$7,332,191 under billed, IHS business offices had neither contacted private health insurance companies nor followed up on an estimated \$1,237,970 of unpaid claims (also during the 3-month review period). This occurred because the IHS did not identify and track the claims needing follow-up, assign sufficient staff to perform follow-up activities, or provide complete follow-up instructions. To maximize collections, the OIG recommended that the IHS should establish the necessary internal controls, assign adequate resources to its business offices, and provide additional training to business office staff to ensure that claims for all covered services are filed and accurate. One way to establish the necessary internal controls, they suggested, would be for the IHS to automate its claims processing system. In addition, the OIG recommended that the IHS distribute fee schedules in a timely manner and implement complete and timely follow-up procedures. Students may develop additional methods to insure that under billing does not continue. They may also suggest co-payments as required by many insurors.

Depending upon which strategic choice students make, other possible sources of additional revenue may be suggested. However, it is probably unrealistic for students to suggest increased budget allocations from Congress.

Students should also discuss other resources available to the IHS. People may be one of these – tribal members or other grass roots organizations – and the education functions they can provide. Other agencies such as state health agencies or authorities, city or county entities, or even entities such as water commissions or highway departments may all be a resources for the IHS depending on the strategies chosen.

CONCLUSIONS AND SUMMARY

There are usually four major classroom "take away" lessons from this case.

- 1. Stakeholders (or constituents) and their interests are vital to the strategic management of a public organization.
- 2. Centralization and decentralization are not merely lessons from management history but remain an important dilemma for strategic decision makers in public as well as private organizations.
- 3. Leaders are needed even in government "bureaucracies."
- 4. Leaders and organizational stakeholders can together bring change to even the most structurally bound organization.

EPILOGUE

(The following information is publicly available and will probably be discovered by the good student.)

Trujillo's leadership and vision were instrumental factors in the formation of the Indian Health Design Team (IHDT). This task force of tribal leaders and IHS executives was given the duty of designing a new and more effective IHS, one that would not only have fewer levels of management, but would also direct its resources to local tribes and communities. The team used a process based on participation and involvement with the other stakeholders in Indian health care, including the National Indian Health Board, Indian people, tribal leaders, and IHS staff and professional employees.

The team followed simple, but unique, guiding principles. The IHDT felt that it was important to:

- put the patient first,
- focus on health,
- respect cultural sensitivity,
- empower local decision making,
- build accountability into the new system,
- consult with Indian people,
- honor, uphold, protect, and advocate sovereign rights.

The team in a draft report released preliminary findings and recommendations in July, 1995. The draft received many comments and constructive criticisms from stakeholders of Indian health and the design process continued and was fueled by these new suggestions. The final report, entitled Design for a New IHS: Final Recommendations of the Indian Health Design Team, was released in February 1997.

The IHDT found that one design could not support all of the differences found among the various tribes at the local levels. Instead, the team decided to focus on the support functions of the organization - that is, the Area Offices and IHS Headquarters. The implementation of the redesign would occur in two phases.

Phase One involved the restructuring of IHS Headquarters and was scheduled for completion in 1997. The plan called for streamlining the IHS Headquarters organization from over 132 divisions and branches to less than 50. These condensed units were grouped into three major offices: the Office of the Director, the Office of Public Health, and the Office of Management Support. The core functions of the new IHS Headquarters focused on advocacy for Indian health, strategic leadership, and support for the Indian Health Care System.

Phase Two of the IHDT plan involved Area Office redesign and was scheduled for completion in 1998. The Area Offices were to be made more supportive of local health programs. By removing the controlling role of the Area Offices, funds could be saved and administrative staffs decreased. Any changes at the Area level were to involve the local tribes and Service Units.

CASE8

Midwest: A Managed Health Care System Incorporates a Medical Practice

J. Stuart Bunderson, Shawn M. Lofstrom, and Andrew H. Van de Ven

OVERVIEW

This case describes the efforts of Midwest Health System, a large not-for-profit health care provider operating in the Twin Cities of Minneapolis and St. Paul, to operationalize a strategy of fully-integrated health care – doctors, hospitals, and health plans together under one organizational roof. In order to highlight the issues involved in operationalizing this strategy, the case focuses on one division of Midwest Health System, the Midwest Medical Group (MMG), and describes in detail the efforts of the MMG's top management group to define and carry out its role in the larger organizational context. This case is part of a longitudinal study of organizational changes ongoing at Midwest, and is based on interviews with over twenty-four managers, physicians, and project committees from April to December 1995. The case begins with a description of the history, strategy, and structure of the Midwest Health System and of the Midwest Medical Group.

