

Top managers' media selection and interaction goals in e-leadership

Lotta Salin and Jonna Koponen

UEF Business School, University of Eastern Finland, Joensuu, Finland

Abstract

Purpose – Drawing on media richness theory and a framework of interpersonal communication goals, this study investigates how and why the IT industry's top managers use communication media to achieve their interaction goals in e-leadership.

Design/methodology/approach – A qualitative research approach is applied to understand top managers' communication media use and interaction goals. The empirical data were gathered through semi-structured interviews with 33 top managers from large IT companies and analysed using theory-guided thematic and ideal-type analyses.

Findings – Top managers were categorized into three types, based on their communication goals through face-to-face communication. Relationship-oriented top managers pursued relational and communal goals, whereas task-oriented ones wished to achieve instrumental and communal goals. Task- and relationship-oriented top managers pursued relational, instrumental, and communal goals. This study indicates that communal, instrumental, relational, and self-presentational goals influence managers' communication media selection.

Originality/value – This study brings new knowledge to the management communication research field. It expands the framework of interpersonal communication goals by identifying communal goals as a new category, in addition to existing instrumental, relational and self-presentational goals. This study suggests that media richness theory could be advanced by recognizing that a broader set of communication goals – including communal, instrumental, relational, and self-presentational – influences managers' communication media selection.

Keywords Media richness theory, Interpersonal goal achievement, E-leadership, Top managers, IT industry

Paper type Research paper

1. Introduction

The COVID-19 pandemic allowed re-imagining ways of working as many organizations implemented remote working models, emphasizing a heavy reliance on information and communication technologies (ICTs) (Daneshfar *et al.*, 2022). While the excessive use of ICTs at work has continued in the post-pandemic era (Yao *et al.*, 2023), questions have been raised about how these technologies should be used appropriately and effectively. Besides defining the effective use of ICTs at work, many organizations are currently seeking a balance between remote and in-person office work. According to McKinsey's survey in 2021 using global data, nearly three-quarters of the surveyed employees preferred to work from home two or more days per week (Alexander *et al.*, 2021), while managers were eager to return to

© Lotta Salin and Jonna Koponen. Published by Emerald Publishing Limited. This article is published under the Creative Commons Attribution (CC BY 4.0) licence. Anyone may reproduce, distribute, translate and create derivative works of this article (for both commercial and non-commercial purposes), subject to full attribution to the original publication and authors. The full terms of this licence may be seen at <http://creativecommons.org/licences/by/4.0/legalcode>

This work was supported by the Academy of Finland (342265).

Conflict of interest: In accordance with *Information Technology & People's* policy regarding declaration of interests, the authors have read and understood the policy. They declare that there are no conflicting interests. This is an original study. There has been no previous publication or consideration of publication elsewhere, in whole or in part, of this study. The enclosed manuscript has been approved by both authors.



significant in-person office work (De Smet *et al.*, 2021). Therefore, managers are currently challenged to find a balance between remote and in-person office work and justify when and for which tasks face-to-face or digital communication is needed. Evidence shows that remote work leads to better job performance, higher job satisfaction and better work–life balance (Contreras *et al.*, 2020). However, remote work may also cause social isolation, demotivation, family–work conflicts and increased turnover intentions (Contreras *et al.*, 2020). To minimise these negative effects, organizations need appropriate management communication.

Although it is known that electronic leaders (e-leaders) are expected to show competence in adopting, choosing, recommending and supporting the implementation of various communication media for their own uses and for their teams and organizations (Van Wart *et al.*, 2017), managers' media selection and interaction goals have remained underexplored in the e-leadership field. Existing informative studies addressing e-leadership and communication have typically followed quantitative methods (Ben Sedrine *et al.*, 2021; Braun *et al.*, 2019; Fan *et al.*, 2014) and gathered data from company employees (Ben Sedrine *et al.*, 2021; Braun *et al.*, 2019) or university students (Fan *et al.*, 2014), paying little attention to managers' perspective. As top managers are influential strategic decision-makers in organizations (Campion *et al.*, 2020), they are accountable for putting their organizations' communication strategies and policies into practice and responsible for establishing a balance between face-to-face and digital communications. At the same time, top managers pursue various personal communication goals, ranging from giving directions and sharing tasks to maintaining fruitful relationships in the workplace and expressing a positive self-image (Sheer and Chen, 2004). To attain their own communication goals and implement their organizations' communication strategies and policies, appropriate and effective media use (Roman *et al.*, 2019; Van Wart *et al.*, 2019) is crucial for top managers. In this study, we focus on top managers' media selection and interaction goals in e-leadership, with the aim to provide an in-depth, more comprehensive understanding of e-leadership communications.

As e-leadership practices and remote work opportunities vary, depending on the industry, we focus on top managers' media selection and interaction goals in the IT industry. This industry can be considered a forerunner in applying and using appropriate ICT infrastructure (Tong *et al.*, 2014). Additionally, the IT industry's international scope encourages remote work and e-leadership practices (Baber and Ojala, 2015). Due to the need in business operations and in academic research to know which communication channels are appropriate for which e-leadership tasks, it is important to gain insights into how and why the IT industry's top managers use communication media to achieve their interaction goals in e-leadership. Therefore, our examination is guided by this research question: How and why do the IT industry's top managers use communication media to achieve their interaction goals in e-leadership?

To address the research question, we conducted a qualitative study based on earlier research on e-leadership, a theoretical framework of interpersonal communication goals, and media richness theory (MRT). Data from 33 elite informants were collected through semi-structured interviews and analysed using theory-guided thematic and ideal-type analyses.

Our study has five main contributions. First, we identify three types of top managers using the same communication media for reaching varied communication goals, which supports the subjective view of media use and indicates that media richness perceptions vary among individuals (Carlson and Zmud, 1999; Ishii *et al.*, 2019). Second, our findings contribute to a theoretical framework of interpersonal communication goals (Canary *et al.*, 2008). Alongside previously found communication goals (instrumental, relational, and self-presentational), we add *communal goal*. Third, we conceptually expand MRT (Daft and Lengel, 1986) by showing that these four goals influence managers' media selection: instrumental, relational, self-presentational and communal. Fourth, in terms of methodological contribution, we utilize elite informants (Aguinis and Solarino, 2019),

specifically top managers, as sources of empirical qualitative data. Fifth, regarding this study's implications for policy and practice, we introduce effective management communication strategies and encourage organizations to adopt hybrid working models that balance digital and face-to-face communications appropriately and ensure inclusivity for all employees regardless of their physical location. Additionally, we recommend organizations to regularly assess employee well-being.

The remainder of this paper is structured into four sections. In [Section 2](#), we assess the literature streams related to e-leadership and communication, interpersonal communication goals ([Canary et al., 2008](#)) and MRT ([Daft and Lengel, 1986](#)). We describe the research methodology in [Section 3](#), followed by a presentation of the findings from our empirical analysis in [Section 4](#). In the final section, we present our study's implications for theory, methodology as well as policy and practice in the e-leadership domain. Furthermore, we introduce future research suggestion and limitations of the study. This study is valuable in providing knowledge about the recommended communication media for various e-leadership tasks. Managers can improve their communication competence and be more effective in choosing, recommending and implementing ICT in their teams and organizations. Additionally, they can strengthen their skills in determining an appropriate balance between face-to-face and digital communications.

2. Theoretical background

2.1 E-leadership and communication

To gain insights into top managers' media selection and interaction goals in e-leadership, we rely on prior research on e-leadership and communication as the foundation for the present study. Since its introduction by [Avolio et al. \(2000\)](#), the concept of e-leadership has been defined in numerous ways by various researchers ([Avolio et al., 2000](#); [Roman et al., 2019](#); [Van Wart et al., 2019](#)). Following [Van Wart et al. \(2019, p. 83\)](#) the present study views e-leadership as "effective use and blending of electronic and traditional methods of communication. It implies an awareness of current ICTs, selective adoption of new ICTs for oneself and the organization, and technical competence in using those ICTs selected." The chosen definition for this study acknowledges the significance of both face-to-face and digital communication channels, as well as the importance of integrating them when appropriate.

Prior e-leadership research has predominantly drawn upon traditional leadership theories, alongside theories from organizational and communication studies. Traditional leadership theories applied in studying e-leadership include leader-member exchange theory ([Jawadi, 2013](#)) and various leadership styles ([Cortellazzo et al., 2019](#); [Wang, 2011](#)). Theories applied from organizational studies field include adaptive structuration theory ([Avolio et al., 2000](#); [Liu et al., 2020](#)) and strategic alignment theory ([Belitski and Liversage, 2019](#); [Li et al., 2016](#)). Theories applied from the communication research field include the motivating language and feedback approach ([Fan et al., 2014](#)), as well as MRT and media synchronicity theory ([Braun et al., 2019](#)).

Existing e-leadership and communication studies have focused on exploring digital and face-to-face interactions ([Braun et al., 2019](#)), motivational language in leading virtual teams ([Fan et al., 2014](#)), strategies for managing uncertainty among e-leaders ([Gilstrap and Hendershot, 2015](#)), and nonverbal communication in instant messaging ([Darics, 2020](#)). [Braun et al. \(2019\)](#) discovered that employees favoured face-to-face communication over telephone or email. [Fan et al. \(2014\)](#) found that a demanding feedback approach resulted in more ideas from virtual team members, while empathetic language led to higher creative performance. Furthermore, [Gilstrap and Hendershot \(2015\)](#) identified conditional communication as a common strategy among e-leaders, which allowed them to switch between digital and face-to-face communication. [Darics \(2020\)](#) highlighted the importance of conveying subtle nonverbal

cues in digital communication. While the existing studies addressing e-leadership and communication provide valuable insights, understanding of aligning communication channels appropriately with various e-leadership tasks from the perspective of top managers remains scarce.

