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Discourse and politics in Alberta's Health System: An analysis of mobile technology policy[☆]

Kari Krell¹

MacEwan University, Robbins Health Learning Centre, Rm 9-205A, 10700-104 Ave, Edmonton, Alberta, Canada T5J 4S2

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Abstract

Advances in technology are changing the way healthcare professionals communicate with peers and with patients. Although healthcare professionals are increasingly utilizing mobile health technologies to successfully support their practices, healthcare organizations are slow to embrace and support the use of mobile technologies in the provision of health services. This paper uses a case study to highlight how the adoption and use of mobile technologies in clinical practice is impacted when there is a paucity of clear policies to provide direction. The localized approach is limited in its generalizability but is useful to provide a deeper understanding of the roles organizational discourse and politics have in technology acceptance. By reframing the circumstances present in the case study and analyzing the underlying issues of power and discourse, the goal is to better understand barriers to HIT approval and diffusion within a health system.

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Introduction

Technology is changing the way healthcare professionals communicate with other healthcare practitioners and with their patients. Increasingly, healthcare professionals are using mobile health technologies to effectively and

efficiently support their health practices. Health information technology (HIT) is broadly defined as the exchange of health information in an electronic environment. A review of articles published from 2000 to the present, from health, technology, and social science databases (CINAHAL, Google Scholar, ProQuest and PubMed/Medline) support widespread adoption of HIT to improve the health of individuals and the performance of healthcare providers [1]. However, regardless of supportive research findings and the ubiquity of mobile devices, healthcare organizations have been slow to adopt and endorse HITs [2]. Though many studies have examined acceptance of HIT in organizations, there is little

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E-mail address: krellk@macewan.ca

¹Fax: +1 (780) 497 5720.

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attention focused on the influence of power and communication and the role these factors play in worker response to technological interventions in practice settings. This paper looks at the political, policy, and communication challenges faced when accepting and adopting mobile technologies in a clinical health setting.

Through the lens of French and Raven's [3] seminal work on power in relationships and Fairhurst and Putnam's [4] original framework on communication as constitutive of organization, the author illustrates how an agency's ambiguous mobile device policy, results from organizational power struggles and unclear communication. A historical account of the province's politics provides background to the policy and a case study of nursing students, instructors and preceptors experience in trying to use mobile phones in the clinical setting as part of the learning process provides real-life context. The aim is to generate greater understanding of the barriers to adoption, acceptance and use of new technologies in a large healthcare system.

Review of the literature

Health information technology (HIT)

The widespread proliferation of mobile devices is indicative of the consumerization of information technology (IT) in today's organizations. It also reflects the global adoption trend of smartphones as being the greatest and fastest of any other technology in history [5]. Mobile devices, including smartphones and tablets, are increasingly being adopted across several industries for greater organizational capacity and overall success. The growth of technology and scale of its usage predicates a continued rise in individuals having already used mobile technology, and specifically smartphones, in their learning and communication practices, with an expectation that they will continue to do so [6]. Smartphone adoption has resulted in an increasing "mobilization" of information and resources as mobile technology has become ubiquitous and its applications culturally normalized within organizations.

Advancements in health information technologies provide the potential to revolutionize healthcare by enabling improved healthcare service provisioning. In recognition of the important transformative role that HIT systems have in healthcare, governments across the globe have implemented initiatives to support its implementation and foster adoption [7]. For example, in Canada to support clinical practitioners and to build on its existing national HIT initiative (*Canada Health Infoway*), the Canadian government formed the Clinical Council in 2011. This group brings together physicians, nurses and pharmacists in an interdisciplinary effort to improve the clinical value for Canadians and healthcare providers using information and communication technologies [8]. As part of their mandate, the Clinical Council has partnered with the respective schools of these professional groups to engage faculty to prepare future health practitioners for practice in modern technology enabled clinical environments [8]. However, despite the abundant research and perceived benefits of HIT adoption, many challenges persist for organizations in optimizing the development, adoption, and effective

use of information and communication technologies in the delivery of healthcare [9].

