

## **DISTRIBUTED LEADERSHIP AND THE VISIBILITY/INVISIBILITY PARADOX IN ON-LINE COMMUNITIES**

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**Abstract:** *This paper analyzes the role of distributed leadership in three on-line communities, reflecting on an observed visibility/invisibility paradox in leadership within these communities. Leaders who downplay their seniority and assume a degree of invisibility, allocating discretionary powers to subordinate levels in an organizational hierarchy, may facilitate the emergence of distributed leadership. Yet, simultaneously, leader-led relations are enabled by high leadership visibility. This paradox—that leaders need to be both highly visible and also invisible, or hands-off, when the occasion requires it—was derived from prior research into e-learning communities and tested in the analysis of discussions from on-line communities using a case study pattern-matching process. The operation of both visibility and invisibility in leadership is a key issue for enabling effective collaborations in distributed leadership situations based on trust. Such collaboration fosters positive group interaction and participative decision making in a consensus facilitated through leadership distribution amongst on-line community members.*

**Keywords:** *distributed leadership, on-line communities, visibility/invisibility paradox, e-learning leadership, case study methodology, pattern-matching, leadership, ambiguity.*

### **INTRODUCTION**

An on-line community has been defined as “a collective group of entities, individuals or organizations that come together either temporarily or permanently through an electronic medium to interact in a common problem or interest space” (Plant, 2004, p. 54). Plant noted in 2004 that there were an estimated 400,000 communities on the World Wide Web, with over 300,000 on-line topic-based discussion boards used by such communities. Recently, however, global interest in social networking has accelerated markedly: in 2010, it was estimated that the active unique audience for social networking sites globally grew by around 30% in one year, from 244.2 million to 314.5 million (Nielsen Wire, 2010). Although Datamonitor predicted in 2007 that the growth in social networking would flatten out by 2012

(Pierce-Grove, 2007), more recent data indicate that social networking is still on the rise (Nielsen Wire, 2010). The QQ social network in China, now arguably the largest in the world, has around 637 million active users, while Facebook has more than 517 million such users (Tencent, 2011; Miniwatts Marketing Group, 2010). Within the general category of on-line communities, Boyd and Ellison (2007) defined social networking sites as

web-based services that allow individuals to (1) construct a public or semi-public profile within a bounded system, (2) articulate a list of other users with whom they share a connection, and (3) view and traverse their list of connections and those made by others within the system. (p. 1)

While social networking sites have grown massively in number and developed their membership globally, so have the communication processes involved in these and other on-line communities. Web users have gradually become more sophisticated, demanding, and expert participants in on-line systems. Simultaneously, on-line community sites have adjusted to early problems and scandals identified in, for example, anonymous or pseudonymous use. As Grohol (2006) noted, the occasional havoc created by the excesses of early user disinhibition in on-line communities resulted in increased monitoring and control.

Thus, refinements in on-line reputation monitoring systems, membership registration, moderation and evaluation of discussion boards, and other forms of scrutinizing on-line user contributions have gradually emerged, as has consciousness about issues such as identity theft. Given the potential problems with regulation and safety in on-line communities and the importance of effective site organization, the requirements for on-line community leadership in the form of facilitation or moderation have begun to be specified, for example, in on-line learning sites (Salmon, 2000). These include also the establishment of systems for monitoring access and security permissions; shared ground rules and clear registration systems; high quality relevant content; support for community and member identities; active member-driven participation; reliable, responsive and consistent member services; and a culture of trust, openness, and mutual respect. Forum One Communications carried out research in 2008 to identify the most important factors in establishing an on-line community culture. Respondents thought the second most important factor (after “quality, up to date content”) was “strong moderation/facilitation” (Forum One Communications, 2008). This echoes the earlier findings of Crawford that some form of facilitation by a leader of an on-line community is now an essential requirement:

The facilitator is absolutely indispensable. There needs to be somebody —whoknows” and who has a role as leader to take participants gently into the community and make them feel welcome — part of the community. They need to be obviously keen on the system and dedicated to making it work. An enthusiast. (Crawford, 2002, p. 441)

Assuring the effective leadership of on-line communities is, in fact, an essential prerequisite for safe and harmonious participation by members in these groups. Such leadership is also arguably best achieved through a distributed form of power-sharing, as this paper will argue. The paper analyzes the role of distributed leadership in facilitating and participating in a number of on-line social networking communities, reflecting on the nature of an observed *visibility/ invisibility paradox* in the leadership demonstrated within several of

these communities, and the potential of distributed leadership to offer theoretical and practical solutions to effective on-line community organization.

## The Emergence of Distributed Leadership

Executive managers within traditional hierarchical structures in public-sector and government organizations are finding it increasingly difficult to deliver innovations effectively using top-down command and control systems, as Senge (1996, p. 2) noted some years ago in his reflections on successful learning organizations. By contrast, the power of flexible community and team leadership has substantially grown in an era increasingly influenced by on-line communications, including those involving on-line social networking. Analyzing the rapid emergence of the movement towards distributed leadership in education, Hartley (2007, p. 209) reflected on Page's (2006) view that in "contemporary culture there is a trend 'from organised social structure to network culture'...what Bauman (2000) calls 'liquid modernity'" since "[d]istributed leadership, dispersed across and within agencies, strikes a chord with the flexible 'liquid modern' view of time and space." Whether or not we agree that the recent popularity of distributed leadership is evidence of Zygmunt Bauman's liquid modernity or we give credence to the latter at all, distributed leadership indisputably has been on the rise for some years, as other researchers have also observed (Harris, Leithwood, Day, Sammons, & Hopkins, 2007). The kinds of shared adaptive group leadership approaches broadly envisaged in the concept of distributed leadership tend to be characterized as "non-management," agility, and de-centralization, with a relative downplaying of the role of authority in structural hierarchies (Heller, 2006a, 2006b). As Hartley noted in 2007,

Distributed leadership has currency: its time has come; it is the "new kid on the block" (Gronn, 2006, p. 1), "in vogue" (Harris, 2004, p. 13), attracting "growing attention" (Hoyle and Wallace, 2005, p. 192). Since Gronn's preliminary taxonomy of distributed leadership (Gronn, 2002a, p. 435), it has turned into something of a social movement. The National College for School Leadership (NCSL) in England now has its own dedicated *Distributed Leadership* website (NCSL, 2006). In the USA, there is a similar trend. (p. 202)

Distributed leadership is enabled by leaders who subtly downplay the seniority of their roles and render some aspects of authority slightly invisible, allocating discretionary powers to those in subordinate layers of their organizational or project team hierarchy. Such an approach is likely to garner more buy-in for innovations from all levels of the organization than would top management attempts to enforce change through coercion. There is latterly a drift towards the validation of "softer" leadership approaches that respect social-emotional trust facilitated by communities within organizations rather than of the rational authority of management imposed through positional structures. As Hartley observed,