2.2 Interpersonal communication goals

While implementing organizational communication strategies and policies, managers pursue diverse personal communication goals in their work (Sheer and Chen, 2004). To understand how and why top managers pursue these goals, this study utilizes the framework of interpersonal communication goals (Canary *et al.*, 2008). This framework classifies individuals' interpersonal communication goals as instrumental, relational, and self-presentational (Canary *et al.*, 2008; Canary and Cody, 1993). Communicators may concurrently pursue multiple goals, which can be hierarchically ordered (Dillard and Solomon, 2000). For managers, pursuing several goals is necessary as they must ensure task completion and maintain positive employee relationships (Sheer and Chen, 2004).

Instrumental goals are task-focused and the most salient in day-to-day interactions (Canary and Cody, 1993). Canary *et al.* (2008) suggest that instrumental goals often initiate workplace conversations, focusing on effective task completion or seeking assistance. Hence, instrumental goals can be seen as both antecedents and consequences of an interaction process (Taylor *et al.*, 2011). For top managers, instrumental goals can refer to strategic tasks, such as hiring, firing, and conducting workshops. Relational goals focus on the quality of relationships, which are developed and assessed through communication (Canary *et al.*, 2008). Managers interact closely with their organization's employees and stakeholders, often relying on mutual success (Sheer and Chen, 2004). They prioritize maintaining good relationships to ensure ongoing successful cooperation. For top managers, relational goals can refer to relationship development and trust building, essential in organizational settings. Self-presentational goals entail making a positive impression (Taylor *et al.*, 2011). Research on self-presentation in digital contexts often examines online dating (Ellison *et al.*, 2006) or online chatting (Becker and Stamp, 2005). In the digital environment, individuals can carefully optimize their self-presentation and message structure compared to face-to-face interaction (Becker and Stamp, 2005). For top managers, self-presentational goals may involve impression management, for instance.

Previous research has emphasized the significance of instrumental, relational, and self-presentational goals in traditional face-to-face interactions between managers and employees (Sheer and Chen, 2004). To enhance our understanding of the interaction goals pursued by top managers in e-leadership, we adopt the framework of interpersonal communication goals in this study.

2.3 Media richness theory (MRT)

To explore top managers' media selection, this study employs MRT (Daft and Lengel, 1986). The theory posits that managers achieve task efficiency by appropriately matching the equivocality of the task with the richness of the communication medium (Daft and Lengel, 1986; Dennis and Kinney, 1998). MRT assumes that task efficiency (instrumental goal) is the only goal that motivates managers in their communication media selection. Despite its popularity, MRT faces criticism for inconsistent empirical findings (Ishii *et al.*, 2019) and its limited applicability to advanced digital technologies (Sheer, 2011). Originating in the mid-1980s, MRT fails to fully explain the current reality, where organizations utilize advanced communication media, not recognized in the original theory. This critique creates new research directions and encourages scholars to extend MRT (Carlson and Zmud, 1999; Fulk, 1993; Fulk and Steinfield, 1990; Sheer and Chen, 2004).

Researchers have extended MRT in multiple ways. While the original MRT posits that communication media use is objectively defined (Daft and Lengel, 1986), some scholars argue it is subjective (Carlson and Zmud, 1999; Fulk, 1993). By integrating a social information processing model with MRT, scholars suggest that media use is an outcome of both the objective media characteristics and subjective understanding of such characteristics (Fulk *et al.*, 1987). Carlson and Zmud (1999) combined MRT with channel expansion theory (Carlson and Zmud, 1994), finding that media richness perceptions are subjective, context-dependent, and evolve over time. Sheer and Chen (2004) expanded MRT by integrating it with the framework of interpersonal communication goals (Canary and Cody, 1993) showing that managers' media choices are influenced by instrumental, relational, and self-presentational communication goals.

MRT has inspired researchers to explore organizational communication, making it a valuable theory in business and management (Fulk, 1993; Fulk and Steinfield, 1990; Sheer and Chen, 2004). Meanwhile, the framework of interpersonal communication goals (Canary *et al.*, 2008) has been rarely applied to the business and management context. Few studies have combined MRT with this framework to investigate managers' media selection and interaction goals. Recent organizational changes, including a growing demand for e-leadership and digital communication, emphasize the need to understand how and why the IT industry's top managers use communication media to achieve their interaction goals in e-leadership. This information offers valuable insights into the effectiveness of MRT in explaining the use of advanced digital technology and can assist managers in efficiently implementing ICTs in their organizations.

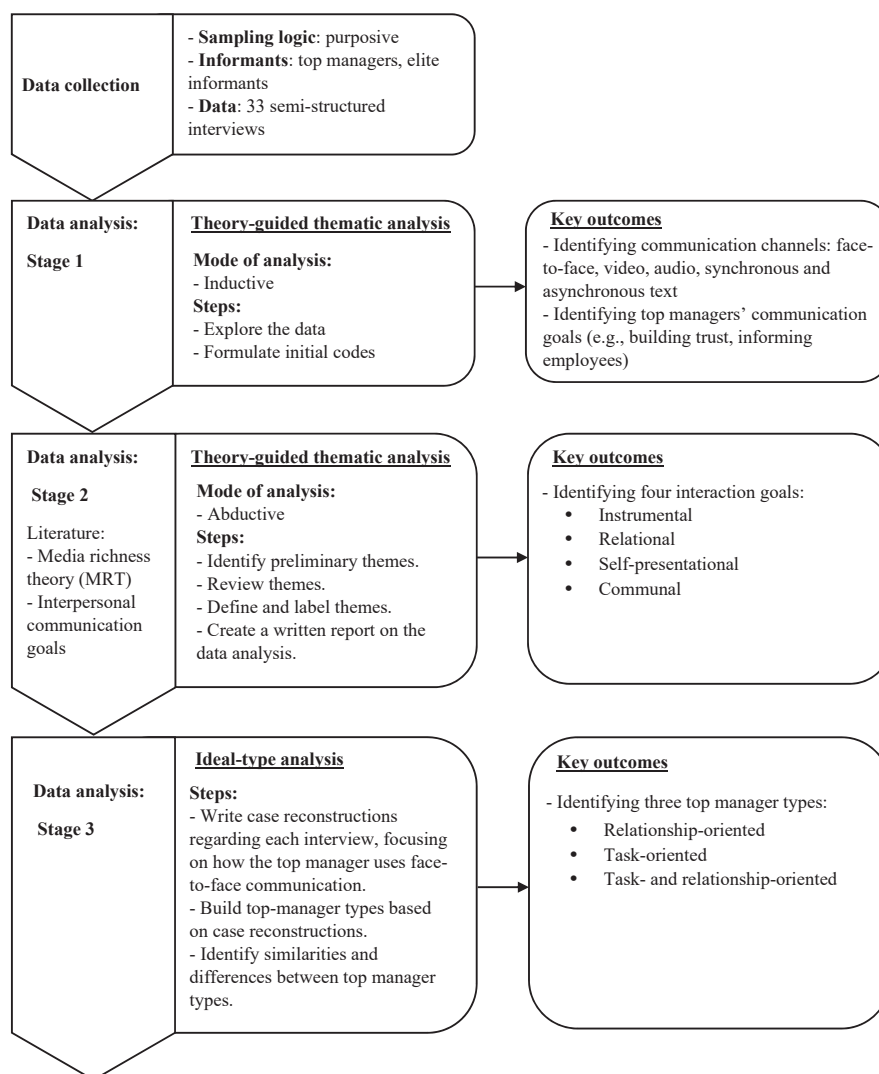
3. Methodology

Since qualitative methods provide deep insights into complex social phenomena and interactions (Bryman and Bell, 2015), we have applied a qualitative approach to answer our research question. Figure 1 shows the research process, from gathering to analysing data.

3.1 Data collection

The empirical data were collected through semi-structured interviews with elite informants (Aguinis and Solarino, 2019), in this case, top managers from large IT companies. To identify the prospective informants, a purposive sampling logic was applied (Tongco, 2007). We aimed to target top managers (e.g. CEOs, human resource managers, vice presidents, communication managers) from large IT companies in Finland. The interviewees had to meet three sampling criteria: (1) executive board members, with at least (2) five years of leadership experience and (3) two years of e-leadership experience. Thereafter, the researchers visited 24 IT companies' websites, where the top managers' contact information was available. The researchers contacted 134 top managers from 24 companies via personalized e-mail. If a top manager accepted the interview invitation, one of the two researchers conducted the interview. During data gathering, the researchers cross-checked their interpretations through ongoing conversations with each other. When new interviews no longer generated novel insights, the saturation point was reached (Aguinis and Solarino, 2019), and the data-gathering process ended. Eventually, 33 top managers from 17 companies agreed to be interviewed.

The interviews were conducted between October 2021 and February 2022 via a Microsoft Teams video connection. The interviews varied in length from 42 to 58 min each, with a combined duration of 27 h and 45 min, resulting in 550 single-spaced pages of text. After obtaining the interviewees' permission, all interviews were recorded and then transcribed. Two researchers read the transcripts and summarized each interview. Table 1 provides an overview of the interviewees.