MMG was a multi-disciplinary medical group practice organization comprised of 475 employed physicians (75 percent were primary care physicians), 50 clinics, and over 8,700 contract providers. It operated with dual management – nearly every key administrator in the organization had a physician co-manager.

MMG operated at a loss since its inception. Clinics were often purchased to "rescue" a practice in trouble or for strategic reasons (primarily to block competition) rather than being a good financial discussion. In addition, MMG was finding that "employed" physicians had a different work ethic than entrepreneurial physicians. Nevertheless, MMG physicians accounted for a significant amount of referrals to other parts of Midwest and MMG formed an important deterrent to the growth of competing health plans. Following these descriptions, the case enumerates several issues that the MMG and Midwest managers have identified as particularly challenging for the future.

KEY ISSUES

- 1. Managing a group of highly-educated, highly-skilled people is a challenge.
- 2. Organizational change is not easy or necessarily comfortable.
- 3. Integrating a large number of very independent professionals.
- 4. Managing a health network.
- 5. Teaching physicians to be managers.

TEACHING OBJECTIVES

- 1. To understand that physician practices have been independent "businesses" for a long time and integrating them into a large group practice is a real leadership challenge.
- 2. To decide whether a physician-driven, market-driven, community-driven, or system-driven model is best for MMG.
- 3. To illustrate the difficulty of truly integrating a system of care.
- 4. Use of a compass because there are no maps (new territory for MMG).

SUGGESTIONS FOR EFFECTIVE TEACHING

Because this case describes an organization undergoing major changes in strategies and structures at all levels, the case is best used as a context for discussing issues and challenges in managing large-scale organizational change. Within this broad area, there are at least three specific topics that are particularly well illustrated in this case and for which the case can be especially useful. Those topics are: (1) the organization design complexities associated with a strategy of integration, (2) the challenges of integrating individuals and groups from diverse professional and organizational backgrounds, and (3) the viability of a vertical integration strategy in an industry such as health care.

If this case is used as a way of addressing the organizational complexities associated with integration, a viable solution (there will be many) will propose a specific set of organizational structures and systems that support a strategy of health care integration. The solution will further demonstrate that the proposed structures and systems deal with the information processing, communication, and conflict management requirements necessitated by an integration strategy. Ideally, the solution will draw on established theoretical perspectives in support of its propositions.

If the case is used to generate a discussion of integrating multiple and diverse perspectives, a solution will propose the basic elements of decision making, structure, leadership, culture, and human resources practice (conflict management) that will facilitate the integration and leveraging (not squelching) of diverse perspectives. Such a solution will demonstrate how a particular structural mechanism (dual hierarchies) or leadership approach (leadership by negotiation rather than mandate) allows individuals representing different viewpoints to combine their insights in novel and organizationally beneficial ways. Once again, the solution will draw on existing theory as appropriate.

Finally, if the case is used to discuss strategies of vertical integration, a solution will state whether Midwest's strategy of vertical integration is or is not a viable strategy. This conclusion will be supported by data from the case and (ideally) by existing theoretical perspectives. An exercise that compares the costs of ownership with the costs of transacting on the market is an example of the kind of analysis that would support a conclusion regarding Midwest's vertical integration strategy.

STRENGTHS/WEAKNESSES AND OPPORTUNITIES/THREATS

A summary of Midwest Medical Group's internal strengths and weaknesses and external opportunities and threats is provided below.

Strengths

- 1. Midwest is a fully integrated health network.
- 2. Midwest is financially sound.
- 3. It is the largest health care system in the Twin Cities.
- 4. MMG's dual physician-management structure.
- 5. Only 25 percent of MMG physicians were specialists.
- 6. MMG's emphasis on care management.
- 7. Focus on local health care needs.

Opportunities

- 1. Twin Cities market had wide acceptance of managed care.
- 2. Business Health Care Action Group is powerful and can award a great deal of business.
- 3. MinnesotaCare is innovative health care for the poor.
- 4. Improved, consistent quality of care through practice outcomes.
- 5. The low cost producer has a competitive advantage.