Biggart (1989) concludes that firms can no longer control workers through rational-legal (that is, bureaucratic) structures: "Independent work that relies on solidarity, respect, or mutual trust, is poorly served by bureaucratic structures that create authority differences" (p. 169–170). The slippage from management to leadership since 1989 has resonated with an increasingly premodern atavistic tendency within the broader culture towards communities whose basis is an appeal to the non-rational. For example, in a recent MORI poll, it was noted that there was a "drift from [the] rational to polysensuality"

(Page, 2006, unpaginated). This emotional turn is also to be seen in educational management. (Hartley, 2007, p. 208)

The emotional turn Hartley identified is supported by Page's presentation in UK Ipsos MORI social demographic and organizational trends data for 2004-05 in comparison with 1979, in which he reported that "Polysensuality is [the] fastest growing British trend. [There is g]reater trust in a nonrational approach to make sense of the world" (Page, 2006, p. 19). This trend also has been accompanied in the UK by a rise in skepticism, anxiety, consumer expectations and autonomy, an increase in university participation, a widening rich-poor gap, erosion in government credibility, and increased feelings of remoteness from central institutions (Page, 2006, p. 19).

Possibly (but not necessarily) linked with these trends, leader-led relations in education are, as the UK Office for Standards in Education (Ofsted) inspection services would have it, demonstrably facilitated by the high visibility of senior leaders, particularly in so-called failing situations. Ofsted (2008, p. 8) noted, "In the early weeks following special measures the highly visible presence of senior leaders in corridors and in classrooms was seen as important." Yet in the wider world of communities outside schools, there is evidence of an increase in skepticism towards authority, allied with increasing consumer demand for authenticity (Page, 2006, p. 37). This, combined with greater scrutiny of institutions and anxiety about governments in the wider population, gives rise to a paradox: Leaders need to be highly visible and yet invisible, or hands-off, when the occasion requires it.

This is, arguably, a key issue in the formation of effective collaboration in distributed leadership situations based on trust—that leaders are more trusted when they are both authentic as positional authority figures and also capable of stepping back from the limelight to become team players (Jameson & Andrews, 2008; Jameson, Ferrell, Kelly, Walker, & Ryan, 2006). The ability to be an effective collaborator fosters participative decision making and is further facilitated through the active distribution of leadership among members in on-line communities. Thus, effective leaders of on-line communities continually face a paradox in their decisions on how best to lead their members.

A paradox is a statement or situation providing a resolution of opposites that appears to be in conflict with logical expectations but in reality expresses some truth. Such a statement is either true or seems to be true, but it also encompasses a contradiction or situation that apparently defies intuition. Take, for example, the paradox in the biblical scriptures: "Whoever shall seek to save his life shall lose it, and whoever shall lose his life shall preserve it" (Luke 17:33).<sup>1</sup> The resolution of the apparent contradiction in this statement is achieved through awareness of the deeper understanding that, paradoxically, a self-centered grasping attitude to keep one's own life at all costs ultimately puts people in general, and perhaps oneself, at greater risk of loss of life than selfless generosity towards others, which in turn leads to greater shared freedoms for the community and better survival for everyone. This deeply paradoxical statement operates on a number of different levels, from the spiritual to the pragmatic.

In similar manner, stating that the best leaders are both visible and invisible appears to contain a contradiction. It seems logically impossible for leaders to be simultaneously visible and invisible. Yet the seeming contradiction expresses a deeper truth: "Followers" arguably benefit from leaders whose presence is to some extent veiled, so that they envisage group achievements as their own. Such a perspective was known already in ancient Chinese philosophy: "A leader is best when people barely know he/she exists" and "When the best leader's work is done the

people say, “We did it ourselves!” (Lao Tse, 2009, Chap. 17, sentence 3). However, followers also benefit from having leaders who are very visible when necessary, close at hand. Leaders should guide the people both invisibly from behind, as in the oxymoron, “In order to lead people One must follow them” (Lao Tse, 2009, Chap. 66, sentence 2), and visibly from the front, “The people will not feel like they are being manipulated, if a wise person is in front as their leader. The whole world will ask for her guidance, and will never get tired of her” (Lao Tse, 2009, Chap. 66, sentence 3). Leader visibility is best achieved effortlessly, without the leader trying too hard: “Display yourself and you will not be clearly seen; Justify yourself and you will not be respected” (Lao Tse, 2009, Chap. 24, sentence 2). For, paradoxically, and apparently beyond reason, leaders are more effective in being visible when they carry their authority lightly: “True wisdom seems foolish. True art seems artless” (Lao Tse, 2009, Chap. 45, sentence 1).

Therefore, in some situations it may be better for leaders to downplay their role and act in a low-key way, demonstrating humility (Collins, 2001) by stepping back from the limelight. Yet, in other situations, followers need leaders who clearly outline the mission of the organization, define its meaningfulness, articulate the interests of the people, and delegate leadership tasks and responsibilities to others, thus providing the kind of trusted certainties that, in an age of anxiety, many people may need. The operation of relatively flatter structures of distributed leadership can therefore arguably facilitate bottom-up commitment to innovation in public sector educational organizations (Jameson, 2007b). By contrast, as Senge noted regarding top-down hierarchical management, the coercive pressure of managerial power in such institutions does not tend to result in commitment from people at all levels:

The more strongly hierarchical power is wielded, the more compliance results. Yet there is no substitute for commitment in bringing about deep change. No one can force another person to learn if the learning involves deep changes in beliefs and attitudes and fundamental new ways of thinking and acting. (Senge, 1996, p. 2)

It is argued here that on-line communities benefit from low-key informal leadership that operates within a team ethos of equality, in which competition is minimalized, and communities of practice (Wenger, 1998) models of social engagement are facilitated (JISC infoNet, 2006). This avoids well-known problems reported as policy-led top-down micromanagement control by senior leaders, characterized by critics as interventionary “new managerialism,” in which reductive performativity can reduce levels of trust (Ball, 2003). Prior literature demonstrates that humility, humor, and bottom-up processes of team empowerment can be facilitated through “relational intelligence” (Collins, 2001; Regine & Lewin, 2003) intentionally fostered by the leaders of such communities. It has also been found that creative willingness to share leadership tasks and responsibilities in a distributed-coordinated team model are among those features that tend to result in highly successful teamwork (Ancona & Bresman, 2007; Bennis & Biederman, 1997; Jameson et al., 2006), while cultural and communicative intelligence seem to be important attributes of emerging leaders in leaderless internet environments (Kelly, Davis, Nelson & Mendoza, 2008).

