

**“Social”, “open” and “participative”? Exploring personal experiences and
organizational effects of Enterprise2.0 use**

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Abstract

Organizations are increasingly adopting Web2.0 technologies such as web-based communities, social-networking sites, wikis and blogs to enable users to interact, share information and alter web-based content. In a business/commercial context the use of such technologies has been termed Enterprise2.0. This paper explores organizational actors' experiences of this new technology and how the shift to Enterprise2.0 is shaping the way people work and organize. We present an in-depth case study of a large multinational telecommunications company that is commonly regarded as one of the leading proponents of Enterprise2.0. Data were collected from three business units each exhibiting different characteristics in terms of level of Enterprise2.0 experience and employee participation in decision-making. Our findings show that while Enterprise2.0 is claimed to be “social”, “open” and “participative” and has the potential to deliver significant business benefits, the experiences of organizational actors suggest that their expectations regarding Enterprise2.0 use were not met. Paradoxically, employee participation was limited and the monitoring and moderation of certain discussions, together with political use of the technology by leaders, meant that the use of Enterprise2.0 was often thought of as no more social, open or participative than more traditional methods of communication. These results are discussed with the framework of previous research on the management of the introduction of new technology and its use and exploitation within organizations.

Introduction

Organizations are increasingly using information technologies that are significantly more diverse, dynamic and distributed than earlier systems and these are having profound effects on communication, work practices and the complex process through which organizing is accomplished. The ever increasing demand for faster and more reliable forms of information and communication by businesses has contributed to the rapid development of internet-based technologies. As usage of these technologies has grown, the nature of this use has changed with the emphasis moving from the accessing of information (Web1.0) to the use of technology as a platform for social interaction, communication and collaboration (Web2.0).

Web 2.0 technologies such as web-based communities, social-networking sites, wikis and blogs enable users to interact, share information and alter web-based content. In a business/commercial context the use of such technologies has been termed Enterprise2.0 (see Figure 1). Enterprise2.0 has received widespread exposure in the practitioner and national media where advocates have argued that Enterprise2.0 technologies are “social”, “open” and “participative” and deliver significant business benefits. For example, in a survey of 406 senior global executives, 35% thought that Web2.0 was transforming businesses (Economist Intelligence Unit, 2007, p.14).

[Insert Figure 1 about here]

Despite extensive coverage in the practitioner media and press, currently few academic studies have investigated the use of Enterprise2.0. For example, a search of ABI Proquest (conducted on 14/03/11) for “Enterprise2.0” revealed just 20 ‘scholarly articles’. The same search performed in EBSCO (also on 14/03/11) provided only 22 papers in ‘academic

journals'. Therefore, in order to provide a theoretical framework for our study and develop specific research questions, in addition to studies of Enterprise2.0, we also draw on the broader literature on the introduction, management and exploitation of new technology, particularly information and communications technologies, in organizations.

In what follows, we first consider the research on technology management and organizational effects of technology use and derive four research questions. Secondly, we introduce the setting for our research and the methods of data collection and analysis. Thirdly, we investigate the role and influence of Enterprise2.0 technologies in a large multinational telecommunications company that is commonly regarded as one of the leading proponents of Enterprise2.0, comparing and contrasting three business units each exhibiting different characteristics in terms of their level of Enterprise2.0 use. We conclude by presenting an agenda for further work on the introduction, management and exploitation of Enterprise2.0 technologies in organizations.

Personal experiences and organizational effects of technology use

Adopting new technologies is critical for competitive advantage for many organizations (Edmonson, Bohmer and Pisano, 2001). New technologies can lead to increased productivity (Trist and Bamforth, 1951), efficiency gain (Scott Morton and Rockart, 1984) and improvements in product and service delivery (Tranfield and Smith, 1998). However, organizations can be blind to the existence or advantage of external innovations (March and Simon, 1958), often failing to adopt new technologies, including those with recognized advantages (Edmonson et al., 2001). With the growth of knowledge-based organisations and the advent of the internet, work done in organizations is increasingly accomplished via computer-based technologies that store, transmit and transform information (Leonardi and

Barley, 2010). Such technologies serve both business and social goals (Mumford, 2006), benefiting organizations not only through improved information sharing and enhanced coordination, but also providing employees with support and enhanced opportunities to express their concerns (Da Cunha and Orlikowski, 2008).

Previous studies of the introduction of new technologies demonstrate that the adoption of new technologies is often widespread, yet success in exploitation is often impeded when managers fail to distinguish between both installation and the wider social process of implementation and also fail to link strategically new technology capabilities with business benefits (Tranfield and Smith, 1998). Further, new technologies may not meet the expectations of designers and managers if there is a singular preoccupation with business goals without also taking into account of how technology can improve the workplace practices and quality of working life that affects employees (Trist and Bamforth, 1951). Therefore, our first research question is:

(RQ1) What are the drivers for and perceived benefits of adopting and embedding Enterprise2.0 technologies?

Previous research on technology management has demonstrated that the decision to adopt and the timing of adoption can vary considerably within an industry (Rogers, 1964) and that comparable technologies often generate diverse dynamics and outcomes in different organizations (Tranfield and Smith, 1998). Therefore, it is not possible to explain how a technology affects an organization without taking into account the “intricacies of the social context” (Leonardi and Barley, 2010, p.5).

Contextual factors that shape the adoption and implementation of new technologies include organizational size and resources (Kimberly and Evanisko, 1981), absorptive capacity, which is related to its history of innovation and research activities (Cohen and Levinthal, 1990), difficulties of defining success (Tranfield and Smith, 1998), a lack of senior management commitment (Tranfield and Smith, 1988), a lack of established routines for handling new practices (Christensen, Bohmer and Kenagy, 2000), the absence of vital ‘procedural knowledge’ (Cohen and Bacdayan, 1994) and lack of relevant expertise (Cohen and Levinthal, 1990). This leads to our second research question:

(R2) How is Enterprise2.0 shaped by the organizational context and existing cultural norms and practices?

Following an organization’s decision to adopt a new technology, success in implementation is dependent on effectively managing both the mutual relationship between the social and technical aspects of the organization (Trist and Bamforth, 1951; Rice, 1953; Emery, 1959). Studies in a variety of settings including manufacturing (Tranfield and Smith, 1988; Child, 1987), integrated information systems (Waterlow and Monniott, 1986; Barrar, Lockett and Tanner, 1989) and new computer systems (Mumford, 1995), found the introduction of new technologies to be a social and political process (Markus, 1983). Success in implementation of a new technology is affected by users’ perceptions and attitudes about the technology (Robey, 1979; Leonard-Barton and Deschamps, 1988), how people make sense of new systems (Prasad, 1993) and the assumptions made by managers concerning the type of change required (Tranfield and Smith, 1998).