Source(s): Authors' own creation

Figure 1.
Research process

For background information, the researchers asked the top managers to name the communication channels that they used for internal communication. Figure 2 illustrates 20 communication channels, of which face-to-face meetings, intranet/Yammer, e-mail, Microsoft Teams, videoconferences and webinars/workshops were frequently mentioned. To further categorize the communication channels based on their richness, we classified them as face-to-face, video, audio, and synchronous and asynchronous text communications (see Table 2).

Firm	Top manager Interviewee number	Age	Leadership experience in years	E-leadership experience in years
1	Alpha	1	49	12
		2	39	14
2	Beta	3	51	14
3	Gamma	4	39	10
4	Delta	5	47	15
		6	57	25
		7	55	25
5	Epsilon	8	39	13
6	Zeta	9	55	28
		10	47	14
		11	53	30
7	Eta	12	50	20
		13	44	15
		14	60	15
		15	47	20
8	Theta	16	42	7.5
		17	44	15
		18	51	25
9	Iota	19	60	15
		20	43	13
10	Kappa	21	47	20
		22	48	9
		23	48	22
11	Lambda	24	49	15
		25	39	7
		26	45	20
12	Myy	27	43	4.5
		28	47	12
		29	49	18
13	Nyy	30	42	6
		31	43	15
		32	49	10
14	Ksii	33	44	20
15	Omikron			
16	Pii			
17	Rhoo			

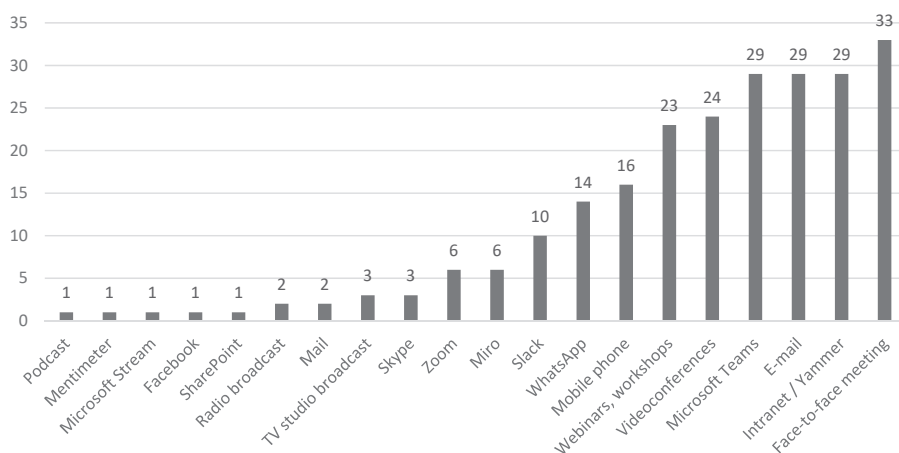
Table 1.
Overview of
interviewees

Source(s): Authors' own creation

3.2 Data analysis

The data were analysed in two stages: first, a theory-guided thematic analysis (Braun and Clarke, 2006) and second, an ideal-type analysis (Stapley et al., 2022) to organize the data according to top manager types. In the first stage, using the Atlas.ti program, the two researchers started with inductive coding, followed by a theory-guided thematic analysis (Braun and Clarke, 2006). They familiarized themselves with the transcribed interview data. Then, they inductively created initial codes related to e-leadership tasks, which were performed via face-to-face, video, audio, and synchronous and asynchronous text communications across the entire dataset. The researchers coded theoretically relevant features of the data by applying the central theoretical ideas from MRT (Daft and Lengel, 1986) and from the framework of interpersonal communication goals (Canary et al., 2008). The codes were combined into potential themes. Next, the initial themes were reviewed by both researchers. Finally, each theme was defined and named.

In the second stage, the aim was to identify groupings (types) of top managers in the dataset. The applied ideal-type analysis helped the researchers develop useful typologies



Source(s): Authors' own creation

Figure 2.
Communication
channels applied in
internal
communication

Communication medium	Definition in this paper
Face-to-face	In-person communication where all parties are physically present in the same space (e.g. the same meeting room)
Video	Video-mediated communication via conferencing platforms (e.g. Microsoft Teams, Zoom, Google Meet). Participants keep their cameras on
Audio	Voice-mediated communication via mobile phones or conferencing platforms. Participants turn off their cameras and communicate only by voice
Synchronous text	Text-based, real-time, technology-mediated communication between or among two or more participants. In this study's context, this takes place via online instant messaging platforms (e.g. Slack, Microsoft Teams chat, WhatsApp)
Asynchronous text	Text-based, technology-mediated communication between or among two or more participants who are not concurrently active in the conversation. Participants reply at their convenience, and immediate responses are not expected. In this study's context, this takes place via online messaging platforms (e.g. e-mail, Yammer) and an intranet

Source(s): Authors' own creation

Table 2.
Communication media
and definitions

(Stapley *et al.*, 2022). The aim was to understand how and why the IT industry's top managers used communication media to achieve their interaction goals according to their within-group similarities and between-group differences (Stapley *et al.*, 2022). Based on their communication goals in face-to-face interaction, three types of top managers were identified. The top managers under each type pursued similar communication goals through face-to-face interaction. Each top-manager type is introduced and further described in the Findings section.

3.3 Trustworthiness of the study

Lincoln and Guba (1985) assess trustworthiness, which is critical for qualitative research, through dependability, confirmability, transferability and credibility. First, to increase our study's dependability, we show the logic of the research process in Figure 1 and document the

process itself by explaining the data gathering and analysis in detail under the Methodology section. Second, to ensure conformability and convince readers that the data interpretations are real, not based on imagination or speculation, we offer our detailed findings for each top-manager type (Tables 3–5) regarding the managers’ communication media selection and

Type and number of top managers	Selected communication medium	Interaction goal	Interpersonal communication goals
Relationship-oriented (<i>n</i> = 7)	Face-to-face	Relational	- Building trust
			- Building and maintaining interpersonal relationships
			- Having relaxed spontaneous conversations
		Communal	- Promoting get-together events
			- Encouraging human connections
			- Holding regular team meetings
	Video	Instrumental	- Maintaining sense of community
			- Informing employees
			- Facilitating interactive conversations
			- Organizing meetings
		Communal	- Innovating and brainstorming
			- Making decisions
			- Firing an employee
			- Hiring an employee
	Audio	Self-presentational	- Giving a presentation
			- Conducting workshops and training
			- Promoting video camera use
		Instrumental	- Encouraging human connections
			- Promoting get-together events
			- Engaging in professional-mediated public speaking
	Synchronous text	Relational	- Facilitating interactive conversations
			- Performing tasks requiring quick responses
		Instrumental	- Organizing meetings
			- Recording meetings
	Asynchronous text	Relational	- Performing complex tasks
			- Catching up with a colleague
			- Performing tasks requiring quick responses
		Communal	- Facilitating interactive conversations
			- Agreeing on things
			- Informing employees
		Instrumental	- Maintaining sense of community
			- Informing employees
			- Sharing instructions

Table 3.
Relationship-oriented
top managers’
communication media
selection and
interaction goals

Source(s): Authors’ own creation

Table 4.
Task-oriented top
managers'
communication media
selection and
interaction goals

Type and number of top managers	Selected communication medium	Interaction goal	Interpersonal communication goals
Task-oriented (<i>n</i> = 16)	Face-to-face	Instrumental	- Innovating and brainstorming - Discussing sensitive issues - Hiring an employee - Discussing job performance - Firing an employee
		Communal	- Encouraging human connections - Promoting get-together events - Maintaining sense of community
	Video	Instrumental	- Facilitating interactive conversations - Organizing meetings - Discussing sensitive issues - Hiring an employee - Firing an employee - Making decisions - Sharing instructions - Performing complex tasks - Communicating corporate strategy - Conducting workshops and training
			- Promoting video camera use - Encouraging human connections - Promoting get-together events - Holding regular team meetings - Maintaining sense of community
			- Catching up with a colleague - Engaging in professional-mediated public speaking - Entertainment-mediated public speaking
			- Performing tasks requiring quick responses - Organizing meetings - Performing operational tasks - Facilitating interactive conversations - Performing complex tasks - Seeking advice - Facilitating teamwork - Making decisions
	Audio	Instrumental	- Catching up with a colleague - Encouraging human connections - Maintaining sense of community
			- Engaging in entertainment-mediated public speaking - Performing tasks requiring quick responses - Facilitating interactive conversations - Seeking advice - Performing operational tasks
		Relational Communal	- Encouraging human connections - Maintaining sense of community
		Self- presentational	- Engaging in entertainment-mediated public speaking
	Synchronous text	Instrumental	- Performing tasks requiring quick responses - Facilitating interactive conversations - Seeking advice - Performing operational tasks
		Communal	- Encouraging human connections - Maintaining sense of community
	Asynchronous text	Instrumental	- Informing employees - Sharing instructions - Performing operational tasks

Source(s): Authors' own creation

Table 5.
Task- and relationship-
oriented top managers’
communication media
selection and
interaction goals

Type and number of top managers	Selected communication medium	Interaction goal	Interpersonal communication goals
Task- and relationship-oriented (<i>n</i> = 10)	Face-to-face	Instrumental	- Innovating and brainstorming - Discussing sensitive issues - Hiring an employee - Firing an employee
		Relational	- Building and maintaining interpersonal relationships - Building trust - Having relaxed spontaneous conversations
		Communal	- Celebrating employee success - Encouraging human connections
	Video	Instrumental	- Promoting get-together events - Facilitating interactive conversations - Conducting workshops and training
			- Informing employees - Hiring an employee - Discussing sensitive issues - Seeking advice
			- Organizing meetings - Promoting video camera use - Promoting get-together events - Encouraging human connections
	Audio	Self-presentational	- Holding regular team meetings - Engaging in professional-mediated public speaking
		Instrumental	- Performing tasks requiring quick responses - Performing complex tasks - Facilitating teamwork - Facilitating interactive conversations
	Synchronous text	Relational	- Catching up with a colleague
		Instrumental	- Performing tasks requiring quick responses - Facilitating interactive conversations - Performing operational tasks
	Asynchronous text	Communal	- Maintaining sense of community
		Instrumental	- Informing employees - Sharing instructions
		Communal	- Celebrating employee success

Source(s): Authors’ own creation

interaction goals. Selected direct quotations provided in the findings section increase conformability. Third, to increase transferability, we demonstrate the degree of similarity between the current study and prior studies under the Discussion and conclusions section.

