

SOCIALNESS IN THE DIGITAL ECONOMY:

SUPPORTING MEANINGFUL WORK
THROUGH ENTERPRISE
SOCIAL MEDIA

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CONTEXT AND OBJECTIVES

Humans are inherently social beings (Berry, 1995; Simmel, 1949) and maintaining social relationships, whether personally or professionally, has emotional, cognitive, and instrumental benefits (Bzdok & Dunbar, 2020; Meske et al., 2019). Today, roughly 3 billion people partake in online social networks, such as Facebook (Statista, 2020). Similarly, in workplace settings, increasing numbers of employees are members of networks on enterprise social media (ESM), like Microsoft Yammer or IBM Connections (Leidner et al., 2018), with recent research suggesting that 80% of companies use some form of ESM (Van Osch, 2015). Although ESM are designed to be “social”—by allowing people to build and maintain ties with co-workers from across the organization (Kane et al., 2014; Kuegler et al., 2015; Leidner et al., 2018)—little is known about whether these technologies support meaningful social interactions, similar to those occurring in physical settings. Investigating this is urgent in light of the current pandemic, which has prompted companies to rapidly transform to fully virtual workplaces almost overnight. Realizing technology’s ability

to facilitate socialness—that is, allowing users to engage in meaningful interactions, express their emotions, and provide and receive support—becomes paramount in times of “work from anywhere” and “social distancing” (Bzdok & Dunbar, 2020; Choudhury et al., 2021).

Researchers in information systems (IS) have begun to explore the intricacies of ESM and the social ties within them by using social network analysis techniques to quantify aspects of network structure (Bulgurcu et al., 2018; Kane & Ransbotham, 2016). However, without a fundamental understanding of socialness, its importance in the workplace, and the role that technology such as ESM can play in enhancing workplace socialness, such empirical efforts remain at a standstill. Research can be advanced with improved conceptual and theoretical grounding (Howison et al., 2011; Meske et al., 2019). To address this, we developed a holistic conceptualization of socialness, particularly as it pertains to workplace and digital settings. In the hopes of guiding future empirical research, we propose the following research questions:

1. *What is “socialness”?*
2. *What is the meaning of “socialness” in workplace and digital environments?*
3. *What is the value of socialness in workplace settings (e.g., productivity, creativity, etc.)?*
4. *What is the role of technology, in particular ESM, in supporting workplace socialness?*
5. *How can all relevant stakeholders (individuals, management, organizations) maximize the benefits while mitigating the risks of technology-enabled socialness?*
6. *What issues of responsible technology use of ESM should be considered that fosters individual well-being and respects personal privacy?*

In order to formulate theoretically-grounded responses to these questions, a highly interdisciplinary, semi-systematic literature review approach (Snyder, 2019; Wong et al., 2013) was used that is informed by:

- sociology and social psychology: to trace the theoretical roots of socialness;
- management and organizational literature (e.g., organizational behavior, human resource management): to understand socialness and its applicability and impact in workplace settings;
- information systems, communication, and media studies: to understand the role of technology (specifically, ESM) and technology design in fostering socialness as well as identify strategies for avoiding unintended consequences (e.g., invasion of privacy, disruptions of work-life balance).

The resultant findings as outlined in this report aim to (1) provide a comprehensive assessment of the state of knowledge and (2) offer a research agenda to guide future socialness research relevant to workplace settings that also

considers the importance for organizational outcomes. Furthermore, we provide sociotechnical insights into the role of technology in enabling socialness along with design guidelines and best practices for fostering workplace socialness. The hope is that these findings can be validated and tested in future empirical research.

METHODS

Given the focus of the study on the concept of socialness—particularly in workplace settings and as enacted through Information and Communications Technologies (such as ESM)—we adopted a semi-systematic literature review method. The process of the review is shown in Figure 1. This consisted of a narrative review approach designed for topics that have been conceptualized differently and studied by various groups of researchers within diverse disciplines (Braun & Clarke, 2006; Snyder, 2019; Wong et al., 2013).

Data Sources

We searched for scholarly articles in ABI/INFORM Collection and Web of Science—the two largest databases for scholarly literature with 71 and 100 million items respectively (filtering out the overlap between search results).



Publication Types and Time

We focused our search on three sources (i.e., conference papers, conference proceedings, and scholarly journals) and/or three document types (i.e., articles, conference papers, and conference proceedings). Only publications in English were included.

Considering the highly interdisciplinary nature of the topic of interest, diverse publishing standards in different disciplines, as well as some avenues of research being rather embryonic (e.g., ESM domain), focusing on journals alone would be too restrictive. Meanwhile, given our focus on digital settings and the role of technologies (e.g., ESM), we generally focused on reviewing literature in the past 10 years (2010–2020). However, in order to understand the disciplinary origins of socialness, we also explored previous (pre-2010) foundational work for addressing our first research question (creating a foundational conceptualization of socialness).

Search Keywords and Process

Within these databases, we conducted an advanced search using the following keywords: *socialness*, *sense of community*, *meaningful relationships*, *social interaction*, *social communication*, *workplace*, and *organization*. The list of keywords was determined based on discussions within the research team and multiple initial test searches to ensure that the returned results were neither too narrow nor too broad. We also limited our search to articles with these search terms in the paper title, abstract, or keywords to ensure that the search terms were a core part of the publication (rather than mentioned tangentially in the body of the paper). We then composed a series of search query strings combining all search criteria in the databases to search for the publications.