### **Hypothesis About Leadership Derived from the JISC Project**

The first contribution to this paper was provided in a hypothesis about leadership derived from the analysis of 21 in-depth case studies, including individual and collaborative studies,

produced by the team engaged in working on the eLIDA (e-Learning Independent Design Activities) CAMEL (Collaborative Approaches to the Management of e-Learning) design for learning project (Jameson, 2007a, 2008; JISC, 2007). The theory that a combination of visibility and invisibility in leadership is needed in on-line communities emerged from face-to-face and on-line community interactions in a Joint Information Systems Committee (JISC)<sup>2</sup> e-learning project. During the evaluation of the JISC-funded eLIDA CAMEL project's on-line community interactions in 2006-2007, a hypothesis emerged that a visibility/invisibility leadership paradox existed in on-line interactions: That is, leaders needed to be both highly absent and highly present for the effective framing of such communities.

The eLIDA CAMEL project implemented and evaluated learning design tools in higher and further education within the JISC Design for Learning pedagogic e-learning program in 2006-07. The project partners collected design-for-learning case studies and learning design sequences from universities, colleges, and schools using LAMS and Moodle platforms to contribute their own user evaluations of the learning design functionality of innovative tools used in the classroom. Project partners also participated in on-line community discussions in a distributed team model of leadership in which both tasks and responsibilities were shared (Jameson, 2007a). The project brought together learning activity sequences from 10 post-16/higher education partner organizations into a collaborative e-learning community of practice based on the CAMEL model for communities of practice (JISC infoNet, 2006) that has led to a range of national and international partnership developments in e-learning.

Among the technologies and resources used by practitioners within the project were tools within LAMS and Moodle. These included, for example, a project wiki, chat, forums, quizzes, Web pages, journals, presentations, labels, glossaries, and external resources. Overall, results from the project indicated that project leadership was well regarded by team members. Everyone knew who the leaders were, and in that sense leadership was both visible and accessible. However, they also perceived the leaders as low-key or almost invisible, so that the greater focus was on the team itself and its working processes and achievements, rather than on the leaders. The on-line Moodle environment was heavily participative, with a greater number of inputs and responses being posted by practitioners than project leaders. At the end of the project, an external team member wrote in her summative evaluation of the project that she had observed an increasing tendency towards vocal appreciation of the efforts of other team members during the project and therefore a high degree of relational intelligence and trust between members:

It has been interesting to observe how the group has ~~—gown~~ "grown" over the time of the project—at first there was a slight wariness between the two groups that had come together. But trust developed very quickly; perhaps due to the fact that all the partners are committed to the project, the practitioners are reflective practitioners .... and the CAMEL model encouraged an openness and honesty.... During initial meetings partners were keen to work together as they were all bringing something to the table to share. Increasingly partners would discuss issues they encountered in their own institutions, whether positive or negative, during their feedback/update sessions. Discussions would often take the turn where partners had encountered a problem and other partners would offer advice/guidance. Partners also became increasingly complimentary of others' work and achievements. (eLIDA CAMEL external agency representative: summative report)<sup>3</sup>

Participation within social events was a formal part of the project. Such events consciously sought to develop a community of practice approach, as the following demonstrated:

Repeated informal relaxed process[es] helped build good, solid working relationships as seen at the end of the project, as well as more lasting friendships, where partners grew in confidence and expressed honest opinion. (eLIDA CAMEL external agency representative: summative report).

One aspect of the project's closure focused on the sustainability of design-for-learning work within the partners' institutions. In eLIDA CAMEL on-line survey team responses, partners claimed they would miss the following aspects, which related both to the partners and the leadership within the project team. Comments written by the team members included,

- Constant support and positive attitudes of partners
- Enthusiasm for using technology to transform teaching and learning, which is not shared by some senior management within the institution
- Encouragement to succeed and drive innovation
- Acknowledgement and praise of my team's work
- The use of the partners' servers
- An independent voice that raises important questions.

An understanding of the paradoxical nature of leadership, and its necessarily liquid flexibility in such groups, is useful to support effective functioning. This paper examines the nature and practice of a visibility/invisibility paradox observed among the distributed leadership operating within a number of on-line communities. These communities included (a) an externally funded project team using Moodle for on-line interaction, and (b) three subgroups within an on-line community social networking site.

## METHODS

The visibility/invisibility paradox hypothesis about leadership developed in the eLIDA CAMEL project needed to be tested independently in a different on-line community context. For the current paper, three randomly selected on-line community discussions that had taken place in a social networking site during spring 2009 were recorded and analyzed, as outlined in Table 1. The selected social networking site is set up as a worldwide charity, with members providing educational, charitable, and environmental donations and participating in a wide range of activities and discussions.

The large social networking site has more than 5 million members worldwide, although the particular group of activities from which the three discussions were recorded and analyzed has more than 3,000 members participating. At any one time within the social media conversations in this group, there are around 10 different discussion threads in operation, in which a small number of participants (10-20) are regularly active, that is, participating in a variety of conversations. Membership is voluntary and free, and members come from many different types of backgrounds.<sup>4</sup> Overall three people operate as formal site hosts, and are the leaders with a formal management role within this group of activities. However, a range of other kinds of leaders also act, including volunteer discussion leaders, subgroup leaders with

**Table 1.** On-line Community Case Study Participation.

	<b>Case Study 1 New Initiative</b>	<b>Case Study 2 Technical Issue</b>	<b>Case Study 3 Spammers Issue</b>
Nature of group	Subgroup within free on-line charitable social network: discussion group led by a formal site host acting as a discussion leader	Subgroup within free on-line charitable social network: discussion group led by an informal volunteer discussion leader	Subgroup within free on-line charitable social network: discussion group led by an informal volunteer discussion leader
Number of participants in group overall	3,000+	3,000+	3,000+
Number of actual participants in discussion	15	17	15
Leadership in the discussion	1 discussion leader, also a site host; 2 other site leaders, 1 subgroup leader	1 discussion leader, no other leadership evident	1 discussion leader, input by site host during the latter part of discussions
Number of postings overall	69	111	86
Duration of discussion	5 days of postings over a period of 8 days	3 days of postings over a period of 3 days	6 days of postings over a period of 8 days

a volunteer role in leading particular issues in different groups, and managers from the wider overall social networking site who visit and monitor various forums from time to time. The findings of three case studies selected are provided below.