Technology acceptance and adoption

There is a need for increased use of IT in hospitals to make practices more efficient and to improve the quality of healthcare but managers acknowledge there is little more than anecdotal evidence for what implementation method works best [10]. Adopting new procedures in health organizations, such as information and communication technologies is often difficult due to the disruption of several interdependent and coordinated processes involved in the provision of care (i.e. information exchange and communication relationships) [11]. Studies also find that staff perceptions, organizational identity, communication styles and professional training are all elements in successful HIT implementation. These factors along with a lack of coherent organizational policies for staff training and utilization can undermine HIT integration and adoption in clinical practice [11,12].

The process of accepting and adopting new innovations has been studied for many years. Understanding the factors that influence user acceptance of IT is vital in determining the success of its uptake as projects routinely fail without user acceptance [13]. Thus organizations, managers and information specialists are extremely motivated to gain insight into user's uptake of new technology. For this discussion, user acceptance of new technology is defined as the demonstrable willingness within a user group to employ the technology for its intended use, such as patient care [14]. The extant literature on IT acceptance has yielded numerous models of user acceptance, which focuses to a large extent on the antecedents of adoption and usage of new technologies [15]. These models include the technology acceptance model (TAM) [16], the unified theory of acceptance and use of technology (UTAUT) [13] innovation diffusion theory (IDT) [17], decomposed theory of planned behaviour (DTPB) [18], and task-technology fit (TTF) [19]. These models are mostly concerned with the how and why of user adoption of new information technologies [13]. The goal of this paper is to extend this research by focusing on the determinants of power and discourse as barriers to user acceptance.

Healthcare communication practices

Efficient and coordinated communication strategies are imperative to timely, safe, and quality patient care in clinical practice. Strong interpersonal communication skills and tools are required for delivery of timely and relevant clinical data and evidence, which improves clinical decision-making. Hospital communication modes have evolved and expanded over time with advances in technology. Face-to-face meetings, stationary telephones, and numeric paging systems are traditional methods of communication. However, known contributing factors of clinical errors are substandard communication sharing practices and miscommunication [20]. In fact, miscommunication is considered as one of the major preventable causes of all identified clinical

errors and the most preventable cause of death or disability in a review of 14,000 hospital admissions [21].

Nurses, like their physician and pharmacist counterparts, are knowledge workers in the healthcare system [22]. Health professionals are accustomed to working with technology in the clinical setting as the use of computers and multiple technologies is prevalent and routinely used in their daily work. There are a multitude of technological devices that are used in the care of patients such as electronic health records and various types of electronic equipment, such as electrocardiographs and medication pumps. Adopting new technologies is part of healthcare transformations and has been occurring parallel to societal technological advances [23]. In this sense, the use of mobile devices, particularly smartphones, is a natural evolution of communication practices for healthcare professionals in hospitals.

Smartphones

Smartphones are powerful small computers that have immense popularity and widespread adoption due in large part to their small size, lightweight design, and ultra-portability [24]. The combined functions and interfaces of device communication (phone, e-mail, text), content (recording, storage and retrieval capabilities), connectivity (access to the Internet and social network sites such as Facebook), and convergence (recording, uploading, downloading) provide users with instant access to one another and to information. The multiple functionalities and portability of smartphones make them valuable in the delivery of efficient and effective patient care by healthcare professionals. Smartphones enable healthcare practitioners to work anywhere at any time which is vital in the dynamic health care work environment where workers are constantly on the move [12].