Fourth, our study's credibility is enhanced through several strategies. Two researchers have familiarized themselves with the research topic. As the empirical research data were collected through purposive sampling logic with carefully defined sampling criteria, and the data collection ended at the saturation point, the data are sufficient to support the statements made in this study.

To increase our study's credibility, we employed a combination of triangulation forms (Lincoln and Guba, 1985). First, theory triangulation was used by applying both MRT and a framework of interpersonal communication goals (Eriksson and Kovalainen, 2016). The second was researcher triangulation (Eriksson and Kovalainen, 2016), where two researchers participated in both data gathering and analysis processes, during which their ongoing conversation related to their data interpretations allowed them to cross-check their observations. Third, we used method triangulation (Eriksson and Kovalainen, 2016) by conducting theory-guided thematic and ideal-type analyses, thus increasing our findings' validity.

4. Findings

Top managers ($N = 33$) were categorized into three types, based on their interaction goals in face-to-face communication. The first type, relationship-oriented top managers ($n = 7$), pursued relational and communal goals in face-to-face interaction. Relational goals involved conscious trust-building activities, commitment to building and maintaining interpersonal relationships in the workplace, and facilitation of relaxed spontaneous conversations. These relational goals form the basis for sustainable social bonds in the workplace and promote a collaborative, teamwork-oriented environment. Simultaneously, relationship-oriented top managers pursued communal goals, involving active promotion of get-together events, encouragement of human connections among team members, regular organization of team meetings and a focus on maintaining the sense of community in the workplace. Such communal activities promote cohesion and a sense of belonging among employees while aiming to minimize experiences of loneliness at work.

The second type, task-oriented top managers ($n = 16$), focused on achieving instrumental and communal goals. They prioritized attaining instrumental goals by performing a set of work tasks through face-to-face communication. The tasks included efficient innovating and brainstorming sessions, discussions about sensitive issues, employee hiring-and-firing conversations and discussions related to job performance. Furthermore, task-oriented top managers invested their resources on communal activities to promote cohesion at work.

The third type, task- and relationship-oriented top managers ($n = 10$), used face-to-face communication for pursuing instrumental, relational and communal goals in a balanced way. These managers deemed it important to perform a set of work tasks in face-to-face settings, while acknowledging the significance of relational goals for building social bonds, and invested their resources on communal activities to promote cohesion at work. Next, each top-manager type is introduced in a more detailed way.

4.1 Media selection and interaction goals of relationship-oriented top managers

Relationship-oriented top managers' ($n = 7$) media selection and interaction goals are illustrated in Table 3. They pursued relational and communal goals through face-to-face interaction. Face-to-face communication was considered particularly important when aiming to build trust and develop interpersonal relationships, as illustrated in this quotation:

The old kind of idea that trust is built in person, and then, it can be utilised virtually, so it is, of course, at the core. [These are] trust-building moments . . . when you have to do it in a different way than . . . [digitally]. That is also the reason, when you think about business people going somewhere other than the office, doing different things. It is all about trust. . . . [and] getting to know people more deeply than is possible in a purely professional context. (Mu_Interviewee 24)

Communal goals were also pursued through face-to-face communication. Top managers believed that the sense of community, previously maintained through regular face-to-face meetings in the office, had declined in their organizations. Their current hybrid or remote work practices and minimal face-to-face interaction did not support the sense of community sufficiently. To maintain and enhance the sense of community in their teams and organizations, top managers started taking concrete actions. They actively promoted get-together events for people to meet face-to-face in a relaxed way. They also encouraged their team members to maintain human connections through face-to-face meetings, which were perceived as fostering the teams' sense of community and sense of belonging, as this quotation shows:

It is important ... to have those face-to-face encounters because in this virtual communication ... expressions, gestures and emotions disappear a bit ... So, then I think that the community of teams ... should sometimes meet face-to-face, so the depth of interaction is greater. Then, I think that it [face-to-face communication] supports the sense of community and cohesion Somehow, the digital world isolates you, and it can lead to a feeling of loneliness in the long run if you are only [engaged in] virtual [communication] all the time. Then, it would be really good if ... some of the team meetings, one-on-one, ... virtual or functional team meetings, were organised face-to-face when possible Face-to-face interaction deepens the sense of community and the culture. (Theta_Interviewee 16)

During the COVID-19 pandemic and the extensive remote work, video communication became a much-used tool in many companies, primarily to achieve instrumental goals. Video communication was considered suitable for various everyday tasks, such as informing employees, having interactive conversations and organizing meetings. It was also deemed appropriate for complex tasks, such as recruiting employees or brainstorming and innovating. In other words, many top managers regarded video communication as effective and suitable for a broad range of communication needs, as shown in this comment: "*Well, I would say that it [video] is good whenever you need to communicate*" (Mu_Interviewee 24).

Video communication was also used to attain a set of communal goals. For instance, top managers perceived video as an appropriate communication channel to encourage team members to maintain human connections (e.g. through virtual coffee breaks). Additionally, video was used to promote get-together events, including virtual after-work events and virtual escape rooms, which some companies organized to maintain the sense of community among their employees. Simply having cameras turned on in meetings was considered an important action to maintain human connections, as this quotation illustrates:

Well, one thing we have, it is pretty much automation, thus the camera and its use in this virtual interaction. So as a rule, we always have cameras on. Someone who does not use a camera is an exception or oddity ... It does not feel like you are talking to a faceless digital device ...; you can see the person's gestures and facial expressions. I would say that it [camera use] has been one of the good things ... which has helped us feel human in our everyday lives. ... [Camera use] is the prevailing practice in the company ... (Mu_Interviewee 25)

Audio communication was mainly used for pursuing instrumental goals; however, one relational goal, catching up with a colleague, was identified. Although video had become a widely used everyday communication tool in many organizations, people did not always keep their cameras on, which led to audio-mediated communication. Audio conferences were used for routine tasks, such as organizing meetings and having interactive conversations. Additionally, mobile phones were still used by many top managers, especially in close relationships and for tasks requiring quick responses. Therefore, mobile phones held a symbolic meaning of immediacy.

Synchronous text communication was primarily used to achieve instrumental goals. Additionally, one communal goal, maintaining a sense of community, was identified and described as follows: *“Instant messaging is also often used for building the team spirit and for this kind of emotional communication, and for that, it works well”* (Mu_Interviewee 24).

Considering the instrumental goals, synchronous text communication was used for tasks requiring quick responses, for interactive conversations, for agreeing on some points under consideration and for informing employees. Similar to mobile phone calls, instant messaging carried a symbolic meaning of immediacy. Therefore, it was often used for tasks requiring quick responses or for interactive conversations. These characteristics were associated specifically with synchronous text communication (e.g. instant messaging) and did not apply to asynchronous text communication (e.g. e-mailing).

Asynchronous text communication was solely used to achieve instrumental goals. Asynchronous text, especially e-mail, was described as a slow communication channel and suitable for only a few tasks, namely informing employees and sharing instructions. Furthermore, many top managers had reduced their e-mail use because e-mails can easily remain unread and unopened, it may take a long time to receive a reply, or people may forget to reply at all. Moreover, e-mail was considered a poor medium for transmitting emotions and was only used for straightforward tasks.

4.2 Media selection and interaction goals of task-oriented top managers

Task-oriented top managers' ($n = 16$) media selection and interaction goals are illustrated in Table 4. They mostly pursued instrumental and communal goals through face-to-face communication. Interestingly, no relational goals were pursued through face-to-face interactions. The most popular instrumental goals were related to complex tasks, such as discussing sensitive work-related issues or job performance. Face-to-face communication was also preferred when hiring or firing employees, although such tasks could also be performed via video if necessary. The instrumental goals of innovating and brainstorming were also preferably done face-to-face since top managers considered these means most productive and effective, as the following extract shows:

For example, workshops and these kinds of brainstorming sessions . . . are the . . . things . . . that I think [that managers] should be able to physically implement in the same space so that they get as much out of [these tasks] as possible. The fact is that when these tasks are done through [Microsoft] Teams, even if there is video, and the audio runs well, and . . . different tools . . . can be used together, even in terms of brainstorming, there is something missing. It is so much easier to implement the session physically in the same space. (Alpha_Interviewee 2)

Communal goals were also pursued through face-to-face communication. For instance, top managers encouraged their employees to maintain human connections with their colleagues through occasional face-to-face meetings. The top managers also actively promoted and encouraged people to participate in relaxed and informal get-together events, as illustrated in this excerpt:

Now in the autumn, when it (society) has opened a bit, I have been at the forefront of bringing people back together, to eat together, to drink together, to have a few parties together. That is what people need. That corona apathy is something that I feel myself, and I know that everybody else is feeling it as well. (Kappa_Interviewee 20)

Video communication was primarily used by top managers to attain instrumental goals. Additionally, some communal, relational and self-presentational goals were identified. The instrumental goals pursued through video communication represented mainly routine tasks, such as organizing meetings and having interactive conversations.