Many studies of the implementation of new technologies describe a need for mutual adaptation of organizations and technologies (Leonard-Barton and Deschamps, 1988).

Increasingly, however, a critique has emerged that the focus of technology management has been preoccupied with “altering the social to fit the technical...while overlooking the way social systems shape technologies and their use” (Leonardi and Barley, 2010, p.4). Whilst some technologies can be literally ‘plug-and-play’ in that they arrive in organizations fully formed and require virtually no interpretation or modification to be used (Yates and Orlikowski, 1992), in other instances new technologies are altered in use (Orlikowski, 1992). Orlikowski (1992, p.421) argues that the “greater the temporal and spatial distance between the construction of a technology and its application, the greater the likelihood that the technology will be interpreted and used with little flexibility”.

Several recent studies of technology implementation have often adopted a social constructivist perspective that regards technology, people and organizations as an ‘entanglement’ (Pickering and Guzik, 2008). The focus of these studies is on the ‘recursive intertwining’ of humans and technology in practice (Orlikowski, 2007; Orlikowski and Scott, 2008). For example, Yates and Orlikowski (1992) use the notion of genres to conceptualize how “socially recognized types of communicative actions – such as memos, meetings, expense forms, training seminars – are habitually enacted by members of the community to realize particular social purposes” (1992, p.542). Communication genres are shaped by social rules that “shape the action taken by individuals in organizations; at the same time, by regularly drawing on the rules, individuals reaffirm or modify the social institutions in an ongoing, recursive interaction” (Yates and Orlikowski, 1992, p.299). Communication genres can be modified, morphed and ‘ultimately bear offspring of their own’ (Orlikowski and Scott, 2008, p.65). A new genre is said to have emerged when it is recognized by members of the community and is reflected in their actions. Our third research question is therefore as follows,

(RQ3) How do individuals experience the opportunities and challenges of Enterprise2.0 technologies?

Mumford (2006, p.321) argues that practitioners of technology management, particularly from a sociotechnical perspective “have always tried to achieve its two most important values: the need to humanize work through the redesign of jobs and democracy at work”. She argues that in introducing new technologies users at all levels needed to be encouraged “to play a major role in the design task, in particular rethinking the design of jobs and work processes for their own departments before new systems were installed” (p.331) and that “democratic and participative communication and decision-making must be available to give these people a voice” (Mumford, 2006, p.321).

More recent research on the introduction of computers in organizations has shown that technology can be used for political ends. For example, online forums can be used to structure a community’s understanding and organize action towards or against change (Langman, 2005). People can use the technology to construct an “oppositional discourse” and the process of venting can be cathartic (Da Cunha and Orlikowski, 2008). The online forum,

“helped employees enact their opposition in the online space, engaging in acts of protest that they thought unable to perform overtly and directly in the work place” (Da Cunha and Orlikowski, 2008, p.152).

Da Cunha and Orlikowski (2008) also found that senior managers in the organization did not acknowledge the existence of the company’s online forum. They never posted any message

themselves, and only rarely did they act on messages posted to the forum. Our final research question is,

(RQ4) How does the use of Enterprise2.0 affect power, politics, decision-making and participation in organizations?

Evidence from previous studies of technology management suggests that adopting, implementing and exploiting new technologies in organizations is challenging. Success is dependent on a complex combination of factors, involving aspects of the context, features of the organization, its culture and structure, and individual cognition and behaviours. Our review also reveals that organizations stand the best chance of success when a new technology has clear business and social benefits. The organization in this study is a large multinational with significant resources at its disposal, there is a history of technological innovation, strong senior management commitment, the ability to alter the technology and existing organizational practices and where the process of adoption and implementation is democratic and participative. These are precisely the conditions evident in our case study. We next introduce the setting for the research and the methods of data collection and analysis.

Methods and setting

We present an in-depth case study of a large multinational telecommunications company that is commonly regarded as one of the leading proponents of Enterprise2.0. In this sense, the case meets the criteria of being an “extraordinary” (Yin, 2003) or “extreme” (Eisenhardt, 1989, p.539) case because the phenomenon of interest – Enterprise2.0 – is more apparent than it would be in other cases (Eisenhardt, 1989). The case study approach we used allows an exploration of the context in which a rich description of critical events (Yin, 2003) reveal

how managers construe key organizational events (Isabella, 1990) and the way in which processes and conditions unfold (Mohr, 1982; Langley, 1999; Buchanan and Dawson, 2007). Case studies are particularly valuable for generating and building theory in under-researched areas (Yin, 1983; Eisenhardt, 1989) enabling researchers to move from experience and observation to theory through a process of analytical refinement (Tsoukas, 2009). A theoretically informed case narrative is also a powerful and compelling communications mode for disseminating findings (Buchanan and Dawson, 2007).

Data were collected by means of semi-structured interviews, analysis of documentary evidence and participant observation from three business units each exhibiting different characteristics in terms of level of Enterprise2.0 experience and employee participation in decision-making. In total, 33 face-to-face interviews were conducted. Twenty-one were carried out with members of the three business units. In each business unit interviewees were selected based on a stratified sampling strategy whereby independent samples were randomly drawn from four levels in the organization: leaders (n=1), middle managers (n=2), supervisors (n=2) and employees (n=2). The respondents were asked to refer the researcher to other people who could potentially participate in the study and contribute to our understanding of Enterprise2.0. This resulted in an additional 12 interviews with a range of stakeholders including Enterprise2.0 advocates as well as critics, individuals responsible for the organizational strategy and a union representative. Within the business units, interviewees included employees from both operational and support functions. The focus of the interviews centred on interviewees' perceptions of Enterprise2.0 and the ways in which these technologies shape the way people work and organize. On average the interviews lasted one hour. All interviewees were assured of the anonymity and confidentiality of findings and the interviews were recorded and transcribed verbatim.

The second data set comprised the analysis of written documents. Company documents relating to the Enterprise2.0 were collected and analyzed including presentations, reports, project plans, models, diagrams, organization charts, relevant e-mails, memoranda and letters.