I used a mixed methods analysis to investigate the extent to which a distributed leadership hypothesis about the visibility/invisibility of leadership derived from earlier work was replicated. The hypothesis that leaders need to be both highly absent and highly present in on-line communities was tested by recording and analyzing three randomly selected conversation threads from hundreds that were taking place in an open area of the site over several days during one particular week. These conversation threads were then, and still are, typical of the kind of conversations that occur in this global social network charitable site every day. A quantitative and qualitative conversational analysis of asynchronous conversational interaction in the on-line polylogues (Marcoccia 2004) created among members and leaders in the social networking site was carried out, using a case study pattern-matching methodology to analyze conversation threads. This process was devised from replicating Lambe (2006)'s work on the analysis of conflict in on-line communities as well as Marcoccia's (2004) work in analyzing written conversation in on-line newsgroup polylogues.

The next section provides the analysis of conversation patterns in threads of on-line messages for the presence and absence of distributed leadership. In the Discussion section that follows, I make recommendations for fostering improved distributed leadership in on-line community conversations, and then draw conclusions.

## FINDINGS

### Case Study 1, New Initiative: Effective Leadership

A group leader, Kipper,<sup>5</sup> opened this discussion by making an announcement regarding a new initiative to be introduced in the site. The discussion eventually involved 69 posts. The announcement was received favorably, with a range of comments from users welcoming this news as *wonderful*<sup>6</sup> and only one critical comment from a member who noted a problem with terminology with respect to one aspect of the initiative. This mainly positive discussion received no further information updates or other posts for a couple of days. On Day 4, Kipper repeated the announcement and added further information, stating that the site was featuring items relating to a number of aspects of the initiative. A wide range of comments followed, mainly positive or neutral, with a few critical comments being made regarding some aspects of the launch of the initiative. Mary, a subgroup leader, answered some of these queries in a helpful response on Day 5. Both positive and neutral replies followed this.

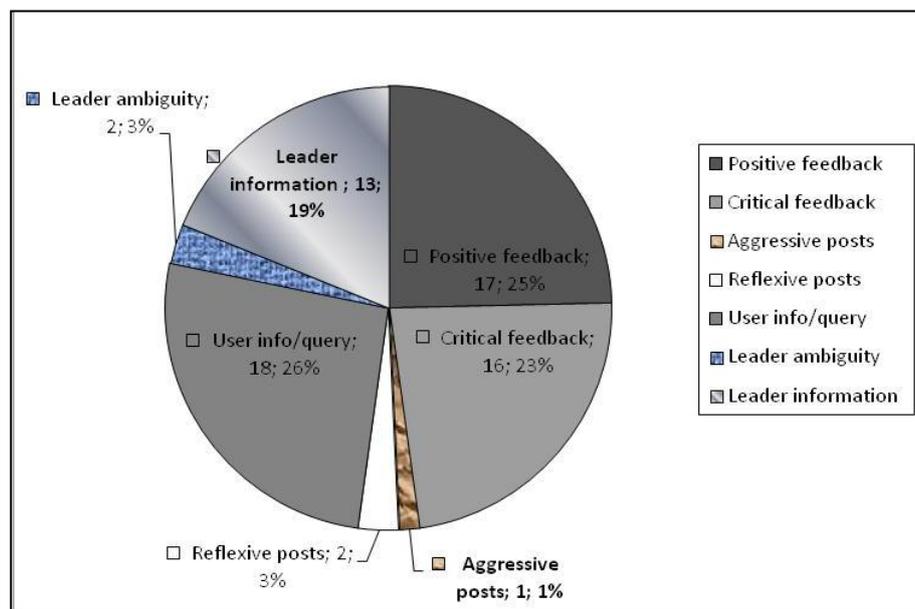
After a day's break, the conversation was reopened on Day 7 by Laura, another site leader with a formal management role, who confirmed the importance of the announcement, fed back positively on the initiative, and thanked one of the members for her *sweet note*." A couple of neutral comments were then followed by a new member post (from Eve) that contained a wide range of critical comments, querying the nature of some aspects of the service, and outlining a rigorous challenge to the site's self-constructed international identity. These queries were expressed in a critical questioning style, slightly softened at the end with the words, *Thanks for hearing me*."

One of the discussion group's voluntary subgroup leaders (Jean) did not react well to the extended criticism by Eve and posted two inscrutable messages consisting primarily of emoticons. In the first case, the word *Hmmm*" was followed by a frowning face; the second case involved *Whatever ....*" with a grimacing face. In both cases, the implication appeared to be critical of the member who had posted negative comments. Eve's reaction to this subgroup leader's inscrutability was swift: She replied early on Day 8, a few hours after the second emoticon had been posted to say, *Again a deafening silence on valid issues. The emoticons is out of place and frankly rude*." Several hours after Eve's post, another member (Lynne) said she agreed with Eve's original criticism and sympathized with Eve, saying, *I'm beginning to wonder what the point of being here is*." Subgroup leader Jean then replied to Eve that the use of emoticons had been meant as a criticism of the site leaders who had a formal management role, not of Eve. Jean said that she *used them as I'm fed up with writing here as it has no sense*," criticizing a range of functions she was concerned about within the site.

Within less than an hour, group leader Kipper replied in detail to Jean's criticism, thanking her for her feedback and asking for more detail to be provided about the area where Jean was having difficulty. Kipper also restated the mission and purposes of the site regarding the overall area Jean was concerned about, explaining again the intention of the site creators and about some new initiatives that had been introduced in the area that was the subject of critique. Kipper then said that she *didn't mean to hijack this thread, so I'm starting a new one to solicit this type of feedback. Please join the conversation: new thread address ....*" Following this, there were several neutral and positive posts, with just one critical comment from another member (Scuba) about general aspects of the area under

discussion. Kipper then came back quickly again to acknowledge that one of the points of critical feedback was correct, providing more information, making a joke about some aspects of the deficit, and saying *“Thank you again for this valuable feedback. We will look into ways we can improve this feature.”* Subgroup leader Jean then came back politely with further information relating to the issue she had been worried about. Lynne then gave thanks and a pictured bouquet of flowers illustrated as *“From Me to You”* to Kipper as group leader. The final message rounding off the discussion was by Mary, another site leader with a formal management role, who welcomed the new thread to discuss feedback and introduced some new aspects of work in the site to respond to various criticisms by members in the two conversation threads.

Figures 1 and 2 illustrate the pattern of leader and member posts over the 8-day period of the discussion, during which members were active in posting throughout 5 days. The chart and graph display show that although there was a relatively high level of critical feedback (23% of posts) and even a small amount of aggression (1%), there was also a high level of leader information (19%), demonstrating good visibility levels from the main discussion leader and also a number of additional leaders who came in to support her in subtle ways. There was an effective range of neutral discussion in user information/query postings (26%) and also a slightly odd posting by Jean, the subgroup leader (*“leader inscrutability”*; 3%), containing two critical emoticons that were relatively hard to understand as well unclear in their target, that is, as critical of the main group leaders. As discussed above, these emoticons were received with critical comment by Eve, though the group’s focus and direction was pulled back into line through the intervention of Kipper as group leader. Overall, this first case study provided an example of a relatively effective balance of visibility and invisibility on the part of the main leader, with distributed leadership operating well, with the intervention of a number of other contributing leaders.