STRATEGIC ALTERNATIVES

- Weaknesses
- 1. MMG is comprised of 50 clinics, 475 employee providers, and 5,700 affiliated physicians.
- 2. A "melting pot" of organizational backgrounds.
- 3. MMG's dual management structure.
- 4. MMG has operated at a loss since its inception.
- 5. MMG's contribution to the bottom line is not easily identified.

Threats

- 1. Physicians who see themselves as employees and provide minimal effort (poor organizational citizens).
- 2. Health care reform.
- 3. "Cookbook medicine" will emphasize the bottom line rather than individual needs for care.
- 4. Antitrust violation applied to health care.
- 5. Competition from private practices that are more patient friendly.
- 1. Market development, horizontal integration acquire additional practices.
- 2. Retrenchment combine divisions.

- 3. Divestiture sell off the division.
- 4. Value adding support strategy further develop organizational structure to reflect the realities of vertical integration.
- 5. Value adding support strategy further develop organizational culture to integrate individuals and groups from a variety of professional and organizational backgrounds.

QUESTIONS FOR CLASS DISCUSSION

1. What organizational structures and systems can Midwest and the MMG develop in order to operationalize their strategy of a fully integrated health care delivery system?

There are organizational complexities associated with a strategy of vertical integration. The case provides an opportunity for students to become acquainted with these complexities at two levels: (1) the corporate level (Midwest) and (2) the strategic business unit level (MMG). Students should be invited to apply theories and frameworks from organizational theory and design.

- Structural Contingency Theory: Configurational or "fit" theories of organization typically assume a correspondence between organizational strategy, structure, and environment (Thompson, 1967; Drazin and Van de Ven, 1985; Doty, Glick, and Huber, 1993). Midwest is attempting to integrate three different activities -- primary care, tertiary care, and health care coverage -- in order to achieve a strategy of health care integration. The current organizational structure consists of three separate divisions or groups, one for each of these three activities. Separation of these three activities does not appear to "fit" a strategy of integration. Integration might be better achieved by organizing around consumers rather than around activities. For example, groups of doctors, hospital personnel, and health plan people could be created to serve particular consumer groups or geographic areas.
- Information Processing Theory: The relationship between the three Midwest . groups or divisions can best be characterized as reciprocal interdependence; that is, the outputs from one group become the inputs for another and vice versa (see Thompson, 1967). For example, after an initial examination, an MMG physician might prescribe a complex diagnostic procedure to be performed at an Midwest hospital. The output from the diagnostic procedure is then sent back to the physician who may use the information to decide whether to admit the patient to the hospital for treatment. Information processing theory suggests that reciprocal interdependence requires a high degree of information transfer and that this transfer is best facilitated by multifunctional groups or liaison/integrator roles (see Galbraith, 1977; Daft and Lenge, 1986). Relationships between the three Midwest groups could be improved through the implementation of these types of mechanisms. For example, hospital personnel, primary care doctors, and health plan people could be assigned to work together to address some specific community need (e.g., elderly care).

- Resource Dependence Theory: Resource dependence theory suggests that organizations are interdependent with their environments and that organization structure and strategy is driven by an organization's need to gain access to resources in the environment (Pfeffer and Salancik, 1978). This perspective is useful in helping us to see why there is such a diversity of internal and external relationships between and among the different Midwest divisions and why these relationships are often both cooperative and competitive. Because Midwest is not a closed system, each Midwest group has a set of non-Midwest organizations that control resources critical for its survival. This fact has resulted in a complex network of cooperative and competitive relationships between each Midwest division and other groups both internal and external to Midwest (see Bunderson, Dirks, Van de Ven, and Garud, 1995 for a discussion of cooperative/competitive organizational network). For example, the health plan needs to have strong relationships with Midwest-affiliated providers. At the same time, the medical group (MMG) needs to compete with Midwest-affiliated providers for payor resources (contracts). In other words, Midwest (composed of the MMG and the health plan) is rewarded for both cooperative and competitive relationships with the same organization (affiliated providers). This web of dependent and interdependent relationships helps to explain why an action in the best interest of one Midwest division may not be in the best interest of another.
- 2. How can organizations be designed to leverage organizational pluralism without disintegrating from the conflict that multiple perspectives can generate?

There are challenges associated with an attempt to integrate individuals and groups from a variety of professional and organizational backgrounds. The merger that formed Midwest in 1994 brought together individuals and groups with very different organizational backgrounds – hospital systems, a health plan organization, clinics, professional orientations – physicians, professional managers, and ideas about the appropriate drivers for organization and management in health care – market-driven, system-driven, physician-driven, community-driven. Midwest's efforts to understand and manage this diversity present an excellent opportunity for students to consider the organizational and leadership challenges presented by organizational pluralism.