The third data set was drawn from participant observation of Enterprise2.0. One of the authors of this paper is a senior manager in the case study organization, affording the research team with a unique opportunity to observe first-hand organizational practices and the use of Enterprise2.0 as well as the possibility of interacting with users in order to develop an understanding of their experiences and interpretations (Taylor and Bogdan, 1984). A key distinguishing feature of participant observation is that the observer's own experience is considered an important and legitimate source of data (Brewer, 2000). Data were recorded by means of field notes. In order to reduce the potential for bias due to the researcher's familiarity with the organization, the research design, interview protocols, analysis and reporting of the findings were developed in conjunction with the other two members of the research team, also ensuring that none of the participants were the researcher's direct reports. In addition, a reflective journal was kept by the researcher to record key decisions, observations, reflections and actions and this was frequently referred to and questioned during discussions with the other two members of the research team.

Data analysis

Data analysis can “uncover and understand what lies behind any phenomenon about which little is known. It can be used to gain novel and fresh slants on “things about which we already know” (Strauss and Corbin, 1998, p.19). The analysis of the transcripts was

performed using NVIVO software and followed a multi-stage coding process developed by Ryan and Bernard (2003).

Firstly, a researcher analyzed each transcript sentence-by-sentence and selected quotations associated with Enterprise2.0. The researcher identified and recorded “the main themes, issues, problems, and questions in each interview” (Dutton and Dukerich, 1991, pp.523-524). Second, all three members of the research team and three other researchers analysed a sample of texts and grouped themes into conceptually coherent constructs (Plowman, Baker, Beck, Kulkarni, Solansky and Travis, 2007) before examining the alignment between researchers. Third, using the coding framework as a baseline, all of the transcriptions were then coded using Nvivo software, whilst also allowing new themes to emerge from the data. Several meetings were held between members of the research team to examine the emergent findings and to assess the effectiveness of the procedure. Overall, the analysis resulted in 111 codes. Fourth, using NVIVO’s search and query functionalities the results from the different business units were then compared and contrasted, as were the responses from the different levels within the organizational strata. Data from the interviews were also compared with the data obtained from interviews, observations and documents. Fifth, the results of our analysis and corroborating evidence were presented in a series of tables. In each table the key themes are detailed along with a count of the number of quotes that were coded against each theme. A single quotation is provided for each theme for the purpose of illustration. Sixth, we consulted four of the original interviewees, who had volunteered to help with this process, for clarification, corrections and confirmation of our findings.

Our aim in the following section is to provide a rich description of respondent's experiences and organizational effects of Enterprise2.0 use in a large multinational telecommunications company that we have renamed Telco to ensure anonymity.

Telco

The organization studied is widely regarded as one of the leading proponents of Enterprise2.0. Telco provides communications and IT solutions and services to consumers, small and medium enterprise businesses, corporate customers and communications providers in over 170 countries worldwide and employs around 150,000 people. Telco experienced significant changes in a relatively short space of time and has been affected particularly badly by the global financial crisis. Telco has long been associated with innovation and the adoption of new technologies, places great emphasis on knowledge work and has a history of facilitating communities of interests and collaborative working.

Since 2004, Telco has made increasing use of Enterprise2.0 technology following the appointment of a new CEO for the business unit responsible for IT and network development and operations. In 2006, one of the contributors to McAfee's original paper on Enterprise2.0 and an 'outspoken advocate' of Enterprise2.0 technology joined Telco as part of a restructure of the senior management team. His appointment increased the focus on Enterprise2.0 within the organization, resulting in fundamental changes to the way it operates. For example, blogs and podcasts are frequently used by senior leaders for the purpose of corporate communications. Corporate blogging policies have been developed, Enterprise2.0 guidelines and tools established and standardized tools have been selected and deployed across the organization to support project or organization-based wiki's. Existing communication channels have been extended to include RSS news-feeds. Other interventions include an

internal version of Wikipedia, an internal version of MySpace and the extension of the online news service to include spaces for discussion. Many of these tools can be accessed directly from the organization's intranet homepage. The professional communities of interest have also extensively deployed Enterprise2.0 technologies to share information and, more recently, an initiative to encourage people to create video podcasts as part of the learning and development agenda has been piloted. Second Life avatars (a representative of a real person in a virtual world) are being used as part of a Web2.0 talent academy. In addition, a number of campaigns have been launched to encourage usage and a range of social media was used during a recent consultation on the future of the company pension scheme.

The case study has three embedded units of analysis, business units that vary in the extent to which they have adopted Enterprise2.0. The three business units were selected based upon their use of the technology and their overall level of employee participation in decision-making. The choices were validated as part of the interview process, which found that the first business unit was perceived by respondents to have a relatively high use of technology and relatively low employee participation. This business unit is responsible for IT and network development, employs approximately 18,000 largely desk-based knowledge workers and comprises of a management team who have pioneered the use of Enterprise2.0 both within and outside the organization under study. Respondents believed that the second business unit had a relatively moderate use of technology and relatively modest employee participation. This business unit is responsible for IT and network operations and employs approximately 18,000 people, including a substantial field-force. Interviewees suggested that the final business unit had a relatively minimal use of technology and relatively high employee participation. This business unit is a market-facing unit discharging the organization's wholesale business, and employs approximately 4,000 people including a mix

of sales, marketing, product, operational and customer service agents. A unit with high employee participation and high use of technology could not be found in the case study organization. Enterprise2.0 use in the three business units is summarized in Table 1.

[Insert Table 1 about here]

Findings

The drivers and perceived benefits of Enterprise2.0

Interviewees talked at length about their experience of using Enterprise2.0 tools, the benefits that they thought the technology provided and the challenges that they experienced in using the technology.

[Insert Table 2 about here]

A large proportion of respondents, across all levels, suggested that Enterprise2.0 was implemented in Telco for business reasons such as market positioning, business development and to drive improvements in product and service delivery. The use of Enterprise2.0 was also motivated in part to drive efficiency gains insofar as the technology was “*an extremely efficient way of reaching a large number of people, both time-wise and cost-wise*”. Across the sample, interviewees thought the technology was helpful in terms of broadcasting messages throughout the organization and for making financial savings, mainly in terms of travel costs.

We were also told that the new technologies supported and sustained communities of interest and had increased knowledge sharing and allowed employees to converse through discussion

forums. It was reported that the communities were particularly valuable for new members of staff:

“...there are a group of [advocacy network members] working with a group of apprentices on podcasts to do that sharing (of) best practice”.