**Figure 1.** Chart demonstrating the nature of the posts in Case Study 1 Discussion: New Initiative.



meant that he failed to demonstrate meaningful and helpful guidance to members on a number of issues, including on the tone required to foster interactive group relational intelligence. His approach to the group's dynamics was blunt, as if he expected members to respond in a logical way to issues involving social relations in much the same way as if these were straightforward technical issues. This can be seen, for example, in his reminder to members that *“when I post Virus Alerts then it is not personal...”* and in his note to say that he was absenting himself from providing help to anyone who did not read the information he posted: *‘Its all the same to me if you don't but I'm not available for those who suffer from not reading tips.’* Hence, though Gerald contributed 3 information posts plus one reminder (providing no new information) amongst a total from the whole group of 36 posts on Day 2, he demonstrated weak leadership skills by failing to address or answer critical comments by other members. Following his final information post on Day 2 (which was simply a brief note to alert people to his previous posts, classified as *“user information”* because the note specifically commented on his own nonleadership of the group), Gerald did not enter into the conversation thread again at all, simply leaving other members to get on with the discussion themselves without any further guidance from him.

Perhaps a result of this neglect by Gerald as the discussion leader and also by other leaders of the site, the conversation on Day 3 began to take a further negative turn. A number of aggressive and insulting responses (4%) were introduced into the discussion, some of which were wholly unnecessary and off-topic. A new member entering the conversation on Day 3 noted with concern that *“the thread has already stepped into off-topic name-calling.”* Many positive and neutral member responses were also posted, and it seemed that, as in the on-line conflict analyzed by Lambe (2006), members were trying to compensate for insulting remarks that had passed among several of the group. These negative posts included personal insults from Christine to T-Rex on Day 3, such as the following: *“...I really don't have the energy to stay here bickering with you, you sad little man...”* and T-Rex's reply, *“... Do you even read what other people write or are you too busy working on your next insult and belittlement of those who may not agree with you?”* Reflective comments by Wolf on the nature of the group were posted in response to the squabble between members:

*It never fails, it always seems that no matter what topic there always seems to be an argument over something or someone coming in making nasty remarks about something that has nothing to do with the topic at hand. Why does this have to happen? Why if you do not have anything to say about the topic say anything at all and if you cannot say anything nice then please do not say anything at all? (Comment by Wolf, Day 3 Case Study 2).*

These reflective comments were followed by defensive explanations from both Christine and T-Rex, and by further criticism. T-Rex apparently took the critical personal comments by Christine to heart but rebutted these with further critical comment and the expectation that he would be insulted again: *“Looks like this sad little man answered the question to everyone's satisfaction except the one who asked it ... Go figure and yet another insult.”* The relative decline in the social atmosphere of the group discussion on Day 3 is interesting, in view of the lack of leadership visibility. Overall, this second case study provided an example of a relatively ineffective balance of visibility and invisibility on the part of the site leader, with low levels of information and social support being provided by the discussion leader, a high level of critical feedback and a small number of highly aggressive comments, which were

relatively uncontained. The emergence of aggressive comments stimulated moderating input from other members such as Wolf, whose contributions kept the discussion in check in the absence of other leadership. Distributed leadership, therefore, arose naturally from within the equal membership of the group.

The interactive thread between the on-line community members taking part in Case Study 2 on a technical issue is illustrated in Figures 3 and 4, providing analyses of the pattern of leader and member posts over the 3-day period of the discussion. These figures indicate that there was a high level of critical feedback (31% of posts) and a fair amount of aggression (4%), arguably as a result of the lack of leader information (4%). There was also a strong level of positive feedback (25%), in which it seemed that group members were rallying round to make up for the lack of leadership. The very weak visibility levels from the main discussion leader (only four leader information posts, with one non-leader reminder classified as “user information”) and lack of involvement by any other site leaders regarding important technical issues meant that other members of the group tried to fill the gap. There was, therefore, an active level of neutral discussion among user information/query postings (35%), with a small number of reflexive posts (4%). Overall, this second case study provided an example of an ineffective balance of visibility and invisibility on the part of the site leaders, with distributed leadership from the group occurring incidentally to redress deficits from leadership neglect.

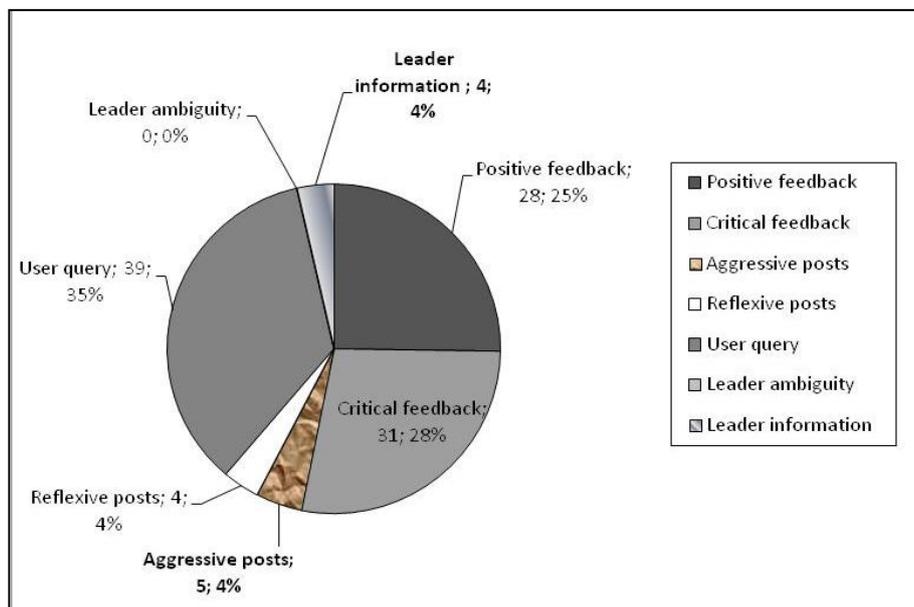


Figure 3. Chart demonstrating the nature of the posts in Case Study 2, Technical Issue.



### Case Study 3, Spammers Discussion: Aggression and Leadership Rescue

An ordinary site member, Barbara, became volunteer discussion group leader as she opened this 86-post discussion involving 15 participants. Barbara alerted members to the problems of spam, asking for group action on this. This announcement on Day 1 initially was met with agreement and neutral comments in response, with a range of information items and queries from users discussing the technical issues involved.

