Making a Case for Organizational Change in Patient Safety Initiatives

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Abstract

Objectives: Widespread organizational change is indispensable for significantly improved patient safety. This paper discusses critical issues in effective change management, drawing attention to the unintended consequences of pursuing patient safety without effective change management. It includes pointers from organizational change literature on critical issues in managing change, such as how change is defined, what the roles are of different participants, and how change is implemented and made self-sustaining. We make some preliminary observations about mismanaged change processes in patient safety initiatives.
Conclusions: The challenge of patient safety is not only clinical, but also organizational. To succeed, patient safety initiatives must be designed and executed using change management principles such as congruent changes targeting multiple components, specific change management roles for different participants in the care-delivery process, implementation through dedicated support structures and multiple tactics, and institutionalization through enhanced workforce capabilities and opportunities for continuous learning. The costs of mismanaging change go beyond the failure of patient safety initiatives—they include hardened employee skepticism toward calls for increased patient safety.

Introduction

The challenge of patient safety is inextricably linked, almost indistinguishable, from the challenge of organizational change. Patient safety efforts have as their primary goal the avoidance, prevention, and mitigation of patient harm caused by deficiencies in the processes of patient care delivery.[1, 2] Such deficiencies arise naturally in today's health care system, where care delivery processes involve numerous interfaces and patient handoffs among multiple health care practitioners with varying levels of educational and occupational training. These complex processes, themselves vulnerable to errors, are overlaid on a health care culture that emphasizes individual accountability, reinforces professional silos, and discourages consistent collaboration. Inevitably, remedying the unsafe conditions fostered in this context will require widespread organizational change at the point of care. Patient safety initiatives can succeed only to the extent to which health care organizations recognize the need for and develop the means to implement the necessary organizational changes.

The situation in health care is reminiscent of that faced by manufacturing industries in the 1980s when competitive pressures demanded significant improvements in product quality. Typically, firms responded first by focusing

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exclusively on improving the technological features of the manufacturing process. But as the hoped-for improvements in product quality continued to remain elusive, these firms were compelled to undertake radical changes in their organizational structures and processes.[3] Their experiences with the difficult transition from "managing by imposing control" to "managing by eliciting commitment" provide the empirical basis for a growing body of research on organizational change and development.[4–6]

This paper draws selectively from this literature, as well as the authors' observations of 40 hospitals in southwestern Pennsylvania, to highlight change management issues critical for the sustained success of patient safety initiatives. We present an organizational model to frame the fundamental choices and principles involved in managing such change. We then provide preliminary observations about how health care organizations approach these choices and discuss some early signs of unintended costs of mismanaging change. We conclude with implications for health care organizations seeking to achieve durable, organization-wide improvements in patient safety.

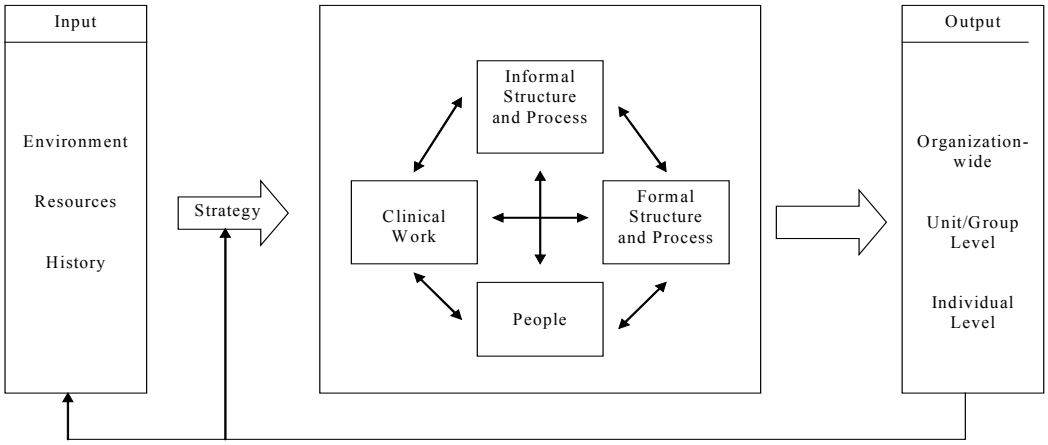
Our primary goals are to draw the attention of patient safety specialists to organizational issues surrounding patient safety and to increase awareness about the literature on organizational change. Although the discussion that follows is informed by previous research, it is not intended to serve as a comprehensive literature review. Readers are encouraged to refer to works cited in this paper for additional information on organizational change management.