Increasing numbers of healthcare workers are using smartphones in their daily practice. They are so popular that many physicians have simplified their communication and information practices by replacing their pagers, cell phones and personal digital assistants in favor of smartphones [25]. At McGill University Health Centre in Montreal, smartphones are the device of choice for all clinical practitioners and hospital administrators have endorsed a *bring your own device* (BYOD) initiative to support organizational implementation and utilization [26]. Ranked as one of the top hospitals in the United States, Yale-New Haven Hospital (YNHH) is in the process of equipping staff with iPhones in all its agencies to streamline communication and to enhance collaboration and patient care [27]. The vice president and chief technology officer of YNHH, has stated “[w]e envision the smartphone platform to be the workstation of the future” [27], para 3. More agencies are realizing the benefits of mobile technologies, and as a result, over 50 percent of American hospitals are currently using smartphones or tablets to improve communication patterns among staff, improve efficiency and enhance patient care [28].

Evolving mobile devices, their applications and connectivities are introducing new functionalities for health practitioners that were previously unthinkable. The widespread

integration of HITs in a health organization has the potential to provide seamless delivery of health services by digitalizing health records, real-time monitoring of patients, capture of patient generated mobile health data, delivery of healthcare information to practitioners, and direct provision of care (i.e. mobile telehealth) [29]. Despite the numerous advantages of mobile integration and its critical role to the future sustainability of the Canadian health care system, the health care sector is marred with barriers and challenges to its implementation. Most notably is Canada's health framework itself. While the federal government is responsible for setting and administering national principles for the health care system through the *Canada Health Act*, the provincial and territorial governments are responsible for the delivery of services [30]. This means that the governments of each province and territory determine their health care priorities, of which mobility typically ranks fifth in the top health care IT priorities [31].

Hospitals are large multifaceted systems where factors beyond those of individual influence exist that impact how innovations are implemented and adopted in clinical practice. Some of these considerations are the technology's cost and clinical effectiveness, its capacity for integration into existing or new IT systems, and its impact on professional practice [32]. The successful uptake of a new communication technology is therefore subject to numerous intricate exchanges between the actions of individuals involved in the process of adopting new technologies and the dynamics of the contexts in which they are enacted. An exploration of the acceptable use of mobile devices in the province of Alberta follows to provide context for policy analysis and the effect of power and discourse in accepting HITs in clinical practice. In the following discussion, two perspectives of organizational theory are applied to the case study. The first perspective frames the health system as both a political arena and a political agent and explores meanings of power. The second perspective asserts that communication processes constitute an organization and thus examines the fundamental and formative role of discourse in HIT acceptance. By reframing the circumstances present in the case study and analyzing the underlying issues of power and discourse, the goal is to better understand the challenges of HIT approval and diffusion within a health system.

The case study

The following case study depicts a nursing instructor's efforts to clarify the mobile phone policy for clinical practice settings. The clinical learning environment plays a critical role in a nurse's professional development. Preceptored practicum provide students with the opportunity to provide direct care of the patient in the clinical setting while under direct supervision of their preceptor. Novice nurses adjust to increasing patient complexity and are nurtured by the strong models of practicing nurses in the workplace, facilitating transition to the professional role. The clinical setting is a dynamic information intensive environment. Learners are challenged to keep up with a rapid pace of change, increase in client acuity, inconsistency in resources and resource delivery, and diversity in delivery models of practice. Compounding this is the feeling

of isolation and lack of support from their educational institution due to distance of the learning setting.

In the fall of 2014, a nursing instructor had several students in clinical practicums within Alberta Health Services (AHS), the largest province wide health system in Alberta. Most of these students had work schedules that involved shifts opposite the instructor's regular office hours. This made communication with them very difficult due to the difficulty of connecting with them. Traditional means of communication typically consists of telephoning the unit, asking the desk clerk to page the student and/or preceptor and then talking to the student or preceptor when they come to the desk on the unit. If the student or their preceptor is busy with patient care, this results in a message being left for them by the instructor and then another attempt at connecting by telephone later that day. Alternatively, the instructor may email the student and/or their preceptor during the day and then wait for a response when they have finished their shift. These communication methods are less than ideal as students are often frustrated with the lack of timely communication that they feel leaves them unsupported and unsure in the clinical setting. A further complication with this group was that just prior to them starting their practicums, several students were still waiting for confirmed schedules from their prospective unit managers. This increased the group's level of anxiety as many students had childcare issues to arrange and manage while in their respective practicums. These factors led to the instructor's decision to pilot texting as a means of communication with the students while they were in their clinical practicums as it was felt traditional ways of facilitating and supporting participants in preceptorship relationships were no longer feasible in the current healthcare environment.