However, quite quickly during Day 1, comments began to turn towards being a more critical exchange about the nature of spam, when one member (Bacon) challenged the initial posting by Barbara, saying, *–You will never stop spam, your goal is to keep up with it, posting in caps and screaming about it is getting old....*” A spate of critical comments and reflective postings followed, with advice, user information, and reflections on the tone and tenor of the discussion being expressed during a debate on the issue. The discussion leader Barbara then replied. Taking exception to Bacon’s comments, she wrote a number of aggressive comments to Bacon, all composed in capital letters, the use of which is considered at least rude in discussion groups, and possibly inflammatory. This highly aggressive series of comments from Barbara ended with, *–PEOPLE LIKE YOU IS WHY I ‘NEVER’ GO TO A GROUP.*” But then she followed this with a positive comment to member Beetroot, welcoming a practical suggestion that Beetroot had made.

A few hours later on Day 1, Bacon replied to Barbara, exacerbating the tensions in the exchange with highly aggressive comments. An exchange followed between Barbara and Bacon that degenerated into name-calling, with insult following upon insult. This aggressive exchange continued into Day 2, with a large number of aggressive responses exchanged between Barbara and Bacon. Member Justine posted an emoticon to suggest that the two members should restrain themselves, with a positive expression of thanks. This was followed by an inscrutable but clearly critical visual post from Bacon, and a positive comment from Dragon in support of Barbara. Dragon criticized Bacon, saying, *–Bacon ... some of your posts are the most hateful things I have ever read.... Everyone is entitled to their opinion ... it does not have to be yours. Rock on Barbara.*” A neutral comment was posted by Katie, after which Bacon came back to make a further aggressive comment, now criticizing Dragon as well. Day 2 ended with a further short spate of aggression between these two members. On Day 3, T-Rex came in as a member to make moderating suggestions, saying that,

*If someone’s post is not to your liking, ignore it! Why do we have to constantly degenerate into personal attacks that serve no purpose at all – sometimes it’s like watching kids in a playground.... For me everyone’s two cents is worth at least that – and then just occasionally if you actually try listening to each other, you might hear a real gem that’s worth a darn site more.* (Comment by T-Rex on Day 3 in Case Study 3).

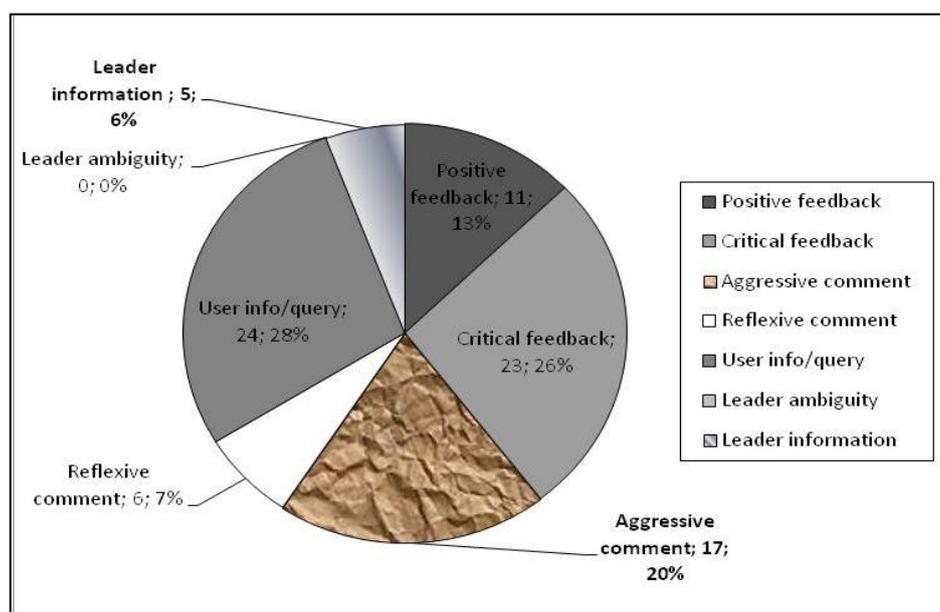
With the moderating input of T-Rex and a range of other neutral, critical and positive comments, Day 3 ended on a relatively positive note, with a comment from Frank, a member who had made few points so far.

On Day 4, the site group leader Kipper came into the discussion to comment on a suggestion about flagging accounts, subtly reminding people that *“...when you encounter inappropriate behaviour... members should flag this”* and the site staff would then follow up. This reminder of the regulations of the site in the leader’s comment addressed not only the issue of spam, but also, indirectly, the issue of the inappropriate verbal comments that had been made between members. Barbara, the discussion leader, thanked the site leader for the

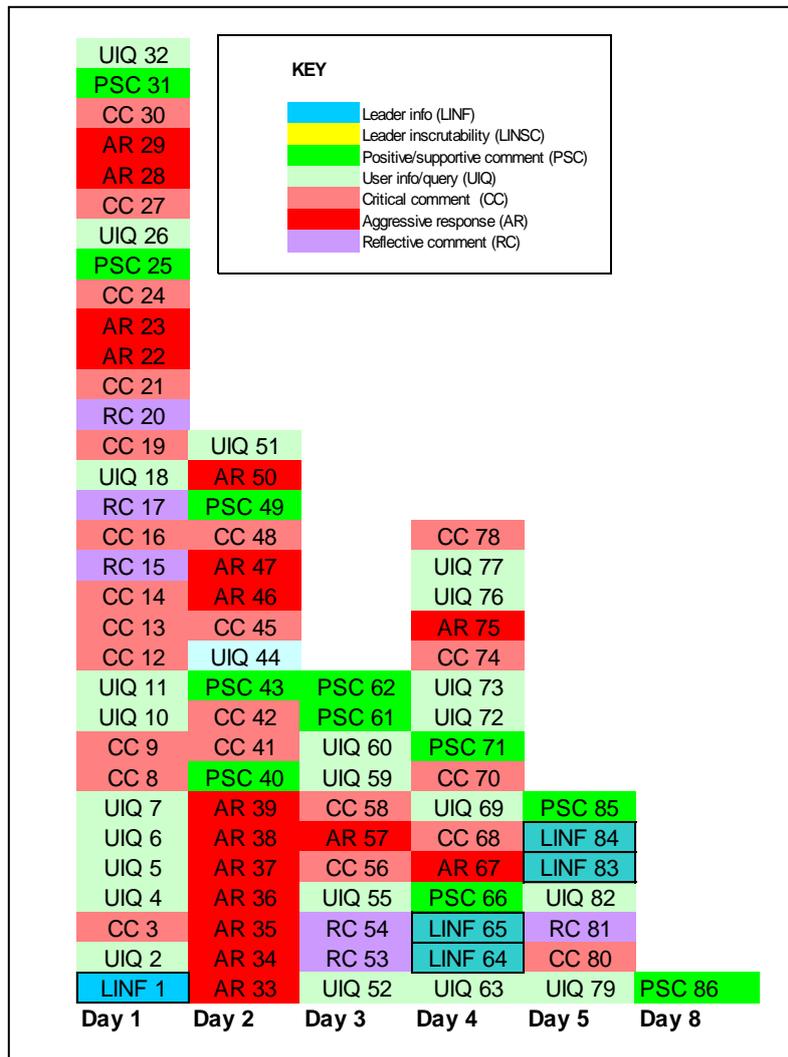
information, but also apparently could not resist making a further aggressive comment to Bacon. Her action, however, resulted in a call for censure by member, Justine, who said, *–Barbara, that last comment was rude, immature and uncalled for.*” Barbara replied defensively, saying that she had also suffered from rudeness against her. A range of positive and neutral comments followed and, apart from a somewhat churlishly aggressive emoticon from Bacon, the remainder of Day 4, followed by Days 5-8, witnessed no further aggressive comment by members. On Day 5, site leader Kipper came in again to provide further useful information on the issue of spam. Bacon welcomed this with a positive comment. No further exchanges followed, with the final positive post being made on Day 8, by Sheila, a new member to the discussion, who welcomed T-Rex’s insights, saying, *–.wise words, my friend.*”