• Professions and Organizations: The literature dealing with professionals in organizations can be used to help understand why professionals (such as physicians) often make poor organizational citizens (Van Maanen and Barley, 1984; Wallace, 1995; Abbott, 1988). This literature suggests that whereas professionals value communities of autonomy and self-direction, organizations often seek to establish control and reduce intra-system variance through system-wide practices and policies. These different aims help to explain why professionals often resist organizational efforts to impose system-wide policies and procedures and why organizations often feel threatened by physician self-direction. The MMG's efforts to establish system-wide guidelines for clinical practice (described in the case) is a good example of this tension.

- Midwest Survey Results: A questionnaire survey was conducted during November and December 1995, to which 125 physicians and 130 managers of Midwest responded. Two findings from this survey provide promising ideas for physician-system integration. First, the study found that although physicians are more committed to their profession, and managers are more committed to their organizations, individuals' commitments to their organization and profession are viewed in a complementary way by Midwest managers and physicians. Second, the four modes that drive Midwest (system, market, physician, and community) are positively correlated and should all be integrated.
- Agency Theory: Agency theory focuses on relationships where one party (the principal) delegates work to another party (the agent) and seeks to resolve problems that arise when principles and agents have conflicting interests/attitudes (Eisenhardt, 1989). The relationship between physicians and MMG managers is an example. When the MMG acquires a private practice, the role of an acquired physician changes from principal (part owner) to agent (organizational employee). This change restructures the risks and incentives for physicians and (often) results in lowered productivity (Grossman and Hart, 1986). The attempt by MMG managers to develop compensation systems that more directly reward physicians for extra effort is consistent with agency theory's prediction that principals will seek to develop contracts that reduce shirking and opportunism by agents.
- 3. Is a strategy of vertical integration viable in an industry where economies of scale are negligible and long-term, cooperative relationships with competitors are critical?

This case provides an opportunity to evaluate an organization's attempt to engage in a strategy of vertical integration in a highly networked, service industry (health care). Students can use the issues, examples, and illustrations provided in the case to help them wrestle with the two points of view.

Many people at Midwest view complete ownership (vertical integration) as the best means of accomplishing Midwest's strategy of integrated health care. Nevertheless, integration through ownership is not the only option. More and more organizations are seeking to streamline their operations by entering into "value chain alliances" (Lawrence and Gulati, 1995) wherein pieces of the value chain are performed by outside parties with whom the organization has a long-term relationship (Powell and Smith-Doerr, 1994; Jarillo, 1988). It may be that Midwest could achieve its objective of integrated health care delivery through a strategy of "virtual integration" by entering into networks of relationships with various health care players (e.g., individual group practices). As mentioned above, a "virtual integration' approach would help to reduce the costs that Midwest incurs through the direct ownership of clinics and providers.

Transaction cost economics suggests that organizations will vertically integrate as long as the cost of ownership is lower than the cost of transacting on the market (Williamson, 1979).

4. Can accountability for all facets of health care delivery be achieved without fully-integrated health delivery organizations?

Yes, but it requires great effort and focus on satisfying the customer. In addition, malpractice issues have to be resolved (perhaps though federal tort reform) to achieve seamless care. In today's environment, those issues seem insurmountable without full integration.

5. Which of the four models – system driven, market driven, physician driven, or community driven – should Midwest use?

Four different models of organization are discussed in the case that appear to drive the Midwest Health System: system, market, physician, and community. The Midwest survey found that these four different models of organization are positively (not negatively) correlated. This is true for what respondents perceived Midwest's culture to be now and what it should be in the future. As expected, physicians' ratings of physician- and community-driven models of organization are strongly positively correlated with job satisfaction, organizational commitment, and not thinking of quitting, whereas their ratings of the system- and market-driven models were uncorrelated with these factors. However, these factors were significantly correlated with all four models of organization for managers in MMG and other groups of the Midwest Health System.