In total, 735 publications were retrieved, and the full text of the publications was downloaded. The metadata of the publications, including title, abstract, name of journal/conference, publication year, author keywords, and index keywords were exported as a .csv file.

Filtering and Relevance Assessment

Before proceeding to the actual literature review, we began by reviewing all article abstracts to assess the extent to which the article satisfies one of four inclusion criteria: (1) providing a foundational conceptualization of socialness (or related terms), (2) showing relevance to workplace settings, (3) focusing on digital (or virtual) settings, (4) studying the role of technology. The process of relevance assessment was conducted by two independent research team members based on a subsample of 140 publications that were randomly selected from all retrieved publications. After the two coders achieved an adequate level of intercoder reliability (Cohen's kappa coefficient: 0.44), the remaining publications were divided among the coders to assess the relevance and prospective retention. Overall, 103 publications (14%) were selected for the literature review, including 86 journal articles and 17 conference papers/proceedings. Among the unselected papers, approximately 41.1% do not satisfy any of the inclusion criteria. About 53.6% of the studies were conducted within the workplace or digital settings but they do not show relevance to socialness. The rest 5.3% are focused on socialness or technology outside workplace settings.

Analysis of Publications

Following the identification of the final sample of relevant publications, two research team members continued to extract information from the

publications presented in Table 1, which also shows the link between the extracted information and the project goals. Furthermore, the two team members grouped and synthesized the publications based on the research questions and goals, namely (1) the meaning of “socialness”, especially in workplace settings; (2) the value of workplace socialness; and (3) how technology supports workplace socialness and how to maximize its benefits and mitigate its risks.

Table 1 Information extracted during the semi-systematic literature review process.

Information extracted	Links to project goals/objectives
Descriptive information (e.g., discipline, author affiliation, journal affiliation, type of study, unit/level of analysis)	Provide contextual info that can help assess quality of the publication and timeline/ evolution of evaluated scholarship.
Key definitions of topic of interest (or related topics)	Comprehensive conceptualization of topic topics)
Theoretical perspectives used	Interdisciplinary mapping of domain
Summary of findings	Knowledge syntheses, identify research strengths
Key contributions (research and practical)	Best practices, policies
Future research suggestions	Gaps, weaknesses, and avenues/areas of opportunity

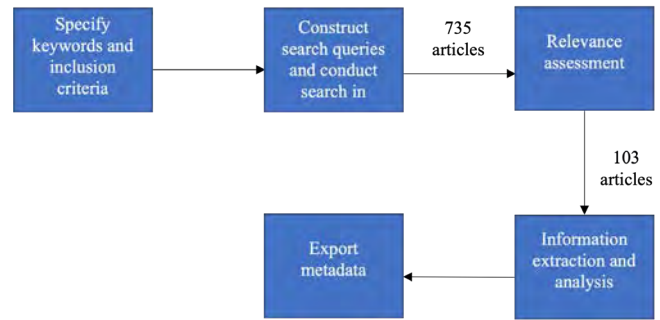


Figure 1 The process of the semi-systematic literature review

FINDINGS

Defining socialness

Collins (1998) defines socialness as something innate and as the capacity to attain social fluency or social capabilities. Similarly, socialness is understood as the urgency to find community in others, something inherently human, and as having no other purpose than the act itself (Meske et al., 2019).

The reviewed literature did not address the concept of socialness per se. Nonetheless, some parallels were observed between the concepts of sociability, need for affiliation and the definition mentioned above of socialness. Based on their respective definitions and characteristics, we were able to delineate a set of common denominators that allowed us to formulate our own definition of socialness from various applications of socialness and related concepts in the social sciences and humanities.

The *need for affiliation* is understood as the desire to establish and maintain positive personal relationships with others (Glew, 2012). It also reflects individual preferences regarding social interactions. People with a significant need for affiliation enjoy being with other peo-

ple, making efforts to have friends, pursuing working with others, and greatly value a sense of belonging and building harmonious relationships (Glew, 2012; Leroy et al., 2015). On the other hand, *sociability* is intrinsically human (Fantinel & Davel, 2019) and can be conceptualized as a tendency to affiliate with others in the sense of pursuing social situations instead of being alone (Leroy et al., 2015). Within organizational settings, research on organizational psychology and behavior describes sociability as the ability to be sociable and as a degree of friendliness among members

Therefore, we define socialness as:

“The intrinsic and spontaneous human willingness to affiliate and connect with others in order to build harmonious relationships.”

Socialness in the workplace

In workplace settings, socialness is the employees' willingness to search for affiliation and connections with other members of the organization in order to build meaningful relationships oriented to facilitate work and

Table 2 Definitions of socialness and the related notions of need for affiliation and sociability

Socialness	Need for affiliation	Sociability
Something that we are born with; something that is inherently human (Collins, 1998; Meske et al., 2019)	Desire to establish and maintain positive impersonal relationships with others (Glew, 2012).	Intrinsic to the human condition (Fantinel & Davel, 2019)
Urgency to find community in others; Capacity to attain social fluency or social capabilities (Meske et al., 2019).	People enjoy being and working with others in order to belong and to build harmonious relationships (Glew, 2012; Leroy et al., 2015)	Tendency to affiliate with others in the sense of seeking social situations (Leroy et al., 2015); Ability to be social (Fantinel & Davel, 2019).

of an organization (Fantinel & Davel, 2019).