The analysis revealed two self-presentational goals pursued through video communication, namely professional-mediated and entertainment-mediated public speaking. Top managers were often responsible for delivering presentations at events such as information sessions and strategy days, which targeted the whole organization. At these events, the top managers' goal was to express their own professionalism since each acted as the face and voice of one's organization. The second self-presentational goal involved entertainment-mediated public speaking. During the COVID-19 pandemic, some organizations started setting up digital recreational events, where top managers produced entertaining and relaxed content, as this quotation shows:

We have held entertaining events; for example, we shot a live event together with a Finnish musician in the studio for the entire Eta staff, which was purely a recreational event . . . We delivered food packages to the whole staff, and . . . food for the whole family for a week, and then, the supervisors provided refreshments. Then from the studio . . . we shot an entertaining piece . . . I told a few things about the company in a light-hearted way, no training and no facts, just how we were doing and where we were going and why everyone was so great when they worked for us. (Eta_Interviewee 11)

Audio communication was primarily used for instrumental goals, but a few relational, communal and self-presentational goals were also identified. Considering instrumental goals, audio communication was most often used for spontaneous calls via mobile phones or conferencing platforms when the aim was to accomplish tasks requiring quick responses, as further illustrated in this quotation:

If there is a quick thing, I use the phone, and I also get a lot of calls from people asking for help or advice on something quickly . . . And with team members . . . we usually use Slack. (Alpha_Interviewee 1)

According to our analysis, task-oriented leaders and relationship-oriented leaders used synchronous and asynchronous communications in similar ways, meaning that they pursued instrumental goals.

4.3 Media selection and interaction goals of task- and relationship-oriented top managers

Task- and relationship-oriented top managers' ($n = 10$) media selection and interaction goals are illustrated in [Table 5](#). They pursued instrumental and relational goals through face-to-face communication in a relatively balanced way. Two communal goals, namely encouraging human connections and promoting get-together events, were also identified. Regarding instrumental goals, the top managers judged it best to perform complex tasks, such as innovating, brainstorming and discussing sensitive issues, via face-to-face communication. They also viewed face-to-face communication as beneficial for relational goals, such as building and maintaining interpersonal relationships and developing trust.

A similar practice among all three types of top managers was their use of video communication primarily to achieve instrumental goals. These goals were related to routine tasks, such as informing employees, conducting workshops and training, and having interactive conversations, as illustrated in this excerpt:

Video has one good thing you do not get in face-to-face conversations. When people learn to use video, they usually wait for their own turn to speak. And . . . introverted guys . . . can find their voices. It is easier for them to speak with video. Because others listen to them differently than they might in another environment . . . And it . . . adds dynamics . . . people have learned to respect those on the video. Because it is completely impossible to follow a [video] meeting if people talk over each other. (Delta_Interviewee 5)

Task- and relationship-oriented top managers also used video communication to pursue communal and self-presentational goals. Because of their professional role, top managers

often pursued self-presentational goals of professional-mediated public speaking by engaging in events that targeted the entire staff. According to the top managers, professional-mediated public speaking required them to have special skills, as this quotation shows:

I speak at various briefings for our staff. We have just under 1,000 employees. In the briefings that I organise, around 700 or 800 people attend. The briefings last 45 minutes and include speeches from myself and others, where we raise different issues The ability to summarise, to stay on point, . . . to simplify, and certainly, the content of the presentation, its simplicity and its visuality are emphasised in these situations. (Kappa_Interviewee 19)

Task- and relationship-oriented top managers used audio communication in the same way as the other two top-manager types did. Audio communication was used most often for pursuing instrumental goals. Additionally, audio communication was used by all three top manager types to achieve the relational goal of catching up with a colleague.

Communication goals pursued through synchronous and asynchronous text communications were similar among all three top-manager types. Instrumental goals were pursued most often through these communication channels.

5. Discussion and conclusions

In this study, we examined how and why the IT industry's top managers used communication media to achieve their interaction goals in e-leadership. Our findings showed that top managers applied face-to-face, video, audio, and synchronous and asynchronous text communications to pursue communal, instrumental, relational and self-presentational goals. Based on the communication goals in face-to-face communication, top managers were categorized into three types. First, relationship-oriented types aimed to achieve relational and communal goals in face-to-face settings. Second, task-oriented types pursued instrumental and communal goals. Third, task- and relationship-oriented types targeted relational, instrumental and communal goals. Considering digital communication channels (video, audio, and synchronous and asynchronous text), the findings indicated that top managers used them in fairly similar ways, regardless of their type.

5.1 Implications for theory

We bring new knowledge to the field of management communication research by showing how and why the IT industry's top managers use communication media to achieve their interaction goals in e-leadership. With this study, we make three theoretical contributions. First, we identify three types of top managers who use the same communication media to achieve different communication goals. To cite an example, for innovation and brainstorming, relationship-oriented top managers find video suitable, whereas task-oriented managers prefer face-to-face communication. These findings challenge the original MRT, which assumes that people understand the richness of each communication medium objectively (Daft and Lengel, 1986). Our findings confirm the subjective view of media richness, as indicated in some studies (Carlson and Zmud, 1999; Fulk, 1993; Ishii, 2005; Ishii *et al.*, 2019). Carlson and Zmud (1999) supported the subjective view of media richness by classifying personal experiences. Ishii (2005) showed that experienced email users were in general more likely to use the channel, even for equivocal tasks. In our study, relationship-oriented top managers were comfortable with using video communication for equivocal tasks (e.g. innovating and brainstorming, having hiring-and-firing conversations). In contrast, the other two types of top managers preferred to perform equivocal tasks via face-to-face communication. These findings indicate that relationship-oriented top managers likely have personal experiences that lead them to consider video as rich enough for equivocal tasks.

Furthermore, task-oriented top managers found it sufficient to handle relational communication via video and audio, differing from the other top-manager types who regularly engaged in relational communication in face-to-face settings. These findings support the subjective view of media use and indicate that media richness perceptions vary among individuals (Carlson and Zmud, 1999; Ishii *et al.*, 2019).

Second, our findings contribute to a theoretical framework of interpersonal communication goals (Canary *et al.*, 2008). Alongside previously found communication goals (instrumental, relational and self-presentational), we indicate the fourth, namely *communal goal* (see Figure 3). The recognition of communal goals can be associated with the extended and continuous nature of remote work in organizations during and after the COVID-19 pandemic. While prior studies have emphasized instrumental, relational and self-presentational goals (Sheer and Chen, 2004), the focus should now be expanded to cover communal goals, as Figure 3 illustrates. With remote work becoming more prevalent, recent research has identified concerns regarding the sense of community and belonging to an organization (Jämsen *et al.*, 2022; Moens *et al.*, 2022; Syrek *et al.*, 2022). A weaker sense of community was found to be a major challenge among full-time remote employees in the public sector (Jämsen *et al.*, 2022). Similarly, a majority of Flemish employees reported weakening bonds with colleagues and decreasing connections with their employers during the COVID-19 pandemic (Moens *et al.*, 2022). In a multinational organization, employees felt isolated from their work community during an extensive period of remote work (Syrek *et al.*, 2022). Because losing the sense of community may lead to negative effects, such as employees' feeling of isolation (Jämsen *et al.*, 2022), decreased work motivation (Contreras *et al.*, 2020) and poor work performance, it is crucial for e-leaders to address these challenges and find solutions for maintaining employees' sense of community.

Third, our study conceptually expands MRT (Daft and Lengel, 1986) by showing that in addition to instrumental communication goals, three others, relational, self-presentational and communal, influenced top managers' media selection. While Avolio *et al.* (2000) recommended integrating MRT in the e-leadership context over two decades ago, only a few studies have answered that call. For example, Braun *et al.* (2019) used MRT to analyse employee satisfaction in digital and face-to-face communications, revealing a preference for

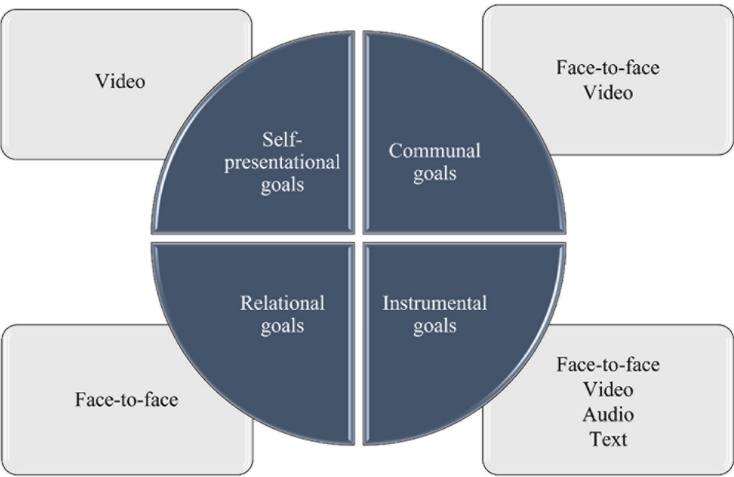


Figure 3.
Top managers' interaction goals matched with communication channels

Source(s): Authors' own creation

more face-to-face interactions and higher perceived quality in face-to-face communication. Similarly, [Ben Sedrine et al. \(2021\)](#) explored the influence of leadership styles on virtual team efficiency, with media richness as a mediating variable. Their findings confirmed that leadership styles affected operational cohesion and trust among virtual teams, according to different levels of media richness. Despite these quantitative studies in the e-leadership field, an in-depth understanding of top managers' media selection and interaction goals has been missing.

