“Introducing Telemedicine as a Strategic Intent”

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**Abstract**

In many settings, the introduction of new technologies has failed. In the healthcare industry, the implementation of telemedicine—which uses technology in ways that revolutionize the delivery process of healthcare—has failed more often than not. Reasons abound, but one of the most critical features when introducing a technology or process that will profoundly alter an organization is that the technology or process be implemented as a strategic intent. Deliberate, championed and strongly led from the top, not from within a single department or functional area.

1. Introduction

Change surrounds us. And things are changing at an ever-increasing rate. The questions, then, are to what degree will the change manage us and to what degree will we manage it? To successful in business, we hope that we can manage the change that invades every aspect of our lives.

In order to manage such change, we need to understand the nature of change. Changes can be viewed on a continuum—one that ranges from a paradigm shift (re-engineering) to kaizen (constant improvement). A paradigm shift will affect an organization’s core, its fiber, its essence. Kaizen, on the other hand, will change a single or a few elements of a person’s job or will affect a limited number of people within an organization. It is the paradigm shift with which we concern ourselves here. The phrase paradigm shift has been used more than most of us like to remember— it seems so 90s, so cliché. However, paradigm shift is the most relevant word to describe what needs to happen within an organization when a new technology, for example, is introduced that will affect the organization’s core. Its fundamental models or patterns (paradigms) of doing business will have to change.

Paradigm shifts have occurred throughout the world of business. Work flow, Inventory, Delivery scheduling, Personnel (re)location. (Lieber, 123) [5] These and other aspects of business have recently been dramatically altered as technology, transportation, economics and perspectives on employee relationships have changed. But not only have these changed within the American economy, they have changed world-wide. Globalization has blasted open a vault of information, access, networking and availability that has not been possible or, at least, viable before the recent past.

The world is changing so quickly and has changed so much that to operate within old paradigms is dangerous for businesses. Even to do new things in line with old processes is not productive. Businesses that do not adapt with forethought and strategy will see their very existence threatened.

2. Introducing Telemedicine

It is within this rapidly changing global context that the healthcare industry finds itself poised. Growing technological advances have paved the way for a striking new player in the delivery of healthcare: telemedicine. Telemedicine is a revolutionary means of providing healthcare to remote and underserved populations. Telemedicine works symbiotically within the growing globalization. It simultaneously thrives within and enables the globalization. While the dialectical relationship within the globalization of healthcare evolves, it is the basic nature of telemedicine that will forge a paradigm shift within the healthcare industry.

The introduction of telemedicine reflects the continuum of change: paradigm shift to kaizen. The paradigm shift is...
the use of store-and-forward technology to transmit patient case information from a primary care physician (PCP) to a specialty care physician (SCP) and the transmission of the SCPs diagnosis and treatment protocol back to the PCP for treatment administration. This is a paradigm shift because it affects the entire process of providing healthcare to a patient: record keeping and maintenance, the patient trajectory, the locus of decision-making, the communication patterns within an organization and among organizations, and the medical outcomes. On the other hand, kaiZen would be reflected if the lab started faxing test results to the requesting physician rather than telephoning the results or sending them via courier. A change such as this demonstrates an incremental (although important) change and will have a limited scope of impact.

3. Deliberate and Emergent Strategies

One problem with strategy within large organizations is that organizations often compartmentalize the thinking and the doing. Usually, those who do the work are far removed from those who make plans - this, at best, complicates strategy. More often, plans are thwarted either intentionally or unintentionally because of this lack of connection between the decision-makers and the implementers.

To be successful, strategy should be a dialectic of sorts, a dynamic iteration or interaction between planned ideas and emergent ones. Following only planned ideas can blind one from possibilities along the way (myopia); on the other hand, trying to follow only emergent ideas puts one at the mercy of one’s environment.

Strategy must be managed; it isn’t simply about introducing change. It involves moving the organization along in the strategies and toward the goals it has established. Strategic thinking calls for knowing when not to implement or encourage change as much it calls for knowing when to promote change.

Good strategy is a melding of deliberate (intentional, planned for) and emergent (arise along the way, discovered) notions. This combination is reflected in Mintzberg’s description of crafting strategy. Crafting implies skill, dedication, mastery, involvement, understanding. Mintzberg, 1987) [6] As an example, the introduction of telemedicine can be viewed as a combination of deliberate and emergent notions. The deliberate notion can be seen in store-and-forward technology; the store-and-forward technology will impact a healthcare organization to its core and such an introduction (and its impacts) will have to be planned for and calculated. The emergent notion is reflected in faxing results from the lab to a physician. In the midst of change, a lab technician discovers that faxing the lab results serves two purposes: it is faster than sending them via courier and fewer misunderstandings occur than with phone calls because a physician’s office sees the written report.

Seeing future plans and past patterns and having a keen sense of what’s going on and adapting as they go along are abilities that are essential for managers. Managers must be able to recognize the changes and the inconsistencies that really matter. They must know the industry that they’re involved in - inside and out. They should develop an organizational context in which many strategies can thrive, but be able to recognize strategies or patterns that threaten the organization. Change and continuity must be carefully balanced. Always trying to change is as dangerous as never wanting to change.

The process of reaching the organization’s vision should be an iterative one among groups of managers that develops strategic intent, considers human resources consequences, and evaluates the alignment of future strategic intents with current human resources. In addition, it is necessary to specify the elements in the setting that will promote and hinder change, as well as to project their likely consequences.

4. As a New Technology, Telemedicine Is Integral to an Organization’s Functioning

Information Technology (IT) is only helpful if it enables people to do their work “better and differently” (Davenport, 73) [1]. Telemedicine is one type of IT. First consider, will it help them do their jobs? Assuming ‘yes,’ what is the best way in which to implement it?