Prior to initiating text messaging with students, the instructor sought advice from the university's clinical liaison with AHS, to ensure texting was an acceptable communication alternative. The email correspondence follows:

University Clinical Liaison to AHS Practice Consultant, December 4/14: *"We have been getting increasing questions from students about the use of hand held devices in clinical settings. The question is are there any policies allowing or not allowing students to use hand held devices while in their clinical practicum?"*

AHS Practice Consultant to University Clinical Liaison: *"The social media policy is on the external website at <https://extranet.ahsnet.ca/teams/policydocuments/1/clp-ahs-pol-social-media.pdf>. My perspective is that students and staff should be sensitive to generational differences on units - both patients and staff - and communicate why they are using their cell phones. A little discretion and respect goes a long way and perception is everything. There are likely to be some AHS destinations such as ICU's where using cell phones is not permitted. It's always wise for the student or instructor to ask"* (personal communication, L. Liaison).

The instructor's response to AHS Practice Consultant: *"Thank you for this information. My question however does not centre on social media sites but rather the use of mobile phones in clinical spaces. I am questioning if students and or preceptors may text instructors from the clinical site and vice versa? Does AHS have an organization*

level policy on mobile phone use in clinical settings? Are there any units where staff (and thus students) are not allowed to use mobile phones on, and if so which ones?"

An AHS Practice Education Consultant responded: *"You would need to check with the individual unit on whether they allow the use of mobile phones. We do not have a specific policy around the use of cell phones in clinical settings, except for when it comes to social media"* (personal communication, L. Liaison).

Following the email correspondence and seeking consent from students and their respective preceptor, the instructor initiated texting with students during their clinical practicum. One student in particular found texting immensely positive. At the beginning of the practicum, her preceptor often switched his shifts for personal reasons and would call or email the instructor of the changes. The instructor would then notify the student by text immediately, enabling her to have more time to arrange childcare for her children and thus accept the preceptor's change, mitigating possible disruptions or delays in her practicum. The student would also text the instructor during her breaks to touch base or to simply ask questions about issues that were current to her shift and care of her patients. She commented that she found texting, its quick responsiveness, and succinct answers helped to alleviate her stress level as a new learner in the workplace.

When asked, most of the preceptors used their personal mobile device within the hospital but were uncomfortable about sharing their numbers with students or with the instructor. Some preceptors when asked about AHS's mobile policy responded that they were unsure if AHS had a policy regarding mobile phone use on the unit but noted that regardless most staff used their phones on a regular basis (personal communication, preceptor). Some preceptors, pointed out signs within the hospital that prohibited the use of mobile phones and used them as their basis to instruct students on mobile phone use. Other staff commented that the policy was for administrators or senior management and did not apply to them.

The Alberta political context

AHS is the provincial health administrator which is responsible for delivering health services to over four million residents of Alberta. Health services are offered at over 650 facilities throughout the province, including hospitals, clinics, continuing care facilities, cancer centres, mental health facilities, and community health sites [33]. The management and governance of health service care and delivery in Alberta has undergone considerable variation since the early 1990s, which marked the beginning of a struggle to find balance between centralized control of services and devolution to regional health authorities. During the last 25 years, the government has restructured health services several times. It has gone from a single centralized structure with strong government control, to a regionalized structure with over 250 health boards making decisions based on local needs and interests, and then back to a single provincial entity with direct reporting structures to government [34]. There has been a combination of reporting structures that included both direct and indirect

government involvement, such as a Chief Executive Officer of AHS reporting to a board of directors or directly to the Minister of Health, over this period. The government's goals of restructuring Alberta's health care system to a single authority were to: improve accountability and governance, improve the management of services, improve the level of health and safety across the province, and standardize health care with equal access to all services and care for Albertans [34]. However, after years of political interference and a revolving door of CEOs, seven in the last eight years, it appears the operations and delivery of health services in the province are far from stable.