Overall, this third case study provided an example of a *–leadership rescue,*” in which a relatively ineffective balance of visibility and invisibility of leadership was achieved after some initial serious aggression, including from the discussion leader. Low levels of information and social support were provided by the discussion leader, who resorted to name calling even when supported in her discussion by one of the main site leaders. A high level of critical feedback and a large number of highly aggressive comments were relatively uncontained during the early part of the discussion. Following the emergence of highly aggressive comments, interventions by Kipper, one of the main site leaders, restored the balance of visibility of leadership on Days 4-5, following which the group settled down and the aggressive interactions stopped. The sudden change to more positive group behavior towards the end of the discussion also may suggest that some behind-the-scenes work was being done by the site leaders to warn members not to engage in aggressive and impolite exchanges. The latter is speculation, however, since there was no direct evidence of this within the on-line conversation except the silences from and changed attitudes by some members.

The pattern of the interactive thread between on-line community members taking part in Case Study 3 is illustrated in Figures 5 and 6. These figures indicate leader and member posts



**Figure 5.** Chart demonstrating the nature of posts in Case Study 3: Spammers Discussion.



**Figure 6.** Graph of Case Study 3 Spammers Discussion, demonstrating the pattern of posts.  
*Note:* The letters represent the key and the numbers provide the post number. The leader posts are outlined.

over the period of the discussion, with the first 5 days being the most active in members posting, though the discussion remained open for 8 days. From the chart and graph displaying the pattern of posts, it can be seen there was an acutely high level of aggression (20% of posts) as well as critical feedback (26% of posts), most likely as a result of the very poor way in which the discussion leader handled her responses to criticism, and strongly aggressive postings by some members of the group. A high level of user information/query (28%) and only a moderate level of positive feedback (13%) combined with smallish amount of neutral leadership information (6%), made this the most difficult on-line interactive discussion overall of the three case studies.

The strident presence of the main discussion leader in critical and hostile postings and her descent into aggressive language meant that leadership was too intrusively visible, in unhelpful ways. The rescue by the main site leader appeared to be welcomed with relief, and the group discussion faded entirely on Days 6-8. Overall, this third case study provided an example of unbalanced levels of visibility and invisibility and ineffective, belligerent

leadership on the part of the discussion leader. The intervention by the site leader rescued the situation, but could not restore the hurt feelings of some members of the group, as evidenced by the nature of the comments made by participants.

## DISCUSSION

The term *distributed leadership* implies that leadership tasks and responsibilities are dispersed between and among different levels of a hierarchy. A commonsense view of distributed leadership might suggest that such dispersal would be widely enacted across the organization. However, there is no single, agreed definition of how the model of distributed leadership should be enacted, since the idea of distribution is currently more discussed than practiced. The ostensible distribution of decision making could also be envisaged, cynically, as a fairly empty rhetorical promise to involve a relatively disempowered network of service user participants in public service delivery. Such a device enables a site government to tick various rhetorical boxes about collaboration and partnership, since a distributed network of client users who, on the face of it, shares in leadership decisions can provide a useful –cultural complement to the formalised structural ‘joining up’ of hitherto separate organisations” of governance (Hartley, 2007, p. 207).

The mere reference to distribution in itself does not mean that people will necessarily work together equally to share in the knowledge, power, and authority of the executive leaders or site government. Distributed leadership can be facilitated by managers who are, de facto, completely in control of positional hierarchies: Some forms of seeming distribution may be relatively artificial, having been set up and controlled behind the scenes by positional managers operating in more or less autocratic ways. Furthermore, situations can exist in which people to whom tasks are distributed do not fully work together, but report individually on particular responsibilities. If discretionary tasks are distributed without authority and power, “followers” may resent tokenistic dispersals of leadership duties. In addition, as Hartley has observed (2007, p. 210) “the research evidence which informs distributed leadership is not yet well founded.” When well-effected using consensual operational methods, however, distributed leadership does seem to exist in on-line communities in such a way as to facilitate genuine delegation of leadership tasks with concomitant levels of authority, power and responsibility. This is best achieved when senior leaders honestly communicate the real extent of distribution and engage themselves collaboratively as community-focused members as well as team leaders in on-line networks.

Effective collaboration in leadership has been conceptualized as distributed–coordinated team leadership that operates ideally for superior team performance, though this is less effective in distributed–fragmented situations (Jameson et al., 2006; Mehra, Smith, Dixon, & Robertson, 2006). The benefits of collaborative advantage can, however, accrue from an effectively managed culture of genuinely empowered leadership distribution, for example, by inviting specific individuals to lead specialist work on key tasks. Furthermore, the very process of on-line task distribution, if undertaken in an authentic way and enabled for members, tends to transform communities and project teams into more inclusive groups through synergistic, dynamic processes of active engagement in leadership’s vision and values. Informal practitioner leaders can also be empowered with the knowledge, authority, and goal-directed

problem-solving skills that continue to be required for managing provision in education. Distributed leadership, if achieved effectively, can change an entire organization by enabling everyone to be seen as a leader of a particular domain of work, achieving collaborative advantage when the synergy of group working on leadership is affected.

This analysis of these three case studies found that both high visibility and high invisibility on the part of leaders in an on-line community site were needed to ensure that effective and proactive social exchanges took place. Three randomly selected discussion group conversations lasting several days each and involving a range of members were analyzed for the presence and absence of leaders within a distributed leadership model. The analysis found that leadership was in some instances distributed relatively effectively across the site, between several host group members and subleaders of discussion groups. Findings also indicated that leadership was stronger in achieving positive results if site leaders with positional authority demonstrated a high degree of relational intelligence and operated visibly to announce information messages and responses that subtly but firmly addressed problems with members' interaction. On-line environments particularly need straightforward, unambiguous, and flexible communications regarding information and appropriate forms of interaction.