The original MRT takes only instrumental goals into account, assuming that managers' media selection is based on the matching message equivocality with media richness ([Daft and Lengel, 1986](#)). When investigating managers' media use in traditional organizations, MRT has been extended to cover instrumental, relational, and self-presentational goals ([Sheer and Chen, 2004](#)). To the best of our knowledge, our present study is the first to acknowledge a broader range of communication goals (communal, instrumental, relational, and self-presentational) that influence e-leaders' media selection.

Our study's methodological contribution is related to the distinctive choice of using elite informants ([Aguinis and Solarino, 2019](#)) as sources of empirical qualitative data. It is considered that elite informants, in this case, top managers, have unique perspectives and valuable insights regarding the use of communication media and interaction goals in e-leadership because they are powerful strategic decision-makers and influential in the whole organization. Furthermore, their extensive experience in e-leadership roles indicates their strong expertise regarding the investigated phenomena. The methodological choice of using elite informants extends the current methodological landscape of e-leadership research. Since existing e-leadership studies have gathered data from company employees ([Braun et al., 2019](#)), middle managers ([Darics, 2020](#)) or university students ([Van Wart et al., 2019](#); [Wang et al., 2022](#)), our study builds a more comprehensive understanding of top managers' media selection and interaction goals in e-leadership.

5.2 Implications for policy and practice

Based on our study's findings we present policy recommendations for organizations. First, we encourage organizations to adopt hybrid working models that balance digital and face-to-face communications, which is critical for relational workplace communication and strengthening employees' sense of community, given the potential negative outcomes of extensive digital communication. This is because challenges such as communication apprehension and digital technology anxiety may hinder online engagement and the expression of dissenting opinions ([Rahmani et al., 2023](#)). Furthermore, the absence of face-to-face communication can lead to a decreasing sense of community in the workplace. [Jämsen et al. \(2022\)](#) found that 80% of Finnish public-sector employees perceived full-time remote work as challenging for relational communication, experiencing issues such as the absence of spontaneous encounters, a weaker sense of community, workplace loneliness and isolation. Therefore, maintaining a balance between digital and face-to-face communications is essential.

Second, we advise organizations to ensure inclusive hybrid working models, offering all employees (regardless of their location) equal opportunities for career development, recognition and decision-making involvement. There are concerns that poorly organized post-pandemic working models may discriminate some employees, such that those who work in the office more frequently form an inner employee circle, while those who work in the office less often are pushed to the outer circle ([Närhi, 2023](#)). This can be exclusive of the latter group and worsen the inequality related to their career development and recognition ([Autin et al., 2020](#)). Therefore, inclusive working models are needed in organizations that emphasize remote and hybrid work.

Third, we encourage organizations to assess employee well-being frequently (e.g. through regular conversations, employee surveys and electronic feedback systems). The negative effects of long-term remote work, such as increased loneliness at work (Rintamaa, 2023), have triggered societal discussions. Remote work is known to lead to social isolation, demotivation, decreased work performance and higher turnover intentions (Contreras *et al.*, 2020). Therefore, some countries (e.g. Japan) have implemented policies, such as the Stress Check Program, directing organizations with 50 or more employees to assess employee stress levels frequently (Kawakami and Tsutsumi, 2016).

Fourth, our study introduces effective management communication strategies based on research findings. Inspired by the task–media fit model (McGrath and Hollingshead, 1993), we created Table 6 to show how managers could match face-to-face, video, audio and text communications when handling interpersonal relationship management, sense-of-community management, complex work task management and routine work task management.

5.3 Future research and limitations

This study’s findings inspire future research. As shown in Table 7, we suggest two main research streams. First, more research on employees’ sense of community and well-being is required. Second, future research could advance the understanding of hybrid work practices.

First, regarding employees’ sense of community and well-being, supportive communication in digital work environments could be further investigated. Previous research indicates that supportive communication correlates with employee job satisfaction (Lambert *et al.*, 2006), and video-based peer-supportive communication positively influences the receiver’s emotional well-being (Buehler and High, 2023). While relational communication has been shown as challenging in leading full-time remote workers (Jämsen *et al.*, 2022), some people have preferred digital over offline supportive communication (Chung, 2013). Therefore, we suggest that future studies focus on e-leader–follower supportive communication in the digitalized workplace and investigate how supportive digital communication influences employee well-being at work.

Furthermore, despite studies addressing relational communication in remote work (Jämsen *et al.*, 2022), research on e-leader–follower interpersonal relationship building and maintenance is limited. In remote work settings, where face-to-face interactions are scarce, intentional efforts to build and maintain interpersonal relationships become even more critical compared to face-to-face settings. This highlights a promising avenue for future research to investigate the opportunities and challenges faced by e-leaders when building and maintaining interpersonal relationships with their followers.

Table 6.
Recommended
communication media
for selected
e-leadership tasks

Task	Media Face-to-face Fit	Video Fit	Audio Fit	Text Fit
Interpersonal relationship management	Good	Marginal	Marginal	Poor
Sense of community management	Good	Good	Marginal	Marginal
Complex tasks (e.g. sensitive negotiations, brainstorming workshops, recruitment interviews, firing an employee)	Good	Good	Poor	Poor
Routine tasks (e.g. regular meetings, asking for and giving advice, operative tasks)	Poor	Good	Good	Marginal

Source(s): Table courtesy to McGrath and Hollingshead (1993)

Table 7.
Future research
directions

Future directions	Suggested research questions
Sense of community and employee well-being	- What is supportive digital communication in remote work settings? - How do employees perceive their supervisors' and colleagues' supportive digital communication? - How does supportive digital communication influence employee well-being at work? - What opportunities/challenges do e-leaders face when building and maintaining relationships with their followers in a virtual work environment? - What strategies do e-leaders use to maintain the sense of community in their organizations or teams? - How and why do employees perceive that virtual events enhance/hinder their (1) sense of community and (2) well-being at work? - How do employees' perceptions of the sense of community influence their well-being at work?
Hybrid work practices	- What is the optimal balance between digital and face-to-face communications at the organizational, team and one-on-one communication levels? - What strategies and measures do organizations apply to assess employee well-being in hybrid work? - How do organizations' hybrid work practices enhance/hinder (1) employee career development, (2) employee recognition and (3) employee involvement in decision-making in hybrid work settings?

Source(s): Authors' own creation

Based on our findings, maintaining the sense of community is a challenge for e-leaders. While the sense of community has been examined in online teaching and remote learning contexts (Bakir and Phirangee, 2021), the business and management field lacks an in-depth understanding of the strategies that e-leaders apply to maintain the sense of community in the workplace. For example, future research could investigate the impacts of various types of virtual events on employees' sense of community and well-being at work.

Second, future research could advance the understanding of hybrid work practices. As hybrid work can lead to unwanted outcomes and hinder employee well-being (Harkiolakis and Komodromos, 2023), future studies could further examine the strategies and measures that organizations apply to assess employee well-being in current hybrid work settings. Since hybrid work models are relatively newly applied in organizations on a large scale, it remains unknown how hybrid work practices can either enhance or hinder employee career development, recognition and involvement in decision-making. The effects of hybrid working practices on these key employee-related issues should be further explored.

A limitation of this study is the cross-sectional data gathered in the autumn of 2021 and the spring of 2022. Top managers' experiences might have been influenced by the unique situation caused by the COVID-19 pandemic, which temporarily forced much of the communication to shift to digital channels. Therefore, longitudinal research on top managers' media selection and interaction goals could be conducted in the future, as it would allow researchers to understand managers' media use over time. Our study is also limited by its sample since we focused solely on IT-industry managers and organizations. In the future, interdisciplinary research would offer valuable insights into whether managers' media selection and interaction goals vary among industries.