Patient safety through the looking glass of organizational change

To discuss the organizational issues relevant to improving patient safety, we use a conceptual framework proposed by Nadler and Tushman[4] (see Figure 1). Essentially, an organization is a complex system that—given a set of limited resources, an external environment, and history—develops a strategy to convert inputs to outputs. The conversion process relies on four different components: work; people; formal structures and processes; and informal structures and processes. To the extent that these components are aligned (or "congruent") internally and with the strategy, the organization can perform effectively and produce quality outcomes. The lack of congruence leads to failure in achieving the desired goals.

For health care organizations, the inputs that shape the strategy include the external environment (e.g., regulatory oversight, malpractice environment, media), availability of resources (e.g., financial, skilled care providers), and history (e.g., experience with adverse patient outcomes). In response, the organization develops a strategy to achieve specific outcomes (e.g., increased revenues, lower costs, improved quality of care). Furthermore, these outcomes

Figure 1. Organizational framework (Nadler and Tushman[4])



may be specified at different levels (e.g., organization-wide, specific departments, or specific processes). The strategy is implemented through configurations of organizational components consisting of work (the clinical domain, comprising technology, procedures, practices, and guidelines), people (multiple occupational groups with appropriate values, attitudes, and skills), formal structures and processes (division of labor into departments, coordination mechanisms such as committees, and communication among different care providers), and informal structures and processes (culture, including shared assumptions and values, informal communication, etc.).

Within this framework, organizational change occurs as a planned response to a defined set of pressures or forces.[6] The literature on organizational change and development identifies a set of basic choices that an organization confronts in managing this change: (1) How is the change defined? (2) Who participates in the change process and how? (3) How is change implemented? (4) How is change institutionalized (i.e., made self-sustaining)? We explore each of these choices in greater detail below.

How is the change defined?

An important early choice confronting an organization is whether in responding to increased environmental pressure for better performance—such as that arising from the Institute of Medicine's report[1]—it should initiate change in a few or many of its components. Depending on the degree to which the response reshapes and reconfigures the different components, change can take a variety of forms. A simple response may be "to do better than or do more of what already exists." Typically, such "incremental change" or "tuning" can be implemented without altering any of the organizational components. A more complex response may require a radical redefinition of an organization's mission, competencies, and culture. Invariably, such "transformational change" or "reorientation" calls for changes in multiple organizational components and their congruence.

Systemwide improvements in patient safety are possible only if there are coordinated changes in multiple components—clinical procedures, attitudes and behaviors of care providers, incentive systems, coordination structures and processes, patterns of interactions among care providers, and organizational culture. Change efforts that target only a few organizational components will not be adequate; neither will multiple changes that are unrelated.

For example, in response to the need for significantly improved patient safety, a health care organization might develop a strategy to create a learning organization where participants in the delivery process engage in continuous learning. Implementing this strategy will require several changes: redesigning work processes to make errors more visible; providing incentives for practitioners to share information about errors; creating an informal context where practitioners feel psychologically safe about discussing their errors and seeking help from one another; and setting up information systems that facilitate information storage, retrieval, and analysis. In this sense, the challenge of patient safety is as much organizational as it is clinical.

It must be noted that there may be no one strategy or one configuration of organizational components that constitutes an effective response. Differences in the idiosyncratic histories and experiences of organizations would suggest that different responses to the same set of pressures may be comparably effective.

Who participates in the change process and how?

Effective implementation of reorientation requires different organizational groups to play distinct roles in the change management process. To begin with, an organization's senior leadership—medical as well as administrative—must play an active, visible role in initiating change, including articulating a vision of what the organization wants to become in the future. Second, senior management must energize the change process. This is particularly difficult when the change is anticipatory, since the rationale for change may not be self-evident or immediately compelling. Third, the chief executive officer (CEO) must establish a guiding coalition for change that includes senior administrators, clinicians, and opinion leaders from across the organization whose support is critical for the initiative's success.[5] Fourth, the CEO, together with the guiding coalition, must create dissatisfaction with the status quo and impart a sense of "urgency" about the proposed change.[7, 8] Other people involved directly in the care delivery process must participate actively in implementing change locally.[9]

Fulfilling these roles can be particularly challenging in a hospital context, where the tendency to conduct "business as usual" is deeply entrenched. The inertia of the status quo is reinforced by several factors. First, senior physicians are often far removed from the routine processes of patient care delivery and may be unaware of the extent to which patients are exposed to errors. Second, many clinicians view only those errors that cause serious harm as a significant threat to patient safety; and since such events may happen infrequently, clinicians may not completely understand or generally accept the need for transformational change. Third, many medical staff members may view some of the proposed changes,

such as increasing interactions with nurses, as inappropriate or unnecessary for improving patient safety.