When leaders are more absent (as in Case 2) or themselves engaged in criticism of other members (as in Case 3), a likelihood increases that not only would more aggressive responses be posted by members, but that such aggression would degenerate quickly into increasingly hostile situations. One group member compared this belligerent interaction between members with the behavior of "kids in a playground." Several members indicated that aggressive interactions, including name-calling and insults, routinely occurred. However, when effective positional site leaders were around, such leaders either directly or indirectly stopped the name-calling that otherwise emerged within the discussion threads.

High leader visibility was therefore found to be beneficial in this social networking site, not only for content information purposes, but also to promote relational intelligence for social purposes. It seemed that when effective leaders had been involved in group discussions, aggression between members diminished and that the tone of comments and supportive wording suggested members felt safer and happier in group interactions. Many members expressed appreciation for leaders' information and efforts. There was little evidence of any critical attitude towards site leaders, with the exception of the inscrutable emoticons posted by one subgroup leader. The moderating effect of leader visibility, when accompanied by relational intelligence, therefore seemed to be welcomed and their presence in discussions appeared to have strongly beneficial results in these case studies. Leader responses were polite, informative, clearly expressed, and full enough to provide information, but not too long. Leaders signed off all posts with a polite salutation such as *sincerely*, their name and the title of their official role in the site.

However, it was clear from the nature of the discussions in the on-line community that the groups involved also benefited, from time to time, from site leaders being absent—or highly invisible—so that members could pursue discussions without a sense of constantly being "watched." The fact that two of the case studies had discussion leaders who were ordinary group members able to open up a new discussion could be seen as a positive aspect of this on-line community. Enabling ordinary members to lead discussions encourages them to assume real ownership of key debates. The distribution of leadership was therefore effected through site leader invisibility at the times that such discussions emerged. In order to achieve the high degree of participation and involvement that this site routinely attracts, such occasional low visibility

from site leaders seems to be a necessity. An effective balance between leadership visibility and leadership invisibility occurred in Case Study 1, as the leader was present in appropriate ways, but then stepped back to enable the group to discuss the announcement of the new initiative.

In Case Studies 2 and 3, this balance was much less effective, as insufficient levels of capable leadership visibility were achieved. In Case Study 2, the group discussion leader neglected to cultivate relational intelligence between members. Thus the discussion degenerated to a significant level of unhelpful critical comments (28%) and aggressive behavior (4%); the leader information levels also were relatively low (4%), as well as being focused only on the content of the discussion itself and not on the nature of the interaction. In Case Study 3, an example of a highly aggressive series of interactions, the lack of leadership information and presence in Days 1-3 was particularly problematic, when nearly half of the exchanges involved a critical comment or antagonistic behavior. In response to what had begun to develop into a dilemma for the group, the leadership presence of Kipper on Days 4-5 mitigated the growing spirals of aggression. An effective series of information and interactions by Kipper, a helpful positional leader, resulted in a greatly improved situation, with the overall leadership involvement (6%) reaching a relatively healthy balance by the end of the debate on Day 8. However, some damage from the earlier, extremely negative series of aggressive interactions did have a lingering effect, as some members were still clearly upset by this by the end of the debate, as demonstrated by their comments, for example in the note by Justine that *–Barbara, that last comment was rude, immature and uncalled for.*”

This analysis underscores that an effective model of distributed leadership enables all members to be involved in on-line community leadership through achieving a balance between the visibility and invisibility of leadership presence in community discussions. Conscious adoption of distributed–coordinated team leadership models for on-line community interaction arguably develops trust and enables genuine dialogue between team members at all levels. This can assist leaders in knowing when and how to engage high visibility and when to subtly step into the background while team activities and decision-making processes are underway.

It is recommended that leaders of on-line community discussions demonstrate both high visibility and discretion in terms of the mission, purposes, and control of the group operations. However, they also must demonstrate an ability to step back from time to time and enable others, especially group members, to assume some degree of involvement and responsibility for group discussions. Clear demonstration of relational intelligence, sensitivity, and informal, friendly responsiveness to group posts are important requirements in leadership that foster trust among members. Leaders also need to be clear, unambiguous, and supportive in their salutations and expressions of information to members: The group benefits if the leadership quickly picks up on emerging issues that can cause aggressive responses. Such negativity can be most effectively handled by using a consistently sensitive, friendly, and informal approach at appropriate times that subtly and indirectly tackles the question of appropriate behavior, which decreases intergroup upset and fosters beneficial group interactions.

## CONCLUSIONS

This paper proposed that distributed leadership is an effective model of operation for the leadership of on-line communities. A tailored local combination of distributed leadership

responses should be applied to potential dilemmas, such as the emergence of aggression within on-line community groups. A visibility–invisibility paradox of distributed leadership that had been hypothesized in a prior research project involving an on-line community was tested through the analysis of conversational interaction within three randomly selected discussion groups. The analysis found that both high visibility and high invisibility, as the occasions demand, are required of leaders. Conscious adoption of distributed–coordinated team leadership arguably develops trust and enables genuine dialogue between and among team members at all levels of an on-line community. Effective leaders need to demonstrate relational intelligence, sensitivity, and awareness of when and how to engage with high visibility and when to subtly step back while member activities and decision-making processes are underway. Further research needs to investigate appropriate methods for the operation of distributed leadership in on-line communities.

## ENDNOTES

1. Quotation from Luke from the on-line King James Bible, retrieved 11 April 2011: <http://www.kingjamesbibleonline.org/Luke-17-33/>
2. The Joint Information Systems Committee (JISC) is an organization funded by the Higher Education Funding Council for England, which is set up to promote and fund e-learning development work in UK higher and further education
3. This summative report was privately commissioned in 2007 from the Association for Learning Technology, and thus is unlikely to be found through a public search. However, other reports from the JISC e-learning projects are available at [http://www.jisc.ac.uk/whatwedo/programmes/elearning\\_pedagogy/elp\\_elidacamel](http://www.jisc.ac.uk/whatwedo/programmes/elearning_pedagogy/elp_elidacamel)
4. These types of e-mail lists frequently do not collect significant demographic data on their participants. Therefore, it is difficult to quantify the sample in regard to aspects such as gender, age, or profession. I recognize this as a limitation to the study.
5. All names used for participants in the case studies have been changed to pseudonyms.
6. All quotations from the social networking site are reproduced verbatim, including spelling mistakes and incorrect punctuation.

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