Understanding the influence of social media in the workplace: An integration of media synchronicity and social capital theories

Abstract
Social media has deeply penetrated workplace, which has affected multiple aspects of employees’ lives. This paper aims to investigate the influence of social media on employees’ work performance and the underlying mechanism for how they create value at work. Based on media synchronicity and social capital theories, we propose that social media can promote work performance by stimulating trust among employees and offering a communication channel where explicit and implicit knowledge can be effectively transferred. The research model is tested using data collected from 105 Chinese software professionals. The results reveal that social media can enhance trust among employees. The direct effect on knowledge transfer was not significant but the impact was mediated by trust. Trust enhances knowledge exchange in the workplace with a stronger influence on the transfer of implicit knowledge rather than explicit knowledge. Implicit knowledge transfer was significantly related to work performance, while explicit knowledge transfer did not significantly influence work performance. The theoretical and practical contributions of this study are discussed.

Introduction
Social media have revolutionized communication in people’s lives with their explosive growth and widespread application. People are showing an increasing tendency to build and nurture their online social relationship on social media platforms such as Facebook and Twitter [54].

Although enterprise application of a new information and communications technology often lags behind individual application, social media have been increasingly adopted in the workplace, facilitating organizational communication and knowledge work which was impossible in the past [39]. Social media have become an important research area for scholars interested in online technologies and their social impacts with many studies noting the potential of social media in the workplace.

For example, Jackson et al. [29] studied internal corporate blog use in a global IT company. They found that blog users benefited through the formation of informal social networks, convenient communication and knowledge transfer. Majchrzak et al. [38] found wikis are sustainable in a corporate context with three kinds of benefits are achieved through participation in corporate wikis: enhanced reputation, work made easier, and assisting an organization to improve its processes.

Through a comprehensive survey and thirty semi-structured interviews, Skeels and Grudin [52] found social network sites (SNSs) are widely adopted in the workplace, e.g., one-third of the Microsoft employees are in the LinkedIn, and 36% of the employees are in the Facebook company network. Work-related advantages focus on maintaining external professional networks, creating and strengthening ties with colleagues. In addition, SNSs can help promote knowledge sharing and resource locating. Although these studies have provided exploratory preliminary insights into the capability of social media, their significance in facilitating work are far from clear. From the perspective of employees in enterprises, we therefore pose two questions: Can social media influence employees’ work performance? and What is the underlying mechanism for how they create value at work?

This study integrates media synchronicity theory (MST) and social capital theory to investigate the influence of social media on work performance. Data from 105 Chinese software professionals were collected through a cross-sectional survey. Our work is expected to make two important contributions. First and foremost, to the best of our knowledge, it is the first study to empirically investigate the effect of social media in the workplace. Previous empirical studies have predominantly focused on a specific media, while this research explore the synthesized impact of social media, demonstrating the legitimate employ of social media as a whole at work. Second, we bring insights of MST into social capital theory in the context of understanding employees’ communication and their work performance. Drawing from the core argument of MST, we distinguish the different influence of social media on the transfer of explicit and implicit knowledge, which in turn could provide empirical support for MST.

Theoretical background and hypotheses
Media synchronicity theory

Media synchronicity theory (MST) by Dennis et al. [11] suggests that synchronicity exists among people when they work together at the same time with a shared focus, and defines media synchronicity as the “the extent to which the capabilities of a communication medium enable individuals to achieve synchronicity”. This theory contends that tasks are set of fundamental micro-level communication processes, which are composed of
two fundamental processes: conveyance and convergence. Conveyance processes focus on the exchange of vast quantities new information, while convergence processes involve reaching a common understanding of preprocessed information. MST argues that for conveyance processes, use of medium with lower synchronicity should lead to better communication performance while for convergence processes, use of medium with higher synchronicity should lead to better communication performance. MST identifies five objective capabilities of medium that influence the level of synchronicity [11]:

- transmission velocity: the speed to which a medium can transmit a message
- parallelism: the extent to which a medium enables information from multiple senders to be transmitted simultaneously
- symbol sets: the number of ways in which the information can be conveyed
- rehearsalability: the extent to which a medium enables the sender to rehearse or adjust the message before sending
- reprocessability: the extent to which a message can be reexamined or processed again by the receiver.

Different from previous media theories, MST argues that one medium is not inherently better than another. Tasks consist of a series of communication processes, so that different media capabilities are needed. When a variety of media with different capabilities are employed to complete a task, communication performance will be enhanced, thus leading to better task performance. MST is especially suited to social media studies, since social media are not a single media, but a combination of media.

According to McGrath’s [41] time, interaction, and performance (TIP) theory, people working with others execute three simultaneous functions: production (i.e., getting the mission or task completed), team well-being (i.e., maintain and strengthen the relationship with other team members), and member support (i.e., activities that help personal development). Consistent with Dennis et al. [11], we combine team well-being and member support functions into social function. As communication is the most important approach for people to implement these functions, accordingly, it can be classified into two types: task-related production and social communication. Task-related production communication relies on exchanging and commenting on the work information to shape task performance, while social communication relates directly to relationship building and maintenance.

One of the most prominent contributions of MST is to provide a framework to link media, communication and task performance. In our study, we argue that social media function as task-oriented and social-oriented communication media. The relational use of social media will lead to better communication, improving work performance. The overarching framework of this study is shown in Figure 1.