The relationship between Enterprise2.0 use and the organizational context

A comparison of the three business units helped us to identify a number of contextual variables that had an impact on how participants experienced and used the Enterprise2.0. These contextual variables are summarized in Table 3.

[Insert Table 3 about here]

The first key factor identified was whether or not people thought it was safe to speak up within their business unit. Respondents commented that it was ‘*safe to speak*’ up in in BU1 but interviewees in BU2 said that they employees were “*frightened of stepping out of line*”. However, in BU2 and 3, it appeared that whilst individuals thought that engagement was good and that they could ‘speak up’, they also reported that Enterprise2.0 had not translated into open conversations.

The second contextual factor identified was the nature of community believed by the respondents to have been created. In BU1, respondents reported that they were disconnected from the leadership, and so the affiliation was more within the team. In BU2, respondents tended to express a strong affiliation to parallel organizational networks, and the interventions were seen to be more successful at these levels. In BU3, people seemed to prioritize their individual concerns, and so did not think that they needed to participate.

The nature of the workforce or work itself also affected individuals' experiences of the technology. In BU1, respondents believed that the nature of the workforce, which was generally younger, IT literate and desk-based, was an explanation as to why there was more widespread appetite for the technologies. Age was repeatedly cited as a limiting factor in BU2, and in BU2 and 3 the nature of the work, or associated time or business pressures, were seen as limiting factors. For example, it was thought that those in the field force, on shift or rota arrangements, or in customer service environments, would have less opportunity to join in.

There were also differences according to the authority relations within the business units. In BU1, whilst people were encouraged to speak up, they rarely expected to be heard, or for things to change as a result of any conversation or dialogue. In BU2, people had experienced their leaders engaging, and in BU3, people expected conversation to be closed down, an issue that we further examine in the section on power, politics, decision-making and participation.

The final contextual factor identified was the role of the leader in each business unit. In BU1, much of the commentary was on how the autocratic style of the leader suppressed discussion. However, in BU2 people spoke of a more authentic and participative style of leadership that encouraged more discussion. However, in BU3 people commented on how the CEO did not appear to embrace Enterprise2.0 and there were sometimes mixed messages regarding participation. Respondents thought that if the CEO was not leading by example, it was unlikely the Enterprise2.0 interventions would ever be successful.

Interestingly, in the BU3, which previously had high levels of employee participation respondents suggested that a key reason for implementing Enterprise2.0 was to help leaders to be more open and accessible. Many of them argued that using Enterprise2.0 to engage employees was *“the right thing to do”*. However, in BU1, perceived by respondents to already have low levels of employee participation in decision-making, little interest was reported in the use of Enterprise2.0 for the purpose of increasing this. Indeed, many thought that the technology was used to inform employees, rather than to facilitate two-way conversations and that Telco rather than the employees was the ultimate beneficiary of Enterprise2.0.

The perceived opportunities and challenges of Enterprise2.0

Generally, interviewees at all levels thought that Enterprise2.0 could be an effective form of two-way communication as it:

“potentially closes the feedback loop, or makes the loop smaller if you like, because it makes it easier for people to understand how they can give their feedback”.

Interviewees seemed to suggest that “communication style” was important, and that often this may be related to the character and abilities of the individual. For example,

“...some of the leadership team in [BU1] are natural bloggers...”

Interviewees also endorsed the informal style of online communication. Whilst one leader thought that *“the success of...online meetings is taking quite a good step towards a face to face”* event, another leader thought the interventions were *“a weak substitute for personal interaction”*. There was some feeling that particular individuals were more comfortable with the online medium than others, and that this might be related to age. Many interviewees

thought that Enterprise2.0 should be complementary to other communication channels rather than a replacement and also observed that different types of intervention are used for different purposes. Interviewees also commented on the need to make appropriate use of the interventions, emphasising people received too many communications and that messages would be diluted.

Others articulated a concern that much of the content, material and information being communicated via the new technologies were irrelevant, with one middle manager reporting that employees will join webcasts only “*when it’s a really compelling subject...*” We were also told that individuals are often not willing to wait for responses from others and if communication isn’t in real time, the intervention is perceived to lose some of its value. Several respondents stated that a small number of people were creating the majority of the content and communications, with one employee suggesting with regard to blogs that:

“you don’t get a flurry of hundreds of people responding...it’s the same people responding.”

Interviewees also suggested that leaders may not actually produce their own blog content, probably due to a lack of available time. One middle manager suggested that contributing to a blog might be:

“the sort of thing that is put in the edge of the leaders diaries and it’s the thing that always gets dropped off.”

The fact that leaders struggle to find time to regularly contribute to tools such as blogs was supported by the leaders themselves and several interviewees across organizational levels were generally concerned about the available capacity to contribute to blogs or discussions

and to respond to feedback. Interviewees indicated that many leaders felt the need to be “*seen to be doing something*” and so tended to adopt the technology for the sake of it, or because it was fashionable. One middle manager thought that

“people hardly left any comments, but I think that was done for the wrong reasons, I think it was trying to get discussion taking place without any compelling subject matter.”

Despite this, interviewees thought that in some instances, the use of Enterprise2.0 was a poor substitute for face-to-face interaction. For example, one middle manager stated that:

“if we get, if we go too far...what we actually get is...people who hide in their office, and only...communicate at arms’ length via a tool on their PC...what we need to be careful to avoid is that the technology substitutes for real relationship forming.”

The new technologies altered working practices enabling senior leadership to better communicate with employees and to enhance management briefing. Senior leaders used Enterprise2.0 technologies to communicate corporate goals and share important information. This, it was argued by many, also made leaders more accessible. Employees agreed that Enterprise2.0 helped them remain informed about what was going on in the business and of the views of senior management. For example, one individual suggested that it allowed “*that ability to listen to what’s on the mind of the more strategic players in the business*”. Similarly, leaders thought that the technology was useful to help them assess the feelings of people across the business. For example, one leader suggested:

“you can get access to information you may not otherwise see, hearing thoughts of people you may not otherwise hear.”

Some interviewees appeared to still be making sense of the technology and several asked the interviewer for clarity regarding what actually constituted Enterprise2.0. A large number of interviewees, particularly middle managers said that Enterprise2.0 was simply the latest fad and had been adopted because it was “*fashionable*”.