Based on the parallels among these constructs as summarized in Table 2, the definition of socialness has two parts. The first is that socialness is a desire that is innate and inherently human. The second part highlights that this desire is a tendency, urgency, or willingness to seek social situations to establish, maintain and build harmonious relationships.

improve personal well-being. Thus, employees will voluntarily engage in spontaneous interactions, improvised encounters, and conversations that are not always work-related (Cai et al., 2014; Fay, 2011; Qureshi et al., 2018). As presented in Table 3, the extant literature illustrates several key components that constitute socialness in the workplace.

Firstly, the connections between employees

are formed through work-related interactions. Li and Chen (2012) observed that employees help each other solve or avoid work-related problems. By focusing on commonalities, talking about activities and doing things together, organizational members exchange opinions, and critical information, address concerns and provide mutual support (I. Y. Lin & Kwantes, 2015; Qureshi et al., 2018). Similarly, Angela Titi (2013) and Baralou and McInnes (2013) noticed that employees debate and have casual conversations over a cup of coffee to help their colleagues be more efficient in solving work-related issues. When employees face difficulties in daily work-related activities, employees engage in spontaneous discussions, providing advice, sharing critical information, offering suggestions, personal assistance, and feedback (Raineri et al., 2016; Zhang et al., 2015). In the same vein, several studies posited that employees get involved in discussions with their peers to exchange ideas, skills and abilities (Giermindl et al., 2018; Ng et al., 2014). Briefly, when employees face difficulties in daily work, they connect with other organizational members due to asking for assistance, exchanging views, and sharing thoughts and experiences (Uysal, 2016; Zhang et al., 2015).

Secondly, workplace socialness is reflected in informal conversations that allow employees to know each other better and establish meaningful connections. Fay (2011) observed that employees engage in small or collegial talk, sharing personal news and intimate information (i.e., family matters, illness, divorce plans). Similarly, employees also share jokes, hobbies, and family stories through casual conversations and constant story-telling that can take place over lunch or coffee and after office hours (Qureshi et al., 2018; Sasikala & Daniel, 2013). Essentially, the constant exchange of personal information contributes to devel-

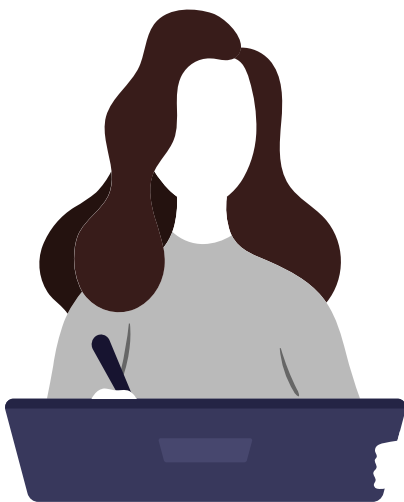
Table 3 Key components of workplace socialness

Component	Source
Employees connect with each other via work-related interactions	(Angela Titi, 2013; Baralou & McInnes, 2013; Giermindl et al., 2018; Li & Chen, 2012; I. Y. Lin & Kwantes, 2015; Ng et al., 2014; Qureshi et al., 2018; Raineri et al., 2016; Sasikala & Daniel, 2013; Uysal, 2016; Zhang et al., 2015)
Employees engage in informal conversations to know each other better	(Blagoev et al., 2019; Chang et al., 2018; Fay, 2011; Larsen & Bogers, 2014; I. Y. Lin & Kwantes, 2015; Prieto-Pastor et al., 2018; Qureshi et al., 2018; Sasikala & Daniel, 2013; Schetzle & Delpechitre, 2014)
Employees provide emotional support to each other	(Chang et al., 2018; Fay, 2011; Giermindl et al., 2018; Ng et al., 2014; Pooja et al., 2016)

oping a common point of view that allows employees to know one another (Prieto-Pastor et al., 2018). Even though most informal interactions and conversations may take place within workplace settings, authors like Blagoev et al. (2019) and Chang et al. (2018) suggested that outdoor activities and social events (training sessions, group trips, social gatherings, creative workshops, weekly yoga classes or breakfasts) are ideal for employees to bond with each other. In fact, according to Schetzle

and Delpechitre (2014), active listening, open communication and frequent communication strengthen the bond between organizational members. These behaviors allow employees to spend more time interacting, hence, knowing each other better and building meaningful relationships (Angela Titi, 2013; Hsu & Chang, 2014; Liang et al., 2016; Nguyen, 2019).

Thirdly, employees connect and affiliate by supporting each other emotionally. According to the literature, employees use casual conversations to discuss feelings verbally, problems, subversive themes and express frustrations (Fay, 2011; Larsen & Bogers, 2014; I. Y. Lin & Kwantes, 2015). Pooja et al. (2016) showed that employees share concerns about workloads, and at the same time, they seek others to help them understand and cope with stressful work circumstances. Moreover, the authors suggested that informal interactions and having meaningful relationships with peers buffer individuals against any feelings of negativity so that they will withstand certain demanding situations. All in all, employees connect and affiliate with peers by sharing emotional support to better cope with the complexity and uncertainty inherent to organizational life (Chang et al., 2018; I. Y. Lin & Kwantes, 2015; Ng et al., 2014).