References

- Aguinis, H. and Solarino, A.M. (2019), "Transparency and replicability in qualitative research: the case of interviews with elite informants", *Strategic Management Journal*, Vol. 40 No. 8, pp. 1291-1315, doi: [10.1002/smj.3015](https://doi.org/10.1002/smj.3015).
- Alexander, A., De Smet, A., Langstaff, M. and Ravid, D. (2021), "What employees are saying about the future of remote work", available at: <https://www.mckinsey.com/capabilities/people-and-organizational-performance/our-insights/what-employees-are-saying-about-the-future-of-remote-work> (accessed 1 June 2023).
- Autin, K.L., Blustein, D.L., Ali, S.R. and Garriott, P.O. (2020), "Career development impacts of COVID-19: practice and policy recommendations", *Journal of Career Development*, Vol. 47 No. 5, pp. 487-494, doi: [10.1177/0894845320944486](https://doi.org/10.1177/0894845320944486).
- Avolio, B.J., Kahai, S. and Dodge, G.E. (2000), "E-leadership: implications for theory, research, and practice", *The Leadership Quarterly*, Vol. 11 No. 4, pp. 615-668, doi: [10.1016/S1048-9843\(00\)00062-X](https://doi.org/10.1016/S1048-9843(00)00062-X).
- Baber, W.W. and Ojala, A. (2015), "Cognitive negotiation schemata in the IT industries of Japan and Finland", *Journal of International Technology and Information Management*, Vol. 24 No. 3, pp. 87-104, doi: [10.58729/1941-6679.1049](https://doi.org/10.58729/1941-6679.1049).
- Bakir, N. and Phirangee, K. (2021), "ZOOMing into a community: exploring various teaching practices to help foster sense of community and engagement in emergency remote teaching", *Journal of Teaching and Learning with Technology*, Vol. 10 No. 1, pp. 386-389, doi: [10.14434/jotlt.v9i2.31226](https://doi.org/10.14434/jotlt.v9i2.31226).
- Becker, J.A.H. and Stamp, G.H. (2005), "Impression management in chat rooms: a grounded theory model", *Communication Studies*, Vol. 56 No. 3, pp. 243-260, doi: [10.1080/10510970500181264](https://doi.org/10.1080/10510970500181264).
- Belitski, M. and Liversage, B. (2019), "E-leadership in small and medium-sized enterprises in the developing world", *Technology Innovation Management Review*, Vol. 9 No. 1, pp. 64-74, doi: [10.22215/timreview/1212](https://doi.org/10.22215/timreview/1212).
- Ben Sedrine, S., Bouderbala, A. and Nasraoui, H. (2021), "Leadership style effect on virtual team efficiency: trust, operational cohesion and media richness roles", *The Journal of Management Development*, Vol. 40 No. 5, pp. 365-388, doi: [10.1108/JMD-10-2018-0289](https://doi.org/10.1108/JMD-10-2018-0289).
- Braun, V. and Clarke, V. (2006), "Using thematic analysis in psychology", *Qualitative Research in Psychology*, Vol. 3 No. 2, pp. 77-101, doi: [10.1191/1478088706qp063oa](https://doi.org/10.1191/1478088706qp063oa).
- Braun, S., Hernandez Bark, A., Kirchner, A., Stegmann, S. and van Dick, R. (2019), "Emails from the boss—curse or blessing? Relations between communication channels, leader evaluation, and employees' attitudes", *International Journal of Business Communication*, Vol. 56 No. 1, pp. 50-81, doi: [10.1177/2329488415597516](https://doi.org/10.1177/2329488415597516).
- Bryman, A. and Bell, E. (2015), *Business Research Methods*, 4th ed., Oxford University Press, Oxford.
- Buehler, E.M. and High, A.C. (2023), "Indirect effects of video chat on outcomes of receiving support: uniting theorizing about supportive communication and computer-mediated communication", *Communication Monographs*, Vol. 90 No. 1, pp. 92-111, doi: [10.1080/03637751.2022.2117393](https://doi.org/10.1080/03637751.2022.2117393).
- Campion, M.C., Schepker, D.J., Campion, M.A. and Sanchez, J.I. (2020), "Competency modeling: a theoretical and empirical examination of the strategy dissemination process", *Human Resource Management*, Vol. 59 No. 3, pp. 291-306, doi: [10.1002/hrm.21994](https://doi.org/10.1002/hrm.21994).
- Canary, D.J. and Cody, M.J. (1993), *Interpersonal Communication: A Goals-based Approach*, St. Martin's Press, New York, NY.
- Canary, D.J., Cody, M.J. and Manusov, V.L. (2008), *Interpersonal Communication: A Goals-based Approach*, St. Martin's Press, New York, NY.
- Carlson, J.R. and Zmud, R.W. (1994), "Channel expansion theory: a dynamic view of media and information richness perceptions", *Proceedings – Academy of Management*, Vol. 1994 No. 1, pp. 280-284, doi: [10.5465/ambpp.1994.10344817](https://doi.org/10.5465/ambpp.1994.10344817).

- Carlson, J.R. and Zmud, R.W. (1999), "Channel expansion theory and the experiential nature of media richness perceptions", *Academy of Management Journal*, Vol. 42 No. 2, pp. 153-170, doi: [10.5465/257090](https://doi.org/10.5465/257090).
- Chung, J.E. (2013), "Social interaction in online support groups: preference for online social interaction over offline social interaction", *Computers in Human Behavior*, Vol. 29 No. 4, pp. 1408-1414, doi: [10.1016/j.chb.2013.01.019](https://doi.org/10.1016/j.chb.2013.01.019).
- Contreras, F., Baykal, E. and Abid, G. (2020), "E-leadership and teleworking in times of COVID-19 and beyond: what we know and where do we go", *Frontiers in Psychology*, Vol. 11, pp. 1-11, doi: [10.3389/fpsyg.2020.590271](https://doi.org/10.3389/fpsyg.2020.590271).
- Cortellazzo, L., Bruni, E. and Zampieri, R. (2019), "The role of leadership in a digitalized world: a review", *Frontiers in Psychology*, Vol. 10, pp. 1-21, doi: [10.3389/fpsyg.2019.01938](https://doi.org/10.3389/fpsyg.2019.01938).
- Daft, R.L. and Lengel, R.H. (1986), "Organizational information requirements, media richness and structural design", *Management Science*, Vol. 32 No. 5, pp. 554-571, doi: [10.1287/mnsc.32.5.554](https://doi.org/10.1287/mnsc.32.5.554).
- Daneshfar, Z., Asokan-Ajitha, A., Sharma, P. and Malik, A. (2022), "Work-from-home (WFH) during COVID-19 pandemic – a netnographic investigation using Twitter data", *Information Technology and People*, Vol. 36 No. 5, pp. 2161-2186, doi: [10.1108/ITP-01-2021-0020](https://doi.org/10.1108/ITP-01-2021-0020).
- Darics, E. (2020), "E-leadership or 'How to be boss in instant messaging?' The role of nonverbal communication", *International Journal of Business Communication*, Vol. 57 No. 1, pp. 3-29, doi: [10.1177/2329488416685068](https://doi.org/10.1177/2329488416685068).
- De Smet, A., Dowling, B., Mysore, M. and Reich, A. (2021), "It's time for leaders to get real about hybrid", available at: <https://www.mckinsey.com/capabilities/people-and-organizational-performance/our-insights/its-time-for-leaders-to-get-real-about-hybrid> (accessed 1 June 2023).
- Dennis, A.R. and Kinney, S.T. (1998), "Testing media richness theory in the new media: the effects of cues, feedback, and task equivocality", *Information Systems Research*, Vol. 9 No. 3, pp. 256-274, doi: [10.1287/isre.9.3.256](https://doi.org/10.1287/isre.9.3.256).
- Dillard, J.P. and Solomon, D.H. (2000), "Conceptualizing context in message-production research", *Communication Theory*, Vol. 10 No. 2, pp. 167-175, doi: [10.1111/j.1468-2885.2000.tb00186.x](https://doi.org/10.1111/j.1468-2885.2000.tb00186.x).
- Ellison, N., Heino, R. and Gibbs, J. (2006), "Managing impressions online: self-presentation processes in the online dating environment", *Journal of Computer-Mediated Communication*, Vol. 11 No. 2, pp. 415-441, doi: [10.1111/j.1083-6101.2006.00020.x](https://doi.org/10.1111/j.1083-6101.2006.00020.x).
- Eriksson, P. and Kovalainen, A. (2016), *Qualitative Methods in Business Research*, 2nd ed., Sage Publications, London.
- Fan, K.-T., Chen, Y.-H., Wang, C.-W. and Chen, M. (2014), "E-leadership effectiveness in virtual teams: motivating language perspective", *Industrial Management + Data Systems*, Vol. 114 No. 3, pp. 421-437, doi: [10.1108/IMDS-07-2013-0294](https://doi.org/10.1108/IMDS-07-2013-0294).
- Fulk, J. (1993), "Social construction of communication technology", *Academy of Management Journal*, Vol. 36 No. 5, pp. 921-950, doi: [10.5465/256641](https://doi.org/10.5465/256641).
- Fulk, J.L. and Steinfield, C.W. (1990), "Understanding managers' media choices: a symbolic interactionist perspective", in Fulk, J.L. and Steinfield, C.W. (Eds), *Organizations and Communication Technology*, SAGE Publications, Newbury Park, CA, pp. 71-94, doi: [10.4135/9781483325385.n4](https://doi.org/10.4135/9781483325385.n4).
- Fulk, J., Steinfield, C.W., Schmitz, J. and Power, J.G. (1987), "A social information processing model of media use in organizations", *Communication Research*, Vol. 14 No. 5, pp. 529-552, doi: [10.1177/009365087014005005](https://doi.org/10.1177/009365087014005005).
- Gilstrap, C. and Hendershot, B. (2015), "E-leaders and uncertainty management: a computer-supported qualitative investigation", *Qualitative Research Reports in Communication*, Vol. 16 No. 1, pp. 86-96, doi: [10.1080/17459435.2015.1086424](https://doi.org/10.1080/17459435.2015.1086424).
- Harkiolakis, T. and Komodromos, M. (2023), "Supporting knowledge workers' health and well-being in the post-lockdown era", *Administrative Sciences*, Vol. 13 No. 2, pp. 1-12, doi: [10.3390/admsci13020049](https://doi.org/10.3390/admsci13020049).