These findings indicate that there is no zero-sum contest over the four different drivers of the Midwest organization; they are all positively correlated. Physicians have a more concentrated focus on the physician and community models of organization, whereas managers have a more diffuse focus on all four models. The perspective of the political scientist, James Q. Wilson, may be helpful to diagnose these findings. He argued that those with concentrated benefits or losses tend to mobilize power and political campaigns more effectively than those with diffuse benefits and costs. Wilson's argument suggests the need for Midwest managers to think about ways to concentrate benefits and potential costs of the four drivers of the Midwest organization, instead of treating them as loosely coupled diverse interests in Midwest. The creative challenge is to concentrate the four views without eroding or squelching any one of them. The survey results show all four models of organization are positively correlated with one another, and each is related to increased job satisfaction, unit effectiveness, and commitment to the organization and profession for both Midwest physicians and mangers.

6. What costs and benefits does MMG offer Midwest?

The following lists, based on facts derived from the case, suggest some of the costs that Midwest incurs by owning the MMG as well as some of the costs that it might incur if it did not own the MMG. A comparison of these two lists can be helpful in an evaluation of Midwest's vertical integration strategy.

Costs of Owning the Midwest Medical Group.

- Lower provider productivity because of the removal of ownership incentives.
- Inability to aggressively negotiate payor contracts because of Midwest affiliation.

- Costs of financing unprofitable but strategically important clinic acquisitions.
- Inability to compete with Midwest-affiliated providers because of Midwest membership.

Costs of Achieving Medical Group Cooperation Through Market Transactions

- Costs of negotiating and enforcing contracts with various group practices.
- Costs of losing referral base due to competitor acquisitions.
- Increased costs as tests are repeated to protect against malpractice (defensive medicine).
- Possible lost opportunity to create a single point of accountability for health improvement.

In comparing and discussing these two lists, it should be noted that many of these costs could be influenced by variables other than ownership/non-ownership. For example, long-term, mutually beneficial relationships with providers can reduce the costs associated with market transactions.

REFERENCES

A. Abbot, "The System of Professions: An Essay on the Division of Expert Labor," (Chicago: University of Chicago Press, 1988).

J. S. Bunderson, K. Dirks, A. H. Van de Ven, and R. Garud, "Spinning a Web of Relationships between Organizations," Discussion Paper #212 (March 1995), Strategic Management Research Center, University of Minnesota.

R. L. Daft, and R. H. Lengel, "Organizational Information Requirements, Media Richness, and Structural Design," *Management Science* 32, no. 5 (1986).

D. H. Doty, W. H. Glick, and G. P Huber, "Fit, Equifinality, and Organizational Effectiveness: A Test of Two Configurational Theories," *Academy of Management Journal* 36, no. 6 (1993), pp. 1196-1250.

R. Drazin and A. H. Van de Ven, "Alternative Forms of Fit in Contingency Theory," *Administrative Science Quarterly* 30 (1985), pp. 514-539.

K M. Eisenhardt, "Agency Theory: An Assessment and Review," *Academy of Management Review* 14, no. 2 (1989), pp. 57-74.

J. R. Galbraith, Organization Design (Reading, Massachusetts: Addison-Wesley, 1977).

S. J. Grossman and O. D. Hart, "The Costs and Benefits of Ownership: A Theory of Vertical and Lateral Integration," *Journal of Political Economy* 94 (1986), pp. 691-719.

J. C. Jarillo, "On Strategic Networks," *Strategic Management Journal* 9 (1988), pp. 31-41.

P. Lawrence and R. Gulati, "Organizing Value Chain Alliances: The Case for Strategic Alliances and Against Vertical Integration," Working Paper (Harvard University, 1995).

J. Pfeffer and G. R. Salancik, *The External Control of Organizations: A Resource Dependence Perspective* (New York: Harper & Row, 1978).

W. Powell and Smith-Doerr, "Networks and Economic Life," In Smelser and Swedberg (Eds.) *Handbook of Economic Sociology* (Princeton, New Jersey: Princeton University Press, 1994).

J. D. Thompson, Organizations in Action (New York: McGraw Hill, 1967).

J. Van Maanen and S. R. Barley, "Occupational Communities, Culture and Control in Organizations," In B.B. Staw and L.L. Cummings (Eds.) *Research in Organizational Behavior* (Greenwich, Connecticut: JAI Press, 1984).

J. E. Wallace, "Organizational and Professional Commitment in Professional and Nonprofessional Organizations," *Administrative Science Quarterly* 40 (1995), pp. 228-255.

O. E. Williamson, "Transaction-cost Economics: The Governance of Contractural Relations," *The Journal of Law and Economics* 22, no. 2 (1979), pp. 233-261.