The value of socialness in workplace settings

Among the primary outcomes of socialness within work settings, the reviewed literature repeatedly explored the concept of trust (Bal et al., 2010; Chang et al., 2018; Dube & Marnewick, 2016; Fay, 2011; Glew, 2012; Hsu & Chang, 2014; Lewis et al., 2011; Liang et al., 2016; Luo & Cheng, 2015; Prieto-Pastor et al., 2018; Wu & Lee, 2016). Trust is defined as a willingness of a party to be vulnerable to the actions of another party. This willingness is based on the positive expectations regarding the goodwill and competence of the other to perform a particular action to the trustor, despite the individual's intrinsic values and irrespective of the ability to monitor or control the other party (Hsu & Chang, 2014; Khvatova et al., 2016; Luo & Cheng, 2015; Prieto-Pastor et al., 2018). Within workplace settings, as employees interact informally, they will share resources through self-disclosure (Fay, 2011). As the number of informal interactions increases, individuals will tend to exchange more resources and build trust. This can be explained by social exchange theory, which describes the process that governs the transfer of psychological or social resources during social interactions (I. Y. Lin & Kwantes, 2015). Social exchange theory centers on norms of reciprocity which states that one party will repay benefits received from another party to improve the quality of the relationship (Ng et al., 2014; van Knippenberg et al., 2015). Once trust is built, the number of social interactions will increase as trust favors exchange, cooperation and eases communication among team members making it more open and receptive (Luo & Cheng, 2015; Monavvarian et al., 2013; Zhang et al., 2015).

The second outcome of socialness in the workplace that is repeatedly explored in the reviewed literature relates to knowledge sharing.

The literature shows that social interactions act like channels for information and resources and therewith facilitate knowledge sharing via informal communication networks (Cai et al., 2014; Khvatova et al., 2016). One possible explanation for this is that since knowledge sharing is connected to people, it flows unpredictably (Khvatova et al., 2016). In the same vein, trustworthy relationships and social interaction ties were found to stimulate knowledge sharing and acquisition (Shu-Chen & Cheng-Kiang, 2010). In fact, Shu-Chen and Cheng-Kiang (2010) showed that employees felt more inclined to share knowledge within a climate of affiliation. Inside said climate, employees' socialness will increase the number of interactions in the shape of active participation, social support and collaboration, thus creating a routine for the flow of knowledge (Hoogeboom Marcella & Wilderom Celeste, 2020; Prieto-Pastor et al., 2018; Wu & Lee, 2016).

A third outcome associated with workplace socialness that was evident from the reviewed literature pertains to job performance. Performance is the outcome of work whose effectiveness, efficiency, satisfaction, innovation and quality can be measured (Dube & Marnewick, 2016). Social interactions significantly impact job performance, while it is not directly related to work, they can provide all the necessary resources and information at a lower cost (Cai et al., 2014). Furthermore, people prefer to discuss important information in an ad-hoc manner over lunch or coffee (Sasikala & Daniel, 2013). Bal et al. (2010) found that employees with low social exchanges exhibited lower work performance when they perceived that the organization failed to fulfill its obligations, because employees reciprocated by reducing their efforts in the job. Socialness in the workplace may increase the quality of relationships between the employee and the environment,

desensitizing the individual to negative feelings toward the organization and thus increasing the employee's willingness to accept stressful situations (Bal et al., 2010; Pooja et al., 2016).

A fourth and final outcome associated with workplace socialness explored in the reviewed literature is the sense of community established. Sense of community is a feeling of harmony derived from working for a common cause within a readily available, mutually supportive network of relationships (Boyd et al., 2018; Lampinen et al., 2017; McCole, 2015; Uysal, 2016). In the literature, sense of community was linked to reciprocal social exchanges and support (Uysal, 2016), close relationships at work (Lampinen et al., 2017) and good relationships (White et al., 2010). Socialness builds reciprocal social exchanges between employees that, in order to maintain the quality of the relationship, will be prompt to share relevant work-related information and support, therefore providing a feeling that will be met through mutual commitment (Lampinen et al., 2017). To summarize, Table 4 presents the impacts of socialness in the workplace through the four themes found in the literature.

Table 4 The impact of socialness in the workplace

Themes	Relationship with Socialness	Source
Trust	Socialness increases the number of social interactions, thus motivating employees to share resources reciprocally and develop trust in one another.	(Bal et al., 2010; Dube & Marnewick, 2016; Fay, 2011; Hsu & Chang, 2014; Liang et al., 2016; Luo & Cheng, 2015; Monavvarian et al., 2013; Prieto-Pastor et al., 2018; Wu & Lee, 2016; Zhang et al., 2015)
Knowledge sharing	Socialness boosts active participation, and acts like channel for information and resources and therewith facilitates knowledge sharing.	(Angela Titi, 2013; Boateng et al., 2010; Dulipovici & Robey, 2013; Gerards et al., 2018; Hoogeboom Marcella & Wilderom Celeste, 2020; Khvatova et al., 2016; H. Lin, 2011; McMillan, 2016; Minbaeva et al., 2012; Monavvarian et al., 2013; Nguyen, 2019; Said Abdullah Al et al., 2016; Sasikala & Daniel, 2013; Zhang et al., 2015)
Job Performance	Socialness increases informal communication and social exchanges granting employees access to resources and information to improve efficiency and effectiveness. Moreover, socialness helps employees to increase their efforts and exhibit a willingness to accept negative situations at work that would otherwise undermine their performance.	(Bal et al., 2010; Cai et al., 2014; Dube & Marnewick, 2016; Koo et al., 2011; Ou & Davison, 2016; Sawyer et al., 2010)
Sense of community	Employees' socialness is reflected in reciprocal social exchanges, support and good relationships that will provide employees with a feeling of being connected with others and belonging to a community.	(Gupta et al., 2020; Lampinen et al., 2017; Schetzle & Delpechitre, 2014; Uysal, 2016; White et al., 2010)