The restructuring of Alberta's health care system and its variations of management approaches has often coincided with changes in the Premier of the province and has also been underpinned by budget crisis. The Progressive Government ruled for 44 years in Alberta, from 1971 to 2015, although this was the longest unbroken run in government in Canadian history, each newly elected premier addressed the management of health care services differently. Premier Klein, who was elected in 1992, quickly instituted financial reforms that were aimed at reducing debt. These resulted in massive layoffs, a large reduction in care beds and overall health infrastructure spending, and widespread changes in service delivery [35]. Stelmach's government flirted with privatization to address financial shortfalls until public outcry and protests stopped these initiatives [36]. Prentice was elected in the fall of 2014, on a platform that focused on fiscal conservatism and restoring public trust following his predecessor's perceived period of entitlement.

By the end of 2014, the people of Alberta were weary of government scandal and looked forward to the end of political privileges. However, in February of 2015, the Wildrose Official Opposition, unveiled AHS had spent over \$825, 000 on mobile devices by AHS during a six-month period from June 2013 and November 2014 and stirred public outcry by suggesting that while patients were faced with increasing wait times for surgeries and access to emergency rooms, senior AHS managers and directors were leveling heavy cell phone bills on taxpayers [37]. Wildrose leader, Heather Forsyth, claimed this information was available, yet neither members of the government or leaders at AHS put a stop to it (Wildrose). Complicating the issue further, AHS readily admitted that a specific mobile device usage policy did not exist prior to February 4, 2014 as staff utilized the more general IT acceptable use policies [38]. The media disclosure of a series of fiscal expense abuses by Premier Redford, renewed a sense of public mistrust in government. Prentice's commitment to eliminating grandiose government spending and his sensitivity and quick response to the public was a positive change but was now threatened by the seemingly outrageous cell phone expenses being racked up within the health care system [39].

As a result, on February 4, 2015, AHS implemented a new cell phone and mobile device policy titled *Cell Phones and Other Mobile Devices*. The purpose of the policy is twofold: (a) to outline the allocation and use of both AHS owned and individual owned mobile devices in AHS facilities and (b) to protect information that is in the control and custody of AHS while being transmitted and/or stored on a mobile device [40]. AHS posted further clarification of their policy on their

blog later the next week. The focus of the new policy, according to AHS, was to address efficiencies, more specifically mobile device usage costs. Wording from AHS's blog post includes phrases that acknowledge "mobile devices are integral parts of modern health care" and AHS will "continue to ensure...staff has access to the tools that best support them doing their job" [41]. However, phrases such as "rolled out a stringent new mobile device policy" and "the approval process for who gets a mobile device...and what kind of mobile device...requires executive approval" sends conflicting messages [41].

Power and discourse inform policy and impact user IT acceptance

Power in an organization

The political frame views organizations as arenas of contesting interests. Boleman and Deal [42] suggest that different interest groups and individuals have variances in power, values, beliefs, interests, behaviours and skills that compete for scarce resources. People negotiate and manage conflict by setting agendas, building coalitions, bargaining, compromising, and by coercion. Power is the most important asset. Political skill and acumen leverage power for action. Boleman and Deal [42] identify several forms of power that are present in organizations: position power, control of rewards, coercive power, information and expertise, reputation, and personal power.