Given the open source and flexible nature of the technology, it is surprising that respondents rarely reported adapting and experimenting with Enterprise2.0 and only occasionally developed novel and unexpected uses. One rare example of modification involved using leadership webchats to “*test*” leaders’ public responses compared to those which are privately known, and to test whether views expressed privately are then publically expressed to a wider audience or not. However, in other business units Enterprise2.0 is not fully embedded in organizational routines or processes. In two of the business units studied individuals were concerned that technology was not widely available to staff in the field or in the customer service environments. Several individuals conveyed that the new technologies were extremely time consuming and were often hard to learn and use. This was compounded by the absence of any training or support. Indeed, interviewees’ views about maturity of adoption in Telco were mixed, with some interviewees suggesting that Enterprise2.0 use was widely accepted within the organization, and others suggesting that it could be used in a more extensive and more effective way. When asked how the actual use of the technology compared to their expectations, respondents suggested that the adoption had been slower and on a smaller scale than anticipated but that the technology did have unrealized potential.

Use of Enterprise2.0 and power, politics, decision-making and participation

[Insert Table 4 about here]

Some respondents suggested that online discussions facilitated by Enterprise2.0 were “*free-flowing*” while others thought that controversial or challenging topics were not discussed. In addition, interviewees across the organization, particularly BU1 and 3, questioned whether or not the dialogue was honest and there was some suggestion that one particular CEO’s blog could be ghost written. Respondents told us that users of Enterprise2.0 typically did not reveal their name to other users. One middle manager described how in a discussion where the ability to post anonymously had been removed, “*the contribution fell off overnight*”.

Interviewees raised a number of issues regarding how the technology is “*abused*” or used to serve political ends within the organization, either by leaders or employees. Respondents discussed a number of actions on the part of both employees and leaders described as “*politicizing the technology*”. The choice not to participate in online discussions seemed to be common among employees. In fact, it was hard to find anyone other than leaders who had personally taken an active contributory role. For example, one employee explained:

“I don’t tend to use it at all, not in terms of adding comments, posting or anything...I’m not sure how many other people do either.”

This lack of participation can be explained in part by the fact that employees commonly used “*underground networks*” for discussion rather than the formal channels. In fact newsgroups were repeatedly cited by interviewees as the place where discussion really takes place. Interviewees also suggested that when employees do engage, the online tools are often used for airing grievances. Interviewees at all levels raised this as an issue. Middle managers in particular expressed concerns that the technology was not always used constructively. For example, one middle manager observed that a “*lot of it is...whinge and moan...it’s become a*

channel for that” while one respondent told us that other Enterprise2.0 users “*often seem to approach something from the perspective of a problem*” and this often means the conversation is less than satisfactory. Interviewees also expressed the opinion that some employees “hide behind technology” by taking advantage of the facility to state their opinions without having to provide their name. In addition to remaining anonymous, middle managers and leaders also commented on how the language changed when the technology was used. One informant said that anonymity meant that:

“when people find their voice through this technology...they have more of an emotional response through the technology...people might be swearing in their comments or very emotional...because they feel it is hidden.”

A number of interviewees suggested that even when employees did use the technology, it was to discuss topics that were not of any great importance to the organization. It can therefore be seen that overall many interviewees were of the opinion that employees were not engaged with the technology.

Interviewees across the sample also discussed experiences that indicated that the technology was being politicized by leaders. Interviewees at all levels suggested that leaders often used Enterprise2.0 for the purpose of spreading “*propaganda*”. In particular, people commented on the way in which some individuals exploited the channel to serve their own purposes and the way in which the technology was treated as part of a ‘corporate machine’ so that “*leaders get to tell you what they want you to know*” and the “*party line*”. Leaders, too, acknowledged that Enterprise2.0 was used to distribute propaganda, with one stating that some blogs are:

“clearly a management propaganda tool it is like [newsdesk] on the web, you know it is sunny and upbeat and it never rains.....people just see it as just another media medium for management to get the message across.”

Other respondents thought that the blog was simply used to re-iterate existing policy and that the answers that leaders gave to questions were “*stage managed*” and “*tailored to be a bit vanilla*”. Taken together, these comments give the impression that, rather than encouraging open communication and collaboration, Enterprise2.0 is actually being used as another way of informing employees of policy and practice. There was also some suggestion that leaders might take steps to suppress the debate. For example, the fact that the ability of employees to post anonymously had been removed was discussed, with some intimation that this had stopped negative comments about the organization. Interviewees also suggested that individuals can be deliberately excluded from online discussions. Respondents thought that a number of other mechanisms that are used to suppress debate including the way that topics are selected for discussion or responses are posted and in taking controversial discussions offline so that they can be conducted in private. Other interviewees cited examples of people “*controlling the flow of information*” and “*monitoring what is said*”. Leaders are also able to control the debate in other ways such as choosing the topics for discussion, with interviewees observing that it was not necessarily easy for any member of staff to set the agenda. Another leader stated that there had been occasions that they were aware of when:

“someone was taken aside...to say...what you’re putting on there is a bit much... rein it in.”

Our findings reveal a story of large, high tech, multinational company failing to make the most of the promises of Enterprise2.0. In the next section we return to the literature on

Enterprise2.0 and technology management to help explain why this seemingly paradoxical situation arose.

Discussion

Much of the rhetoric of Enterprise2.0 in the practitioner literature suggests that the technology has the potential to deliver both business and social benefits (Gartner, 2007). Our study shows that Enterprise2.0 can be a cost and time efficient means of enhancing communication within a large multinational organization. However, we found little evidence that Enterprise2.0 was delivering the business benefits that have been claimed in the literature such as improved productivity, knowledge retention, information discovery, business agility, cross-pollination, fostering innovation, delivering competitive advantage, creating a modern workplace, increasing transparency, removing duplication and adapting processes (Hinchcliffe, 2009). Consistent with previous research on technology management our findings suggest that in order to fully exploit new technologies in a business sense, managers need to clearly define benefits during adoption and implementation (Tranfield and Smith, 1998).

Enterprise2.0 in Telco did provide respondents with access to organizational resources and to social resources which reside in the community. Within Telco one of the espoused drivers for the implementation of Enterprise2.0 was to develop and support communities of interest. Consistent with previous research (Lave and Wenger, 1991), access to social resources was of greatest value for new members of staff who could access information, ideas and advice on career opportunities from online social interaction with other more experienced community members. However, we found that the resources offered by Enterprise2.0 in Telco had instrumental value (such as access to information) rather than expressive value (such as

personal support) (Ibarra, Kilduff and Tsai, 2005) because the management failed to provide a 'safe' environment for open conversations.