The benefits and risks of social technologies in supporting workplace socialness

Social technologies in the workplace, frequently referred to as Enterprise Social Media, are private, internal platforms that companies use to enable their employees and teams to communicate and collaborate across the organization (Leonardi et al., 2013). These platforms typically incorporate elements of team messaging, project management, productivity tools, and collaboration tools.

With respect to the role of social technologies in supporting workplace socialness, the majority of the reviewed papers focus on examining the impact of the use of such technologies from one of two perspectives: knowledge management (specifically in the context of knowledge sharing and collaboration) and organizational behavior (specifically in the context of job satisfaction, motivation, sense of community).

From a knowledge management perspective, the use of social technologies—such as ESM—presents several benefits and challenges for knowledge sharing and collaboration in an organizational setting. First, the use of social technology enables and facilitates different sorts of interactions between individuals in the workplace, including formal work-specific interactions and informal social interactions. Social technologies, particularly ESM, break geographical and temporal boundaries that otherwise potentially restrict employees' engagement in social interactions with one another (Lirio, 2017). Thus, individuals are more likely to expand their social circles and socialize with colleagues of more diverse backgrounds (Qureshi et al., 2018; Van Osch & Steinfield, 2016) that they would not otherwise interact with (Van Osch & Steinfield, 2018). Individuals are thus able to reach out and establish

new connections and accumulate social capital, which is a critical antecedent to facilitating knowledge sharing within organizations (Sun et al., 2019). The frequent and repeated use of IT to mediate interactions further helps to strengthen social ties and therewith contributes to fostering trust between employees and creating a shared vision, another critical antecedent to knowledge sharing. Individuals are more likely to share knowledge and collaborate when they have a higher level of trust with each other and work in a supportive environment with common perspectives (Liang et al., 2016; Wietske van Osch & Bulgurcu, 2020).

However, the use of ESM may also hinder knowledge sharing depending on an employee's goal and the way ESM are used. The implementation of social technologies can introduce large amounts of information and thus result in information overload, including too much social (i.e., non-work) information. Without proper management, employees may find it difficult to search and retrieve the knowledge they need and this could diminish their capabilities to share knowledge. Meanwhile, through built-in algorithms intended to push information that a user is likely to find interesting based on past usage behavior, ESM can also create echo chambers and reinforce groupthink (Leonardi et al., 2013).



Furthermore, employees may hide their real opinions and ideas if they believe expressing their different opinions publicly on ESM will create negative reactions toward them by their peers, groups and the organization (Sun et al., 2019).

From the lens of organizational behavior, social technology enables employees to exchange support, emotion, and feelings, and thus helps to develop meaningful connections and a sense of belonging. At the individual level, technology allows self-disclosure and sharing of personal experiences and news beyond formal work activities. Doing so allows employees to establish and maintain close relationships with each other, which provides opportunities to socialize and exchange resources. Such self-disclosure and sharing of personal experiences are also beneficial for fostering proactive work behaviors as employees are more likely to develop interests and caring for their colleagues through these types of social interactions on ESM, motivating individuals to carry out behaviors that can support their colleagues and benefit the organization as a whole (Bizzi, 2020).

Furthermore, at the group and organizational level, technology can develop and reinforce community identity and increase attachment to the organization. Through the exchange of support between individuals, employees can

recognize the organization as an important vehicle for meaning, growth, and connections, and see themselves as organic parts of the organization. ESM also enables employees to publicly exchange support, either directly between colleagues or indirectly with an entire group or organization. Therefore, even if some of the employees are not actively participating, they are still able to observe the interactions between the other people on the platform, which helps to create a supportive perception and a strong sense of community (Uysal, 2016).

Nonetheless, using ESM can potentially induce psychological burdens and distraction among employees. The increasing number of social interactions and exchanges of support may require employees to spend an excessive amount of time on ESM therewith disturbing their regular work schedule and pace (Sun et al., 2019). Too much non-work related content and communication can be a distraction and lead to a loss of productivity (Bizzi, 2020). Furthermore, the use of social technology may result in an invasion of privacy. The ubiquity and pervasiveness of the technology may oblige individuals to provide instant responses and work additional or abnormal hours, and thus interfere with their private life (Lirio, 2017). As a result, employees may become more concerned and potentially hostile toward the technology (Sun et al., 2019).