Technology is a tool for doing work. However, if people are not trained properly and the impacted work processes are not radically changed, work will be encumbered and people frustrated. When people cannot work more efficiently or as efficiently as before the introduction of the new technology because old business processes hinder the functioning of the technological advancements, the technology is assumed to be the problem. In actuality—in more cases than not, the technology is appropriate but its utility is constrained by old processes. Expecting new technology to function at its peak within old business processes is similar to expecting a 747 airliner to take off and land on a small, grassy field; the grassy field (older context/environment) is appropriate for a prop plane (older generation technology), but a 747 (newer generation technology) needs the improved contact surface and space provided by a long, paved runway (newer context/environment). Business processes are the contexts within which people and technology must function together; in order for people and technology to function best, the context must be adapted or completely revamped to fit the new technology.

To capture the power of IT, organizations must employ both forms of change: re-engineering and kaiZen. Kaizen is the easier type of change since it is a constant improvement of existing processes and causes minimal disturbances to the context. Re-engineering calls for new processes to match the new technologies and products. A dramatic and decisive redesign of business processes - how things are done - is critical for companies to achieve the
results that their leaders envisage. To effectively communicate and implement the re-engineering in a way that will embrace the power of telemedicine, the new processes must be a strategic intent of the entire organization, not simply an initiative of the Chief Information Officer (CIO).

Strategic intent indicates something that the organization—with current capabilities, financial resources and personnel—cannot do at the current time. A strong strategic intent includes routes/objectives (“direction”) - where; learning/exploration (“discovery”) - how; and accomplishing/worth/value (“destiny”) - why (Hamel and Prahalad, 129) [3]. A strategic intent opens an expansive territory for what an organization may become.

Because of this, employees at all levels must understand their importance in the short and long-term elements of the strategic intent. This is the difference between a data entry operator’s entering data in a computer program because they have to be entered and that operator’s realizing that entering the data makes the data available to be analyzed at other levels and, therefore, his/her work is important to decision-making at many levels (Hamel and Prahalad, 136) [3].

Radical changes from the top imply the need for radical changes at all levels. Strategic intent is a two-fold plan. While top management decides and ‘enforces’ the strategic intent, it must support the intent at all levels of the organization. This support means promoting systems, processes, etc. at all levels that will allow people at all levels of the organization to do their work in such a way that will move them and the organization toward the strategic intent. They will have to sell the strategic intent; it is a deliberate strategy.

One cause of a gap between idea and implementation is that mission statements are usually created at one level (high), implemented at another (middle) and worked out in another (low). Elements of a mission statement concern the customer and the product or service, including how the product (service) is delivered and its uniqueness. This disjointed procedure reveals the complex interaction of variables and relationships involved in each element of the mission statement. Those who create a new mission statement often do so without input from those who must implement and carry it out. Questions concerning viability rise, but only after the new mission statement has been made and handed down. Resentment (voiced or unvoiced) over not being involved in decision-making simmers. Communicating and championing the strategic intent must be done when telemedicine is introduced because telemedicine affects each element of the mission statement.

There are intermediate steps between the state of the present the strategic intent of the future. Each step should be achievable yet challenge employees to do more than they thought possible and point toward the strategic intent. Hand-in-hand with these expectations placed on employees, appropriate guidelines and skills training must be provided by the organization so that the employees may excel.

5. Introducing Telemedicine Will Change All Functional Strategies

The question is how to develop relationships with the people who will implement and carry out the new policies in a way that demonstrates concern and interest so that a foundation of cooperation may be built rather than one of animosity and distrust. Gratton (1994) [2] offers several ways to do this:

1. Keep the long-term and the short-term concerns of the strategic intent in proper perspective. Long-term directions must be supported by short-term decisions and interim objectives. There are short-term priorities and problems, but addressing them must not obscure appropriate long-term directions or cause an organization to detour from them.

2. Evaluate and prioritize alternatives for functional areas. Typical functional areas are finance, patient care, medical services, logistics and human resources. A myriad of alternatives exists in each area. For example, in the human resources systems area, hiring, rewards, promotions, testing and promotion systems must be considered. These systems should be assessed in relation to the overall goals of the organization.

3. Reconcile functional processes and outcomes. The functional systems chosen must support the personnel, the culture and the structures in ways that are aligned with the overall corporate mission and strategic intents.

4. Develop cooperation of managers. Eliciting the cooperation of managers begins with helping them understand and believe in the new mission and processes. Their shared understanding and belief provides a foundation for their developing (when appropriate) and carrying out the procedures that buttress the new strategic intent and its resultant processes.

Re-engineering must done in an all or none manner. It is organizationally self-defeating to introduce a new strategic intent and not change objectives, tasks, procedures and relationships that will facilitate that statement. Re-engineering is redesigning not just automating: this means structures, environment, and processes, as well as procedures and expectations, should be rerafted.

To accomplish this, a close analysis of each job needs to be done: what is done in that job, what that job should be accomplishing; and whether those accomplishments can be met with structures and processes as they are?
The orientation is that, regardless of the kind of organization, the introduction of telemedicine and its effects at all levels must be considered. Telemedicine is expected to impact all areas of an organization and has the potential to impact major aspects of everyone’s job. With this expectation in mind, managers must be willing to do analysis and have analysis done at all levels (including their own) to see how structures, processes and procedures need to be changed and preparations made at all of these levels in order for the people in those jobs to be affected optimally, so that they are enabled to perform their jobs better and more efficiently.

References