To overcome these barriers, the CEO and the guiding coalition must create situations that shatter the assumptions underlying these viewpoints. For instance, information on near misses could be presented regularly to the medical staff, or medical staff could be required to directly observe patient care processes. Such firsthand encounters with process flaws are particularly useful for getting people to revise their assumptions. Another way to build momentum for change is for the CEO and members of the guiding coalition to participate visibly in the change process. Such action sends a powerful message across the organization that progress on the initiative is important and is being monitored on a daily basis. Their active, visible participation also helps to "model" desired changes in behaviors (e.g., senior medical staff discussing their own errors and admitting their fallibility).[10]

How is change implemented?

Admittedly, implementing change is a complex undertaking. But at least two basic features associated with successful change are noteworthy: (a) implementing large-scale change calls for dedicated support structures; and (b) the likelihood of successful implementation of even a simple change increases significantly if multiple tactics, rather than a few tactics, are used.

The first requirement is to create a set of supporting structures that will enable widespread change implementation. These may include a temporary organizational group that works full time on implementation; a pilot test site to try out some of the proposed changes; new communication channels for disseminating information about the proposed changes; and innovative training programs or employee visits to organizations that exemplify best practices suggested by the proposed change, among others.

Implementing even a simple change in one of the organizational components requires multiple tactics. For example, promoting voluntary reporting may be one change in a system of changes comprising a patient safety initiative. Successful implementation of this change will require a coherent set of multiple tactics, such as active participation of members of the guiding coalition in the supporting structures set up to implement change; more frequent review of medication error reports by hospital administrators and senior medical staff (e.g., from monthly to weekly to daily); facilitating reporting through the use of an Intranet-based reporting system in lieu of other more tedious and time-consuming systems; encouraging conversations about medication errors among physicians, nurses, and pharmacists; or creating opportunities for health care workers across silos to resolve problems related to medication errors in a collaborative fashion. Although each tactic alone may be inadequate to produce the required change, with many "bullets" directed at the same target, the likelihood of successful implementation increases.[4]

How is change institutionalized?

Even if change is implemented successfully, there is always the risk that the organization may revert to earlier behaviors. This could happen because the organization may no longer be able to afford the resources that were allocated to initiating the change, the organization may face new pressures diverting senior leaders' attention, or there may be turnover among key employees. The purpose of institutionalization is to develop organizational capabilities so that the change becomes a robust feature of the organizational context.[6]

Institutionalizing change requires a formal, long-term plan that coherently integrates multiple interrelated strategies. The first is the commitment of the CEO and senior staff to protect the initiative from competing priorities, so that even if financial pressures are intensified, resources allocated for implementation are not scaled back.[11]

Second, the organization must introduce structural changes that reinforce the change. For instance, improved interactions among health care workers might require new team structures that include physicians, nurses, pharmacists, and dieticians in joint review of cases on a daily basis. Such changes will ensure that the continuation of improved interactions is not left to chance or choice.

Third, employees' roles must be redesigned to match the new organizational realities.[12] To succeed in promoting patient safety, reorientation must result in a new congruence among organizational components that promotes continuous improvement at the point of care, such that improving care for patients becomes inseparable from identifying and solving problems in the process of delivering that care. Employees at the point of care must acquire the capabilities to analyze errors locally and implement appropriate solutions. Not only will this require additional employee training, but also a redefinition of job roles at the point of care. This is especially important because continued employee involvement depends critically on the extent to which staff view the change as helping them solve the problems they face in their daily work.[9]

Fourth, organizations must adapt to emerging and often unexpected demands, including new problems that may arise as the result of successful change implementation. For instance, success in increasing reporting may require a new organizational focus on how to solve the problems associated with the errors that are reported.

Fifth, and perhaps most important, organizational leaders must continuously monitor the ongoing change process. Frequent employee surveys and administrative "walk-arounds" are some means by which senior leaders may keep track of the sustainability of change.

To summarize, the effective management of change that is necessary for improved patient safety depends on how health care organizations address the set of interrelated choices about how change is defined, who participates in the change process and how—how change is implemented and how change is

institutionalized. In particular, it depends on whether these choices are consistent with the general change management principles discussed above.

Observations about change management processes in patient safety initiatives

Over the past 3 years, we have observed the efforts of 40 hospitals to implement different patient safety initiatives, including regionwide reporting, information sharing, and problem-solving focused on medication errors and nosocomial infections. To assess the effectiveness of these efforts, we visited many of these hospitals, interviewed key informants, conducted focus groups, participated in major committee meetings, and reviewed internal documents. These activities permit us to make some preliminary observations about how these organizations deal with change management processes.