DISCUSSION & IMPLICATIONS

Research Framework and Agenda

In Figure 2, we present a framework summarizing current knowledge on socialness in workplace and digital settings. This framework is focused on understanding how socialness manifests itself in the workplace and the role of ESM and other social technologies in sup-



porting socialness. More specifically, socialness, as an innate urge, triggers social interactions between individuals to facilitate work, establish connections, and exchange support. Organizations use ESM and other social technologies to further support such interactions, which can lead to both positive and negative impacts, across varying levels, namely individual, group, as well as organizational.

urge to establish affiliation via social interactions, the measurement can focus on both the perceptions as well as the actual behaviors of individuals. From the perspective of perceptions, such a scale could measure how individuals perceive their willingness and needs to seek social connections at work, and whether and how a digital environment is conducive to workplace socialness. From the perspective of behaviors, the scale could measure individuals' actions in relation to social interactions

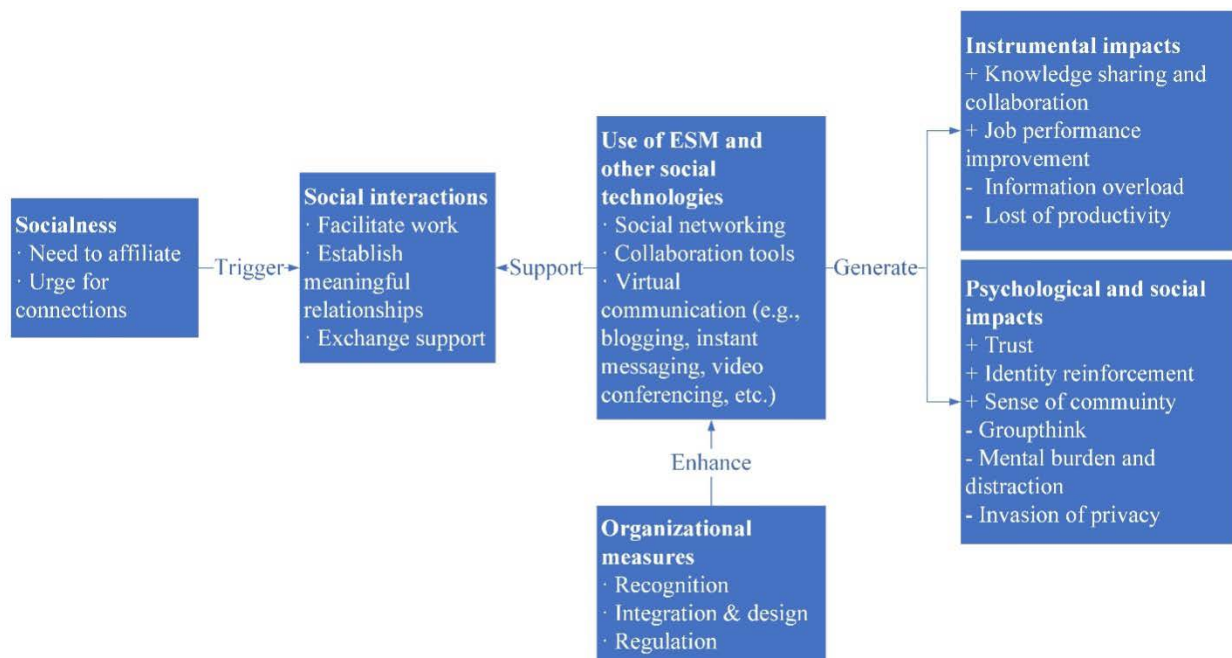


Figure 2 Research framework

Therefore, based on these impacts, organizations should take various measures to enhance the benefits and overcome the disadvantages of ESM.

Based on our review and the framework, we propose several future research directions. First of all, although we have defined socialness, it is still necessary to operationalize and develop a measurement scale of the concept, specifically as it pertains to workplace contexts and digital environment. As socialness is the

with their co-workers, especially informally and digitally. The development of a socialness measurement would help guide future empirical efforts directed at examining various relationships between socialness and other key constructs, such as those embedded in existing theoretical frameworks derived from social capital and social exchange theories.

Some of the instrumental impacts of ESM on socialness, including knowledge sharing and collaboration, as well as job performance, have

been the focal point of many of the reviewed studies (Bizzi, 2020; Koo et al., 2011; Namisango et al., 2019; Qureshi et al., 2018; Sun et al., 2019); however, current research has offered a limited empirical examination of the psychological and social impacts of ESM use. As ESM make it easier for individuals to build social capital and exchange social resources, future research can focus on investigating how individuals, driven by their needs for affiliation, are able to enhance their organizational identities and develop a sense of community at work via ESM. It is also important to examine these topics from a multi-level perspective. In other words, ESM may have different effects on an individual's identity toward the immediate work teams versus the larger organization, which in turn will influence how individuals use ESM.

In addition to the positive impacts, some studies (Bizzi, 2020; Sun et al., 2019) have pointed out the psychological and social burdens associated with the use of ESM and other social technologies, however, very limited empirical insights exist. Hence, more empirical evidence is required to understand how individuals perceive and react to these negative consequences. For example, future research could investigate how the pervasiveness of ESM affects individuals' intentions to use the technology to connect and interact with others, and how it relates to job performance, collaboration, and other instrumental aspects. Moreover, future research could also conduct group-level observations and analyses to examine the group dynamics in the digital space and whether and how ESM may create echo chambers and cause groupthink.

Additionally, more empirical studies on organizational measures are needed. In spite of the wide adoption of ESM, an understanding of how organizations can effectively utilize and

manage these technologies is still lacking. As ESM may produce undesirable consequences especially in light of improper design and management, it is imperative to investigate the design principles and management practices that can properly align the affordances of ESM with the goals of the organization and those of its employees. Particularly, future research should focus on design principles and features that can help to increase the visibility of information and individual expertise while at the same time reducing information overload. Moreover, future research could aim to propose and examine strategies and measures that organizations can leverage to promote ESM among employees with the aim of enhancing social connectivity as well as productivity, while reducing the risks of distraction and privacy invasion. In fact, this type of studies can offer practical and actionable insights to help organizations and employees recognize the importance of ESM and maximize its potential and benefits for the organization and the people and teams within them.