- Ishii, K. (2005), "The human side of the digital divide: media experience as the border of communication satisfaction with email", *Journal of Technical Writing and Communication*, Vol. 35 No. 4, pp. 358-401, doi: [10.2190/CHEJ-2CW4-6BNY-9LRT](https://doi.org/10.2190/CHEJ-2CW4-6BNY-9LRT).
- Ishii, K., Lyons, M.M. and Carr, S.A. (2019), "Revisiting media richness theory for today and future", *Human Behavior and Emerging Technologies*, Vol. 1 No. 2, pp. 124-131, doi: [10.1002/hbe2.138](https://doi.org/10.1002/hbe2.138).
- Jämsen, R., Sivunen, A. and Blomqvist, K. (2022), "Employees' perceptions of relational communication in full-time remote work in the public sector", *Computers in Human Behavior*, Vol. 132, pp. 1-11, doi: [10.1016/j.chb.2022.107240](https://doi.org/10.1016/j.chb.2022.107240).
- Jawadi, N. (2013), "E-leadership and trust management: exploring the moderating effects of team virtuality", *International Journal of Technology and Human Interaction*, Vol. 9 No. 3, pp. 18-35, doi: [10.4018/jthi.2013070102](https://doi.org/10.4018/jthi.2013070102).
- Kawakami, N. and Tsutsumi, A. (2016), "The Stress Check Program: a new national policy for monitoring and screening psychosocial stress in the workplace in Japan", *Journal of Occupational Health*, Vol. 58 No. 1, pp. 1-6, doi: [10.1539/joh.15-0001-ER](https://doi.org/10.1539/joh.15-0001-ER).
- Lambert, C.H., Kass, S.J., Piotrowski, C. and Vodanovich, S.J. (2006), "Impact factors on work-family balance: initial support for border theory", *Organization Development Journal*, Vol. 24 No. 3, pp. 64-75.
- Li, W., Liu, K., Belitski, M., Ghobadian, A. and O'Regan, N. (2016), "E-leadership through strategic alignment: an empirical study of small- and medium-sized enterprises in the digital age", *Journal of Information Technology*, Vol. 31 No. 2, pp. 185-206, doi: [10.1057/jit.2016.10](https://doi.org/10.1057/jit.2016.10).
- Lincoln, Y.S. and Guba, E.G. (1985), *Naturalistic Inquiry*, Sage Publications, Newbury Park.
- Liu, C., Van Wart, M., Kim, S., Wang, X., McCarthy, A. and Ready, D. (2020), "The effects of national cultures on two technologically advanced countries: the case of e-leadership in South Korea and the United States", *Australian Journal of Public Administration*, Vol. 79 No. 3, pp. 298-329, doi: [10.1111/1467-8500.12433](https://doi.org/10.1111/1467-8500.12433).
- McGrath, J.E. and Hollingshead, A.B. (Eds) (1993), *Putting the Group Back in Group Support Systems: Some Theoretical Issues about Dynamic Processes in Groups with Technological Enhancements*, Macmillan, New York, NY.
- Moens, E., Lippens, L., Sterkens, P., Weytjens, J. and Baert, S. (2022), "The COVID-19 crisis and telework: a research survey on experiences, expectations and hopes", *The European Journal of Health Economics*, Vol. 23 No. 4, pp. 729-753, doi: [10.1007/s10198-021-01392-z](https://doi.org/10.1007/s10198-021-01392-z).
- Närhi, J. (2023), "Etätyöt voivat ajaa osan ulkokehälle", *Helsingin Sanomat*, 14 August, available at: <https://www.hs.fi/talous/art-2000009772068.html> (accessed 30 November 2023).
- Rahmani, D., Zeng, C., Chen, M.(H.), Fletcher, P. and Goke, R. (2023), "Investigating the effects of online communication apprehension and digital technology anxiety on organizational dissent in virtual teams", *Computers in Human Behavior*, Vol. 144, pp. 1-11, doi: [10.1016/j.chb.2023.107719](https://doi.org/10.1016/j.chb.2023.107719).
- Rintamaa, T. (2023), "Suomalaistutkijat kehittivät mittarin työkyrsinäisyyden arvioimiseen – testaa oma tilanteesi viidellä väitteellä", *Yle*, 23 November, available at: <https://yle.fi/a/74-20060912> (accessed 30 November 2023).
- Roman, A.V., Van Wart, M., Wang, X., Liu, C., Kim, S. and McCarthy, A. (2019), "Defining e-leadership as competence in ICT-mediated communications: an exploratory assessment", *Public Administration Review*, Vol. 79 No. 6, pp. 853-866, doi: [10.1111/puar.12980](https://doi.org/10.1111/puar.12980).
- Sheer, V.C. (2011), "Teenagers' use of MSN features, discussion topics, and online friendship development: the impact of media richness and communication control", *Communication Quarterly*, Vol. 59 No. 1, pp. 82-103, doi: [10.1080/01463373.2010.525702](https://doi.org/10.1080/01463373.2010.525702).
- Sheer, V.C. and Chen, L. (2004), "Improving media richness theory: a study of interaction goals, message valence, and task complexity in manager-subordinate communication", *Management Communication Quarterly*, Vol. 18 No. 1, pp. 76-93, doi: [10.1177/0893318904265803](https://doi.org/10.1177/0893318904265803).
- Stapley, E., O'Keeffe, S. and Midgley, N. (2022), "Developing typologies in qualitative research: the use of ideal-type analysis", *International Journal of Qualitative Methods*, Vol. 21, pp. 1-9, doi: [10.1177/16094069221100633](https://doi.org/10.1177/16094069221100633).

- Syrek, C., Kühnel, J., Vahle-Hinz, T. and Bloom, J. (2022), "Being an accountant, cook, entertainer and teacher—all at the same time: changes in employees' work and work-related well-being during the coronavirus (COVID-19) pandemic", *International Journal of Psychology*, Vol. 57 No. 1, pp. 20-32, doi: [10.1002/ijop.12761](https://doi.org/10.1002/ijop.12761).
- Taylor, M., Jowi, D., Schreier, H. and Bertelsen, D. (2011), "Students' perceptions of e-mail interaction during student-professor advising sessions: the pursuit of interpersonal goals", *Journal of Computer-Mediated Communication*, Vol. 16 No. 2, pp. 307-330, doi: [10.1111/j.1083-6101.2011.01541.x](https://doi.org/10.1111/j.1083-6101.2011.01541.x).
- Tong, C., Tak, W.I.W. and Wong, A. (2014), "The impact of knowledge sharing on the relationship between organizational culture and job satisfaction: the perception of information communication and technology (ICT) practitioners in Hong Kong", *International Journal of Human Resource Studies*, Vol. 5 No. 1, pp. 19-47, doi: [10.5296/ijhrs.v5i1.6895](https://doi.org/10.5296/ijhrs.v5i1.6895).
- Tongco, M.D.C. (2007), "Purposive sampling as a tool for informant selection", *Ethnobotany Research and Applications*, Vol. 5, pp. 147-158, doi: [10.17348/era.5.0.147-158](https://doi.org/10.17348/era.5.0.147-158).
- Van Wart, M., Roman, A., Wang, X. and Liu, C. (2017), "Integrating ICT adoption issues into (e-) leadership theory", *Telematics and Informatics*, Vol. 34 No. 5, pp. 527-537, doi: [10.1016/j.tele.2016.11.003](https://doi.org/10.1016/j.tele.2016.11.003).
- Van Wart, M., Roman, A., Wang, X. and Liu, C. (2019), "Operationalizing the definition of e-leadership: identifying the elements of e-leadership", *International Review of Administrative Sciences*, Vol. 85 No. 1, pp. 80-97, doi: [10.1177/0020852316681446](https://doi.org/10.1177/0020852316681446).
- Wang, V. (2011), "E-leadership in the new century", *International Journal of Adult Vocational Education and Technology*, Vol. 2 No. 1, pp. 50-59, doi: [10.4018/javet.2011010105](https://doi.org/10.4018/javet.2011010105).
- Wang, X., Wei, X., Van Wart, M., McCarthy, A., Liu, C., Kim, S. and Ready, D.H. (2022), "The role of e-leadership in ICT utilization: a project management perspective", *Information Technology and Management*, Vol. 24 No. 2, pp. 99-113, doi: [10.1007/s10799-021-00354-4](https://doi.org/10.1007/s10799-021-00354-4).
- Yao, S., Lu, J., Wang, H., Montgomery, J.J.W., Gorny, T. and Ogbonnaya, C. (2023), "Excessive technology use in the post-pandemic context: how work connectivity behavior increases procrastination at work", *Information Technology and People*, Vol. 37 No. 2, pp. 583-604, doi: [10.1108/ITP-08-2022-0573](https://doi.org/10.1108/ITP-08-2022-0573).

Corresponding author

Lotta Salin can be contacted at: lotta.salin@uef.fi

For instructions on how to order reprints of this article, please visit our website:

www.emeraldgroupublishing.com/licensing/reprints.htm

Or contact us for further details: permissions@emeraldinsight.com