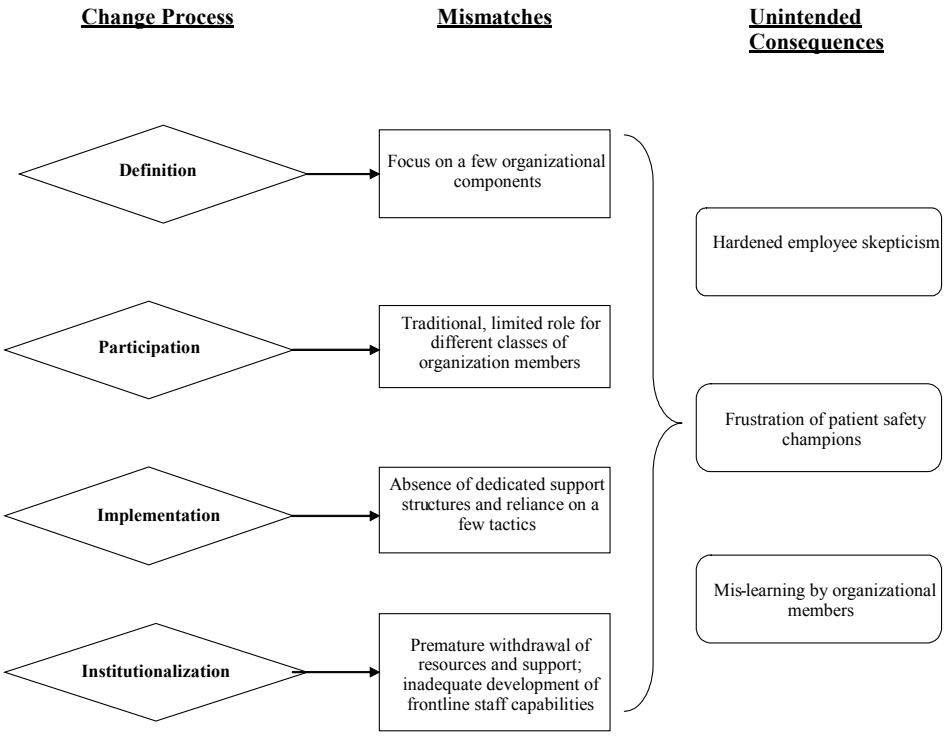
Overall, we observed serious mismatches between the organizational goal of improving patient safety and the change strategies hospitals have chosen to achieve this goal (Figure 2). These mismatches in turn have led to a number of unintended consequences that may affect the ability of organizations to achieve continuous improvements. What these organizations hope for are enduring, organization-wide improvements; but what they most often achieve are results that are local and temporary. The following comments represent situations that have been observed at more than one hospital and at more than one point over time.

Mismatches between patient safety goals and change strategies

Disconnect between how change is discussed and how it is actually defined. Many hospitals seem to recognize the need for multifaceted change for improving patient safety. Internal discussions in these hospitals consistently identify different requirements, including a better-integrated information technology, greater physician involvement, better communication between physicians and nurses, no-blame culture, etc. Yet when we examine what these hospitals actually do as they develop and implement specific patient safety initiatives, a major disconnect becomes evident. Only a few of these components are targeted by initiatives. Typically change efforts focus narrowly on a few organizational components, such as specific clinical practices or outcomes, and even these efforts are not consistent with one another.

Participation limited to a few people playing traditional roles. Generally speaking, patient safety initiatives appear to be initiated and implemented by a small group of people with formal responsibilities for patient safety-related issues (e.g., pharmacy director, vice president, risk management) and informal patient safety champions. Often this group has insufficient authority to tackle issues that cut across departmental boundaries. Although senior leaders express support of these efforts, they are often far removed from the change management process

Figure 2. Unintended consequences of mismanaged organizational change



and leave important choices about how change is defined and implemented to mid-level administrators. In many hospitals, there is little evidence that senior, influential representatives from the medical staff, nursing, pharmacy, and legal counsel work together as a guiding coalition.

Absence of dedicated support structures for implementing change. Many hospitals continue to rely on existing structures and mechanisms to implement patient safety initiatives, even when the goals are expressed in terms of significant organization-wide changes. Few attempts, if any, are made to redefine the current responsibilities of individuals and groups engaged in patient safety initiatives or to provide additional resources to support the implementation effort. Often hospitals rely on committees that are already in place, such as the pharmacy and therapeutic committees, to review progress on implementing the initiative, thereby causing the pace of implementation to be constrained by meeting schedules. We attended a few meetings of these committees and noted that the error-reporting initiative represents only one isolated item in an already-crowded agenda of quality and safety issues that are not addressed in an integrated fashion. To encourage health care workers to report medication errors, hospitals implement a few narrowly focused tactics—such as disseminating memos and newsletters, posting signs and notices, giving presentations at meetings, and simplifying the reporting form—which are also typically disconnected from one another.