Telco is a large multinational telecommunications company whose ability to compete successfully in its markets throughout its history was dependent on the extent to which it was able to exploit technological changes. It is, therefore surprising that Telco did not leverage more value from Enterprise2.0. Our study showed that the adoption of Enterprise2.0 was not uniform across business units. Some business units were early adopters (Rogers, 1964) and other business units successively adopted the Enterprise2.0 in stages but failed to reach a self-sustaining critical mass. 'Patchiness' in successful adoption and implementation is not untypical of new technology applications. In the business unit perceived to already have low levels of employee engagement in decision-making, informants told us that Enterprise2.0 reinforced the problems of employees' participation. In contrast, members of the business unit that previously had high levels of employee engagement interviewees suggested that Enterprise2.0 helped leaders be more open and accessible. Therefore, we found that Enterprise2.0 merely replaced existing communication mechanisms and reinforced existing organizational dynamics. Therefore, it could be argued that Telco engaged only in first order change (Bartunek and Moch, 1987). Bartunek and Moch (1987), argued that the implementation of new technologies often leads to 'first order', incremental or 'single loop' (Argyris and Schön, 1978) learning and change. In 'second order' change, new technology leads to the replacement of existing practices and a questioning of existing assumptions, practices, social relations and strategies. 'Third order' change requires organizational actors to develop an awareness of their current "technological frame" or "schemata" and in so doing they develop the capacity to alter it (Bartunek and Moch, 1987, p.6).

Consistent with Weick (1990) our data reveals that organizational respondents struggled to make sense of new technologies. Despite widespread use in Telco, some respondents were unclear what Web2.0 and Enterprise2.0 actually was. Others regarded it primarily as a communication device but struggled to understand whether the intention was for Enterprise2.0 to complement or replace other means of communicating. Others thought that there was too much information or irrelevant material that was causing the ambiguity regarding use. Therefore, respondents found it difficult to make sense of what, on the one hand was indispensable, and on the other, unimportant (Szulanski and Winter, 2002). Our data also revealed that many respondents were cynical about Enterprise2.0 and viewed it as simply the latest management “fad” (Abrahamson, 1991; 1996).

Advocates of Enterprise2.0 argue that the technologies are ‘open source’, ‘participatory’ (Schott, 2007, p.198) and ‘writable’ (Hodgkinson, 2007a, p.4) giving the user access to the source materials and enabling them to adapt and alter both the technology as well as the way in which it is used (Gregory, 2007). It is, therefore, surprising that our study uncovered few examples of technological adaptation and modification in use (Yates and Orlikowski, 1992). Instead, we found that users drew on existing communication practices and habits previously developed with other genres of communications technologies (Yates and Orlikowski, 1992). Respondents suggested that resource constraints, an absence of explicit guidance, training and support, coupled with the extensive time and effort required to learn how to use Enterprise2.0, restricted uptake, use and experimentation. Further, respondents told us that Enterprise2.0 sometimes created information overload, creating ambiguity about what information is vital and what is trivial (Szulanski and Winter, 2002).

Issues relating to power, politics, decision-making and participation have been raised in the nascent literature on Enterprise2.0. It has been suggested that blogs are an effective tool for enhancing employee engagement and to help in “creating a two-way dialogue with senior executives” (Gregory, 2007, p.1). Lai and Turban (2008, p.400) argued that the major reasons to use Enterprise2.0 were “flexibility of adding more modes of collaboration, the accessibility of wikis and blogs by all... and the control of content by users”. Leidner et al (2010) also reported the use of Enterprise2.0 to allow employees opportunities including networking with top management and O’Reilly (2005) described Enterprise2.0 as the ‘architecture of participation’. Our findings reveal a mixed picture. Some respondents thought that Enterprise2.0 made leaders in Telco more accessible, whereas others told us that Enterprise2.0 use in Telco was used to inform rather than engage employees.

Tapscott and Williams (2007) recognized that Web2.0, with its sense of openness, democratization and the ceding of control to the organization at large, presents challenges to the established cultural and leadership norms. Hodgkinson (2007a; 2007b) suggested that leaders will need to provide a facilitative and moderating environment and must ‘let go’ of their traditional tight controls, and work to foster collaborative use of the new platforms. McAfee (2006) argued that leaders must first encourage and stimulate use, then refrain from intervening too often or with too heavy a hand. He questioned whether or not managers will silence dissent, how they will feel about the apparent loss of control and asks whether or not managers and leaders will exert pressure (subtle or not) to close down the online content (Gartner, 2007). Bradley (2007, p.4) advised organizations to ‘err on the side of too much liberty (since) users must feel comfortable knowing that they can participate without fear of reprisal’, suggesting that too much control is incompatible with the Web2.0 ethos and that leaders must nurture participation and actively participate themselves. In other papers,

Gartner cautioned that ‘the benefits of Enterprise2.0 will come only from considerable change to existing sources of power, authority and control’ (Raskino, 2007, p.7).

Consistent with Mazmanian, Yates and Orlikowski (2006), we found that the routine contribution of some senior leaders created coercive norms which ensured that members of the management team felt compelled to continue to play a part in online discussions and explicitly demonstrate their commitment to Enterprise2.0. In common with previous literature (Waldman, Atwater and Antonioni, 1998) we found that Enterprise2.0 was used for propaganda, to promulgate the company line and for self-promotion. Some Telco employees were able to communicate “oppositional discourse” using Enterprise2.0 and could ‘hide behind the technology’ (Da Cunha and Orlikowski, 2008) when venting their concerns and frustrations.

The study also exposed attempts by leaders to limit discussion and decision making to ‘safe’ issues. The result is that while some issues are open for heated debate and decision making, other issues are completely excluded from consideration and deliberation (Bachrach and Baratz, 1962). Some leaders engaged in neutralisation tactics (Hammer, Currall and Stern, 1991; Johnson, 2006), such as the screening of questions, threatening disciplinary action, closing down certain discussions by removing anonymity and influencing the choice of questions to be answered or the topics that put forward for discussion.

Implications

These findings have important implications for organizations. This paper has clearly highlighted some of the difficulties in introducing Enterprise2.0 as a means of promoting communication or collaboration and the tensions that seem to exist between the desire for

open communication and the realities of leadership and organizational dynamics. Organizations should not underestimate the potential impact of these issues on the successful implementation of Enterprise2.0. The introduction of the technology alone is not sufficient to result in open collaboration and communication; rather a more dramatic change of organizational culture is needed to overcome the barriers associated with organizational politics. In order for this to be achieved, a change in leadership style may be required to one that is more collaborative and distributed. As the success of collaborative Enterprise2.0 tools are so dependent on leadership style, we might return to Tapscott and Williams question as to whether the minds of leaders are “truly wired for Wikinomics”. It seems that some leaders will find it difficult to embrace the changes in working that Enterprise2.0 may be designed to encourage.