Theoretical implications

Prior research assessing social factors at work analyzed the generalized perceptions of interactions. However, little is known about what influences specific daily social interactions, how these interactions are triggered, the role of sociodemographic homophily, and how social interactions are related to organizational outcomes such as performance, job satisfaction, or engagement (I. Y. Lin & Kwantes, 2015). Our literature review provides a conceptualization of socialness that elucidates how social interactions are triggered in a work environment and provides a richer understanding of what makes employees engage in interpersonal interactions.

Firstly, social exchange theory sustains that people engage in social interactions from a

cost-benefit and self-interested perspective, pursuing recognition, advantage, and position. The reciprocal relationship will continue over time if the benefits outweigh the cost (Giermindl et al., 2018; Liang et al., 2016; McFarland & Ployhart, 2015; van Knippenberg et al., 2015). However, from a socialness perspective, employees engage in interpersonal interactions motivated by an innate need to affiliate and build meaningful relationships with peers. Therefore, even though employees might use interpersonal interactions to pursue specific benefits, what in reality drives them to invest resources in building reciprocal relationships, is the innate willingness to find community in others. Consequently, our study adds to social exchange theory by showing how socialness positively influences the quality of social exchanges between employees.

Secondly, social capital theory considers social interactions as social ties that represent the number of exchanges, the closeness of communications, and the quality of their relations (Prieto-Pastor et al., 2018; Zhang et al., 2015). In addition, the theory suggests that social interaction ties are essential resources for building trust among employees (Prieto-Pastor et al., 2018). Hence, our study proves, first, that socialness directly affects the number of exchanges and plays an essential role in developing closeness. Second, our paper indicates that socialness fosters social interactions ties and indirectly promotes trust among employees. Therefore, providing a deeper understanding of how social interaction ties are likely antecedents of trust.

Our study also contributes to the research on personality and social interactions that states that individual-level factors can influence the behaviors of organizational members. Several studies suggest that employees high on

extraversion promptly engage in interpersonal interactions (I. Y. Lin & Kwantes, 2015). This paper challenges these conclusions and indicates that social context and organizational conditions facilitate social interactions and outweigh the influence of personal characteristics.

In addition, the findings of our literature review highlight the significance of social technologies, especially ESM, in workplace socialness by allowing employees to socially interact with one another more efficiently and effectively. ESM are beyond instrumental communication tools in the workplace, more importantly, they are strategic solutions that can be employed by organizations to help build trust between individuals, create shared visions, foster job motivations, and establish a sense of community. While the extant studies primarily focus on one aspect of ESM, such as knowledge management or job motivation, our review synthesized these findings and provides a relatively comprehensive understanding of the effects of ESM on workplace socialness from the lens of multiple theories and propositions. Although some of the research has discussed the potential side effects of ESM, including information overload, loss of productivity, and diminishing of privacy, the report suggests that more empirical research work is needed to further examine the design and the policy implications associated with the use of ESM that can mitigate these negative impacts.

Managerial implications

Our study provides a more fundamental understanding of socialness and its importance in the workplace. Tracing the theoretical roots of socialness illustrates why employees enter into informal and improvised interactions within the workplace and show how these interactions can later evolve into organizational

outcomes such as trust, collaboration, job performance and job satisfaction. Therefore, organizations should structure a social environment where employees feel unconstrained and motivated to communicate and affiliate with others. Social gatherings, team-building exercises, and private activities can translate into positive workplace experiences that boost office morale and improve workplace friendship.

Moreover, organizations can structure a cooperative work environment that stimulates interdependence among employees. The literature suggests that social interactions positively influence trust-building and collaboration, which motivate employees to actively participate in mutual, reciprocal interactions, informal conversations, and meaningful relationships. Meanwhile, socialness also encourages employees to seek affiliation and connection beyond material self-interest. As a result, individuals might develop a feeling of harmony and belonging to a group that works together for a common cause. Moreover, close relationships and a sense of community have significant implications in reducing negative feelings towards the organization and dealing with stressful situations. In consequence, employees will feel supported, more satisfied with their jobs and might also improve their performance.

From a technological perspective, organizations should recognize the importance and the benefits of technology-enabled socialness and build an innovative, solid, and easy-to-use IT infrastructure, which allows employees to contribute and retrieve information more conveniently as well as utilize and strengthen their social capital. Organizations could develop and deploy a highly integrated ESM system that offers a wide range of emerging tools, such as instant messaging, video conferencing, and cloud-based, mobile integrated col-

laboration platforms (Qureshi et al., 2018). An integrated system enables individuals to establish connections, maintain ties, and search for information more efficiently and effectively, and is thus more likely to attract employees to socially interact via technology and maintain active participation. It is also critical that organizations help employees recognize the opportunities and the importance of social technology in their work by demonstrating the benefits of ESM vis-à-vis knowledge sharing and social interactions through adequate training as well as leading by example—i.e., manager or supervisor as key influencers (Koo et al., 2011; Qureshi et al., 2018). For example, organizations can host regular in-person seminars, video demos, and Q&A sessions to offer support and resolve issues regarding technology usage.