Inability to sustain change. In many hospitals, significant increases in error reporting were observed during the first 12 months of the initiative, with subsequent declines in the rates of increase thereafter. Key informants from these hospitals have pointed to different reasons for the slowdown. A common theme, however, is that the initiative continues to depend significantly on a few individuals for sustaining its momentum, and therefore is continually vulnerable to additional work demands placed upon these individuals, such as preparing for licensure and accreditation reviews (e.g., by the Pennsylvania Department of Health or the Joint Commission on Accreditation of Healthcare Organizations).

Unintended consequences of mismatched change

One obvious result of such mismatches is a failure to achieve patient safety goals, a worrisome enough outcome. What is additionally troubling, however, is the potential for other, less obvious consequences that we observed.

Hardened employee skepticism about the organizational call for change. When change is defined in transformational terms, the expectations of employees are raised, and many want to participate enthusiastically in the proposed change. But when the implementation is characterized by inconsistencies, the process can lead to increased skepticism, not just toward the initiative at hand, but future initiatives as well. In some cases, we observed that hospital leaders espouse a blame-free culture, even as nurses who report errors continue to be "written up." Indeed, in many hospitals, the forms used for reporting errors continue to list "human performance deficit" as one likely cause, and "human performance deficit" remains among the most commonly identified causes of medication errors. Some nurses said they responded to the new initiative by reporting more errors, only to find that the same errors continued to occur, so they stopped reporting.

Inevitable frustration of patient safety champions. Across hospitals we identified a number of patient safety champions who have played an important catalytic role in initiating and implementing the error-reporting initiative. These physicians, nurses, and pharmacists participated actively in the new initiative from its inception. Our early observations and interviews indicated that they had high expectations and enthusiasm for the initiative. Two years into the effort, however, some of them expressed frustration with the scope of change, pace of progress, and lack of support from senior leaders. We observed several cases where patient safety champions were overwhelmed by poorly conceived and executed initiatives. In some cases they got "burned out" or dropped out of the program completely.

"Mis-learning" by organizational members. Mismanaged change can actually make patient safety worse. Take, for example, the previously described situation where nurses stopped reporting when the medication errors they uncovered were not corrected. In one hospital, these nurses went so far as to set up a "work-around" (e.g., a hotline to the pharmacy for reporting missing medication); they now call the pharmacy to obtain missing medication, rather than report these incidents as errors. This type of mis-learning, where workers

conclude that errors are a normal—even acceptable—part of delivering care, is perhaps one of the greatest dangers of patient safety initiatives that suffer from failed execution.[13]

Conclusions

In the years ahead, improving patient safety must continue to be a priority for health care organizations. As the preceding examples illustrate, better change management capabilities are not just desirable, they are necessary for achieving and sustaining patient safety improvements. If health care organizations are to transform their processes for delivering care to promote patient safety, the logic of organizational change must start to drive patient safety initiatives. Fortunately, well-documented cases of successful transformations across organizations in other industries provide a useful template for health care organizations preparing to initiate similar changes. Specific implications for health care organizations are as follows:

- **Change must consistently target multiple organizational components.** Organizational leaders must engage in solid diagnostic thinking before finalizing the response to change. In particular, they must avoid the reflexive response of viewing the problem as exclusively clinical or technological and simply trying harder, and become open to the need for more fundamental organizational change.
- **Participants in the delivery process must play distinct roles in managing change.** Senior leadership must play an active role in establishing patient safety as an important and urgent priority; building a coalition of powerful constituents, including senior administrators and medical staff; modeling the desired behaviors; devoting more time and resources to organizational development relevant to patient safety; and anticipating and resolving the inevitable problems that will arise. People involved directly in providing care must participate actively in implementing change.
- **Change must be implemented using support structures and multiple tactics integrated in a long-term plan.** Support structures dedicated to patient safety must guide a carefully designed system of tactics that are consistent with one another and aligned with the purpose of change.
- **Change must be institutionalized by providing health care workers with the capabilities and opportunities to engage in continuous safety improvement.** This will require redesigning the roles of health care workers at the point of care and retraining them to fulfill these roles.

Admittedly, the above is a formidable list of requirements. But few organizations have transformed themselves without following these principles. Ultimately, the critical difference between a health care organization that succeeds in dramatically improving patient safety and one that does not will come down to effective change management capabilities.

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