Organizations also need to take steps to ensure that both leaders and employees make time for regular use of tools such as blogs. Additionally, organizations should ensure that the purpose of the technology is clear to all and that employees are trained in the use of Enterprise2.0 tools for collaboration and communication. Employees need to believe that it is safe to speak up. The change to a more open and communicative culture should help employees to feel more comfortable with speaking up but this could be achieved by allowing anonymous contributions to blogs etc. Finally, and most importantly, organizations should take steps to ensure that Enterprise2.0 does not merely constitute another method for informing employees of organizational practice and of circulating organizational propaganda. This can be achieved by ensuring that employees’ comments are properly responded to and acted on if necessary. It might be necessary to appoint an individual or team to take responsibility for this so that the appropriate responses to comments are provided.

Conclusion

Recent practitioner literature has espoused the use of Enterprise2.0 technology in order to improve communication, collaboration and participation within organizations. Whilst many commentators herald Enterprise2.0 with great promise, seeing it as potentially transformative, other foresee challenges that go beyond the traditional issues associated with technology implementation, and anticipate problems that arise as a result of the challenges to existing and established cultural and organizational norms and habitual practices.

An important question to ask is whose purpose is served by the technology? Particularly when the interventions appear to become a form of propaganda or self-promotion on the part of leaders, or where leaders use Enterprise2.0 for surveillance or suppress discussion. Some believe that the delicate balance, and the time, effort and trust needed on the part of both leaders and employees means that the practitioner expectations may not be satisfied. It appears therefore that the problems inherent in this approach lie not with the technology itself but with the motives and behaviour of the respondents involved. Enterprise2.0 so it seems, is subject to the age old issues of power and politics that commonly affect the implementation and use of information and communication technologies in organizations and lead to a lack of success in adoption coupled with the failure to achieve full exploitation.

Our data challenges the assumption that Enterprise2.0 is “social”, “open” and “participative”. While the use of Enterprise2.0 within our case study has been driven by the goals of improving collaboration and participation, the actual experience of respondents within the organization casts some doubt upon whether these objectives have been achieved. The use of Enterprise2.0 in Telco may have allowed senior management to communicate more easily and efficiently with the workforce, but factors such as non-uniform adoption, restricted

access to discussions and politicization of the technology have all affected the level of reconfiguration of participation and nature of communications in such a way that the technology cannot truly be described as “social”, “open” and “participative”. At present, Enterprise2.0 technologies offer considerable promise for (re)defining the workplace of the 21st century. However, our findings suggest that, just like a myriad of discontinuous technologies before them, success in adoption and effectiveness in full exploitation will prove elusive. Our view is that achieving these elusive goals will be dependent on reconfiguration and redesign of the whole socio-technical and managerial system, coupled with a heightened sensitivity in implementation. Otherwise, organisations will discover that once again, mere installation is not enough.’

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Figure 1: Selected examples of Enterprise2.0 use

Organization	Enterprise2.0 use
Sun Microsystems	Blogging policy to encouraged employees, partners, customers, analysts and other interested parties to comment on Sun and its products (Gordon, 2006).
Dresdner Kleinwort bank	Wikis to complement standard collaboration tools within its global teams. The wikis provide a comprehensive audit trail (Lai and Turban, 2008)
Eli Lilly	“Innocentive” was created by to provide an eBay-style interface to connect Research and Development departments of large firms to a global network of innovators (Tapscott and Williams, 2007, p.97)
Linklaters	Linkpedia an internal version of Wikipedia, has been developed to allow employees to organize and share knowledge (The Lawyer Contributors, 2007)
AMD	A virtual Second Life pavilion has been created by where current and previous employees can meet, network, attend lectures and training courses or visit the exhibition hall (Libert and Spector, 2008, p.31)
British National Physical Laboratory	Creation of an avatar-based ‘Nanotechnology Island’ to facilitate scientific discussions and meetings (Humphrys, 2008, p.41)
General Motors	Formation an executive blog, “FastLane” (see Economist Intelligence Unit, 2007, p.3)
Royal Bank of Scotland, KPMG and Wells Fargo	Recruitment fairs on Second Life (Hoover, 2007, p.25).

Table 1: Summary of business units

	Business Unit # 1	Business Unit # 2	Business Unit # 3
Employee Participation levels	Low	Moderate	High
Enterprise2.0 Adoption	High	Moderate	Low

Table 2: Drivers and perceived benefits of Enterprise2.0

Topic / Theme	Quotes from interviews	Exemplary Quotation
Engagement Driven by a desire to engage, or an expectation that it could enhance engagement	59	<i>"[business unit CEO] strives to be seen as much more open...much more accessible...much more prepared to talk to...our people...I think it is a way of addressing the issue of our senior leaders, in fact our most senior leader in the organization being seen as accessible..."</i>
Fashion Driven by trend, fashion or fad, or expectation that this was seen as the right thing to do	24	<i>"...[business unit CEO] is quite an advocate of Web2.0 [aren't they] and [they] use wikis, and to be blunt the reason I used wikis in the first place is because of [business unit CEO]"</i>
Collaboration Driven by a desire to enhance collaborative working (including information or knowledge sharing and developing communities of interest), or an expectation that it could help	66	<i>"...what we are trying to do...is get a...community environment going, where we can have a sharing of ideas...social networking but applied in a work environment, all based...around...the common theme we have"</i>
Briefings Used for management briefings	18	<i>"...after every set of quarterly results, [business unit CEO], and [business unit CFO] will host...a webcast or a live meeting...they will go through the set of results and particularly what it means for [business unit] and its people..."</i>
Discussion Forum Used to facilitate discussion and feedback	11	<i>"...the best blog that I've seen within [organization]...was when someone posted something about the showers in [HQ building] not working, and that created a huge amount of interest, and...some really really amusing insights"</i>