Power is pivotal to decision making in organizations. Many theorists support that power is relationship specific, in that a given social actor has power in relation to others, and thus whenever we try to influence others; power is exhibited [3,43,44]. French and Raven's [3] theory of social influence and power provide a more nuanced view of the sources of power within the context of a relationship. They examine the sources of A's power over B and B's perception of that power. In so doing, French and Raven have identified five bases of power: (1) reward, B's perception that A can mediate rewards for B; (2) coercive, B's perception that A can mediate punishments for B; (3) legitimate, B's perception that A has a legitimate right to prescribe behaviour for B; (4) referent, B's identification with A; and (5) expert, B's perception that A has some special knowledge or expertness.

Organizations are political structures and powerful agents for achieving the purposes of those in control. They provide platforms for expressions of power by both individuals and groups. The mandate to adopt a mobile technology that improves organization performance would be an example of a leader's influence to change subordinate's behavior in an organization. In the case study, the policy change originated with the Premier's office, which serves to both legitimate the power and coerce acceptance. At the micro level, the ambiguity and lack of awareness of a mobile policy by many front-line workers, may be seen as diminished expert and/or referent power of preceptors by their students.

Discourse in an organization

The study of communication in organizations has traditionally viewed discourse as phenomena bounded or contained

within the bureaucratic structures or systems of organizations [45]. However, findings from research have evolved to view communication as constitutive of organization (CCO). Kuhn [46] clarifies that “communication [can] be seen not only as something occurring inside organizations but also as the process that [constitutes] their very existence” (p.619). CCO assumptions are grounded in the belief that process is constitutive and foundational of social and material reality that involves the production of communication in any turn of talk, text, artifact, discourse, or narrative [47-49].

There are several CCO theorists that explore the notion of communication generating organizational realities [50-52]. However, for the purposes of this paper, Fairhurst and Putnam's [4] original framework is used as the basis for examining the discourse-organization relationship. They identify three orientations, object, becoming and grounded-in-action, to explain the role of discourse in constituting organization. *Object*, refers to an organization being of form with features and outcomes revealed in discourse. In this instance, the ontology of organization is delegated to the background whereas an object, such as an IT system or new technology that produces discursive practices is moved to the foreground. The state of *becoming* encompasses the ways discourse shapes organizing. For example, frequent conversations about technology create, sustain and alter the organizational culture around its acceptance and adoption. The *grounded-in-action* concept focuses on the ways discourse and organizations are entangled recursively and reflexively by social practices [4]. The discourse that evolves during the back and forth between initiation, development, and implementation of a new technology in an organization illustrates the grounded-in use concept. The abovementioned authors propose that the three orientations are interrelated and inherently related without an a priori status.

Discussion

Healthcare organizations are dynamic and fluid; change is the only constant in healthcare due to the many contextual influences which affect the system at any given time. Situating the relationship between communication and organization in discourse captures how language and text in social practices endure systems of thought at a point in time [49]. This perspective enables a reframing of the AHS policy decision to unpack and explain how language constructs and mediates phenomena in organization, specifically in this case of mobile technology use. Borrowing from Giddens [53] structuration theory, the CCO perspective connects institution and action. Technologies are artifactual rules and resources that create conditions of action that are responsive to organizational practice and thus continually (re)produce [54,55].

Through this perspective, communication is bound with technologies and structures as a discursive and nondiscursive practice that constrains and enables organizational life [50,55]. Technology, its use, and interpretation illuminate through practice the relations and task boundaries among actors and explicate how rules, norms and usage structures arise [54]. The use of mobile devices in AHS was unencumbered until a moment in time in which the artifact came under scrutiny due to flows of communication. AHS decision makers were caught up in language and discourses created

by media and were also acutely aware of performance linkages made to their organization. As a result, the details of the actual mobile phone charges were minimized in the government's communications with the public. The decision to limit mobile phone use was a strategic action orientated to solve a socially constructed political problem.