To mitigate the risks of technology-based socialness, organizations should first lay down clear policies and norms, as well as offer training and guidance, regarding the proper usage of social technology in various circumstances, such as specifying the right tools to use based on the type of communication (work-related or social-related), and informing new employees of the code of conduct on digital platforms during onboarding. Customizing these technologies based on the needs and the objectives of the organizations as well as the employees could help to improve the usability of the system and reduce unnecessary distractions. Employees should have understandings of how to appropriately manage their time and workflow on social platforms and interact with their colleagues. Meanwhile, individuals' privacy and personal boundaries should be respected on social platforms so that people can feel safe and comfortable with the technology. Organizations need to be cautious about the pervasiveness of social technology and should allow individuals to be "of-

fling” during their personal or productive time.

Design implications

The design of social technologies, particularly ESM, should prioritize the functions that are most pertinent to the needs of organizations and their employees and eliminate unnecessary features to achieve better usability and alleviate information overload. ESM could recommend relevant information to the users by learning their behaviors and direct questions to experts who possess relevant knowledge and resources. For instance, chatbots have recently been developed that support users in searching for knowledge or expertise and help connect them to the right person in the organization. Implementing such recommendation mechanisms and chatbots helps users filter a large amount of information and facilitates the process of finding and socializing with people based on their interests, which promotes the efficiency and the effectiveness of technology-enabled social interactions.

At the same time, when employing recommendation mechanisms, the design should deliberately avoid building echo chambers and filter bubbles. The algorithms need to balance the accuracy of the recommendations that align with users' interests with the need for diversity of information and perspectives. ESM should also be designed as a friendly environment to encourage equal participation and engagement so that every person has the ability to share their comments and opinions. For instance, the system can show content creators' readership numbers as well as basic demographics highlighting the diversity of the readers and the participants. This would help the authors understand that their content is being seen by a variety of people in the organization (Brzozowski et al., 2009).

Moreover, designers and managers of ESM and other social technologies need to understand and appreciate individual differences with respect to privacy needs and other usage habits. Some users may prefer a stronger social connectedness with others while some are more motivated by time-saving or selective sharing. Neither of these behaviors should be viewed as good or bad or as more or less productive. Thus, individual customizations should be enabled to allow users to adjust the platform and manage the level of privacy individually desired. For instance, users could have a “do not disturb” function to better focus on their work and reduce distractions. Organizations can consider allowing users to further create and add self-developed extensions and modules. It is also important for the designers and managers to provide channels to receive feedback from users and continuously review and improve the design to satisfy users' needs.

CONCLUSIONS

To answer our research questions, we reviewed and synthesized literature focused on workplace socialness and the role of technology in recent years (2010-2020). Our study provides a fundamental understanding of socialness and its meaning in the workplace. From a socialness perspective, informal interactions in organizations are triggered by an innate willingness to establish and maintain meaningful relationships. These interactions can grow, evolve and influence work-related outcomes when facilitated by organizational conditions. As a result of encouraging meaningful social interactions, socialness helps to build a climate of collaboration and trust that in turn facilitates knowledge sharing, forges a sense of community, increases job satisfaction, and positively impacts job performance. Meanwhile, our re-

view also presents both the benefits and the risks that social technologies, particularly ESM, can bring to organizations with respect to workplace socialness. On the one hand, ESM facilitates social interactions and cultivates trust between individuals, thus promoting knowledge sharing and the exchange of social support; on the other hand, ESM can also incite information overload and infringement of privacy. Additionally, we proposed a set of design solutions that can mitigate the risks while maximizing the benefits of ESM for fostering positive socialness experiences in workplace settings in terms of usability, information filtering, recommender algorithms, and the need for customization. As this line of research is still embryonic and the amount of literature is relatively limited, more research, especially studies focused on the design aspects that enable ESM to better support workplace socialness, is needed. This will allow us not only to deepen our understanding of how social technologies shape the way we communicate and socialize with others in the workplace but also design technologies with the aim of empowering managers and employees to create more meaningful workplaces.



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You can follow her on Twitter at [@drmpamelalirio](https://twitter.com/drmpamelalirio) and/or [linkedin.com/in/drmpamelalirio](https://www.linkedin.com/in/drmpamelalirio).

1 *l'Observatoire international sur les impacts sociétaux de l'IA et du numérique (OBVIA)*

2 *l'Ordre des conseillers en ressources humaines agréés (CRHA)*



Yuyang Liang, PhD

Yuyang Liang is a Postdoctoral Scholar in the Department of Information Technology at HEC Montreal. He received his Ph.D. in Media and Information Studies in the Department of Media and Information at Michigan State University. His areas of interest include knowledge sharing and collaboration via online communities and social media, enterprise social media, and computational modeling of social systems. His work has appeared in top computer-supported cooperative work and information system conferences and journals, including CSCW, HICSS, HCII, and *International Journal of Human-Computer Interaction*.



Oliver Machuca

Oliver Machuca is a master's Student of Industrial Relations at the University of Montreal (Université de Montréal). He completed his post-graduation studies in Public Relations and Communications Management at McGill University. He received a bachelor's degree in International Advertising from University Sergio Arboleda (Universidad Sergio Arboleda) in Bogota, Colombia. His current master's research focuses on how organizational culture can be built within the context of remote working via communication technologies. He is interested in organizational social processes, knowledge management, creativity, job performance and workplace well-being.