Table 3: Influence of contextual factors on experiences of Enterprise2.0

Contextual factor	BU1	BU2	BU3
Safe to speak up	<p>People were hesitant about speaking up <i>“I think you are encouraged to do so, but does it mean it’s safe? It all depends on what you mean by safe, but I still think people tend not to because they are not confident it’s safe. It’s encouraged but people would think twice about posting certain things I think”</i>.</p>	<p>People did speak up but this was in a controlled fashion <i>“When we did the [roadshows] there was a lot more cynicism about [the network] than has come through on the blog. Many of the subjects are the same ...but comparatively in a controlled and pleasant way”</i></p>	<p>People don’t feel it is safe to speak up despite high employee engagement levels <i>“what was interesting on this online chat was that the two people choose to remain anonymous as people don’t feel that they can speak up ...whereas from the [employee engagement survey] they say they do feel it is safe to speak up. Today’s experience would suggest that there are some issues that they don’t feel confident about putting their name to”</i>.</p>
Perception of community	<p>People thought a closer affiliation to their team so interventions were seen as more successful at this level. <i>“It works intra-team I would say, more than it works up and down”</i>.</p>	<p>People thought an affiliation to parallel organisational networks such as management groups so the interventions were seen as more successful at this level. <i>“The very nature of the guys who are in the community are very interested in the technology and trying to engage people in very creative and innovative ways”</i></p>	<p>People did not feel an affiliation to the organisation and this was seen as a reason the interventions were failing. <i>“I don’t think it works for me. If I thought part of the community I would take a view – I tend to be more focused on what I am doing..I’d rather spend time doing my stuff and my team’s stuff than wider”</i>.</p>
Nature of the team and work	<p>People are conversant with technology so the intervention was seen</p>	<p>The age profile and nature of the work were seen as factors that limited the</p>	<p>The nature of the work (customer service) and the expectations for</p>

	<p>as successful. <i>“When we’re working with IT techy people it probably appeals to them”.</i></p>	<p>success of the technology. <i>“The average age across our community is 40 so you have people who are not familiar with the technology or they may not have access to it.... it may be prohibitive to a certain audience”</i></p>	<p>efficiency were seen as prohibitive. <i>“I do know there is a much heavier drive for effectiveness measures for customer service agents and it may affect their ability to get engaged and be involved in debates”.</i></p>
Culture	<p>People do not expect to be heard <i>“I don’t think they’re unhappy at being challenged but they won’t bend as a result”</i></p>	<p>People experience engagement with their leaders. <i>“From the very beginning we coached our leaders to be appreciative of an open question and often an open or tense question can be a sign of someone who is highly frustrated and if answered correctly they can become an advocate”.</i></p>	<p>People expect conversation to be closed down. <i>“If someone raises something unpalatable then the management approach is to actually to close it down as quickly as possible”.</i></p>
Leaders	<p>People thought that the autocratic leadership inhibited online discussion leading to a superficial discussion. <i>“It is a very personal thing and I think it’s about [the leader’s] style... so while they would like to be seen as open, accessible and involved in a dialogue, they still very much position themselves as the person in charge”.</i></p>	<p>The emphasis was on authentic leadership adoption. <i>“We very much want the leaders to have their own tone of voice and ...we suggest they put it in their diary say two times a week to look at their blog ...we don’t think it’s very authentic if they don’t do it”.</i></p>	<p>It was thought that the leader was not comfortable with the technology and that this inhibited its use. <i>“I think there’s a bit of work to be done for [the leader] to feel confident using this as a means of having a conversation with people in their business”.</i></p>

Table 4: Use of Enterprise2.0 and power, politics, decision-making and participation

Topic / Theme		Quotes from interviews	Exemplary Quotation
Politicisation – By Employees The use of the technology to serve political ends by those within the organization, may include power, suppression, hiding behind the technology or other forms of abuse. What abuse is described, observed or associated with the intervention. By Employees	Don't Join In Employees do not join in or do not speak up	183	<i>“you have a large body of people who keep their heads down don't want to be seen to be having an opinion about what the leadership are doing”</i>
	Underground Networks Employees resort to using 'underground' less public or less official networks	16	<i>“if it is working I suspect it is working on a smaller scale, where I wouldn't really see it”</i>
	Airing Grievances Employees use the interventions to air personal grievances	66	<i>“people bitch and moan about [business unit CEO]...they give off”</i>
	Hide Behind Technology Employees exploit the anonymity or some other aspect of the technology or behave differently as a result	48	<i>“when people find their voice through this technology...they have more of an emotional response through the technology... people might be swearing in their comments or very emotional...because they feel it is hidden”</i>
	Organizational Non-Citizenship Employees may engage but not of on matters of importance to the organization	65	<i>“you won't get people going back to [business unit CEO] or the top team asking about strategy and detail”</i>

Politicisation – By Leaders The use of the technology to serve political ends by those within the organization, may include power, suppression, hiding behind the technology or other forms of abuse. What abuse is described, observed or associated with the intervention.	Propaganda Used to perpetuate the company line or for self-promotion	137	<i>“I have been on blogs where it is clearly a management propaganda tool...it is sunny and upbeat and it never rains...people just see it as just another media medium for management to get the message across”</i>
	Opting Out Leaders choose not to engage with the technology, or choose to ‘ghost-write’ their contributions	136	<i>“it isn’t...something that [business unit CEO] actually writes [themselves]”</i>
	Suppress Debate Leaders suppress debate through agenda setting, the nature of their responses, taking the discussion offline or other controls	85	<i>"someone was taken aside...to say...what you’re putting on there is a bit much yeah, rein it in”</i>
			<i>“we generally try and close things down...what we will try and do is answer in such a way that no one else feels they should comment on it, or ask another question...generally the response has been one of try and close it down rather than allow it to run and run and let people have their say...”</i>
<i>“leaders tend to lead the subject areas for debate...I don’t know how much an individual could set the agenda”</i>			
<i>“we definitely screen questions to make sure that they’re not inappropriate...sometimes we have the name of the individual supplied and we will...contact them offline...to close it but not embarrass them by putting it out publicly...if you didn’t screen it...people would be disciplined...and the business people screen it so we can reject</i>			

			<i>whats coming in as well”</i>
	Seen To Be Doing Something Leaders adopt the technology for the sake of it	47	<i>“the comms guys...put this forward...you know we must drive more of the debate you know onto this kind of media”</i>
	Alternative To Face-to-Face Leaders use the technology as an alternative to face-to-face communication	43	<i>“I don’t have to travel all over the country all of the time, which is a clear benefit, I am quite busy and it eats up your time...in terms of me going over there and talking to people...it takes a big bite out of your calendar”.</i>