The Alberta government has a history of being intrusive in AHS board decisions for political reasons. Prior to the government firing the entire AHS board in 2013, there had been regular turnover of chief executives. In this instance, AHS as an organization became a powerful agent of the government for achieving electorate support. The government made a swift directive to change mobile device policy in AHS as a response to voter's dissatisfaction with perceived costs of using the devices. The fact that the high costs were mostly associated with one physician's roaming charges while out of country and not from the regular use by clinicians in health care settings, was overshadowed by a powerful political campaign [39].

Various forms and levels of communication can confound issues of power, structure, and technology across place and time [53]. This is evident in the conflicting messages that AHS leadership delivered through its policy and blog that seem to contradict how performance rules misalign with actions of practitioner best practice that support utilization of current tools, such as mobile devices. Similarly, varied meanings derived from the media's story telling of the event and the resultant policy impact the actions of members in the organization. For example, in the case study, several staff when asked were unaware or unsure of the policy of mobile phone use in the clinical setting. Some practitioner's that knew of the policy had the interpretation that the policy was a result of leadership misdeeds and thus linked the policy to leadership and not to front line staff. Thus, they continued to use mobile devices in clinical practice as the communication about usage was unclear.

The absence of staff awareness of the mobile policy and/or the perceived disregard of it impacts students' behaviour. The lack of uniformity in decision making and policy compliance by professional practitioners erodes their referent power [3]. This waning of expert power becomes a barrier to HIT adoption in the health system. In the workplace, novice practitioners are nurtured by strong models of practicing experts who play a role in influencing student attitudes and acceptance of new technologies [56]. In this instance, students were left to flounder without clear direction or example of when and how to properly use mobile devices in the clinical setting.

The complexity of healthcare organizations, rapidly changing technologies, and shifting economic realities create instability and dissonance among and within organizations. This is commonly referred to as the “new normal” of organizational life [57]. The constant restructuring of Alberta's healthcare system and changes of decision makers has resulted in change fatigue among staff, a climate of indecision and sense of powerlessness, and lack of accountability [58]. Elements of tension and conflict arise in such unstable situations, creating power struggles that impact organizational life. The bureaucratic cycles and focus on neoliberal politics within AHS has worked to silence and disengage many health practitioners from the governance structures in health care [59]. Furthermore, front line

practitioners feel their voices are not heard nor given opportunity to consult on issues with hospital management [58]. As a result, practical expertise in organizational decision-making has diminished; evident in the lack of its influence in crafting the mobile use policy which prohibits the use of mobile devices in most clinical settings, although the literature clearly supports HITs for better health outcomes [1,40].

Conclusion

The rapidly changing IT environment creates challenges for individuals, organizations, and policy makers in negotiating technological innovations and their resultant influence on information and communication transactions within organizations. The literature suggests that maximal IT infusion across an organization is often not fully realized as organizations commonly fall short in the integration of IT applications with their existing business processes and with individual and organizational level work systems [60]. A more thorough explanation focuses on organizational communication and politics. Healthcare organizations are complex and messy, constantly evolving to keep up with change; creating tension which constrains everyday actions leading to a state of disorder which becomes the norm. The dynamic interactions among discursive and nondiscursive practices in an organization lead to an ongoing translation of meanings, development of structures, modes of management, and control systems. This in turn affects the recursive discourse related to technology and the organization. Thus, communication and power are interwoven in the very essence of organizing and organization.

The case study illuminates that careful examination of various forces beyond the HIT itself, such as power and communication, impact the adoption and diffusion of new technology in organizational life. The hope is that this discussion provides a contextual understanding of the difficulty inherent in technology acceptance and the unique perspective that communication and power have on policies in clinical practice. Suggestions for further study focus on the realities of IT use in clinical practice. Studies investigating organizational and policy contexts for the adoption of clinical technologies are needed. An example is initiation of a pilot project on a nursing unit, which involves the use of mobile devices as a communication tool between instructors, preceptors, and students. Implications of such a study would help explicate how rules, norms and usage structures arise through practice based use of mobile technology.

Conflict of interest declaration

The author has no conflict of interest to declare.

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