![Figure 1. Overarching framework](image)

**Social capital theory**

Social capital is the resources embedded within an individual’s or an organization’s network of relationships, including both interpersonal relationships and the resources rooted in the relationships [40]. Social capital is a multidimensional concept, which can be divided into a structural, relational and cognitive dimension [42]. The structural dimension means overall pattern of connections between people, i.e., who you connect and how you connect them. The relational dimension describes resources embedded in the social relationship such as trust, commitment, and reciprocity. The cognitive dimension refers to a common context which increases understanding among people represented by shared language, codes, and goals. For the members of a network, the social capital benefits contain broader sources of information and opportunities that are otherwise unavailable.

In this study, we focus on the relational dimension of social capital, which is manifested as trust. The most evident motivation for people to use social media is the need for social interaction. Employees in the workplace communicate to create, maintain and strengthen their interpersonal relations. Although social communication and interactions are not focused on the team task, they have been found to be related to positive results, such as higher satisfaction and better decision quality [7]. Trust is the most important element in the shape of excellent communication among team members [20]. Therefore, we propose that social communication by means of social media has an indirect effect on work performance via the impact on trust. In the era of knowledge economy, knowledge is an important strategic resource upon which competitive edge is established.

The knowledge transfer ability from one unit to another has been recognized as a dominating contributor to organizational performance [5, 19]. Knowledge transfer can be regarded as the social capital benefit as well as a process of task-related production communication. We contend that social media can stimulate trust between employees,
offering a communication channel where explicit and implicit knowledge can be effectively transferred. Trust can facilitate knowledge transfer. Both trust and knowledge transfer help promote work performance. Figure 2 depicts the research model.

The effect of social media at work

Social media consist of bundles of information and communication tools, providing multiple communication channels for information exchange and knowledge transfer. The existing definitions of knowledge transfer differ. For example, knowledge transfer can be considered as “the process through which one unit (e.g., group, department, or division) is affected by the experience of another” [4]. Following Ko et al. [34], knowledge transfer in this study is defined as the communication of knowledge from one employee so that it is learned and applied by another, which corresponds to task oriented communication directly. Considering the focus of our study on the benefits of social media, we examine knowledge transfer from the perspective of the receivers.

MST proposes that communication performance will be enhanced when a variety of media are used, the “best media” for a given situation is a combination of media [11]. Social media are exactly a combination of different media, providing the ideal combination of media capabilities for knowledge transfer. However, information technology alone is typically not the main driver for any knowledge management initiatives. It is the way people use it that shapes the role of IT in supporting knowledge sharing [28].

As an effective social networking platform, social media are widely employed to maintain external professional networks and to strengthen ties with colleagues. In a collaborative environment, individuals often develop and rely on their own ego-centered networks in deciding with whom to collaborate and how to collaborate [48]. A characteristic of social media is that the existence of the social network is visible and more accessible, enabling individuals to locate expertise in one’s social network more effectively in processing online collaborative knowledge transfer. These social network and ties created through social media can link organizational members to various sources of knowledge and help explanation of the knowledge, fostering a new form of information exchange. By fostering informal networks, weak ties, boundary spanners and social capital, the utilization of social media is expected to facilitate knowledge transfer.

However, the influence of social media on the transfer of different types of knowledge (i.e., implicit and explicit) could vary. Previous research mainly uses media characteristics as recognized by media richness theory (MRT) to describe media and predict performance. For example, Albino et al. [1] suggested that the rich media that tend to reduce the equivocality of the task will result in greater success when the knowledge transfer content is equivocal. However, the objective property of media “richness” has been challenged by many scholars, questioning if the use of rich media can lead to positive results. MST also contends that any one media is not inherently better than another, the employ of a single media may lead to undesirable performance. Richer is not necessarily better.

We further develop our hypotheses based on the core argument of MST: for conveyance processes, use of medium with lower synchronicity should lead to better communication performance, and for convergence processes, use of medium with higher synchronicity should lead to better communication performance. As a communication process, knowledge transfer is composed of conveyance and convergence processes. Conveyance process is the transmission of vast quantities new information, while the convergence process is the discussion of preprocessed information that aims to reach a common understanding.

The mix/importance of these communication processes will differ depending on the nature of the task; if the task has many new or different variables, more convergence processes will be needed [11]. Implicit knowledge is abstract and is difficult to articulate, formalize and communicate; explicit knowledge is codified and is transmittable in formal, systemic language [46]. We argue that explicit knowledge transfer will demand much more conveyance than convergence, since it can be transferred and learned relatively easily, people do not need to work together or simultaneously. Besides, it is easy for individuals to agree on the meaning of explicit knowledge, because it can be expressed and...
explained clearly. In contrast, implicit knowledge is embedded mainly in individual members and is difficult to transfer, the communication process may result in more misinterpretation and misunderstanding. Due to its abstract nature, implicit knowledge requires intensive interpersonal interaction and coordination to reach a common understanding, involving mostly convergence process.

In the networked environment, individuals face a major challenge in managing the following modes of communication simultaneously: one-to-one, one-to-many, and many-to-many [16]. Different from traditional CMC tools, such as instant messaging and E-mail, social media provide effective ways to communicate, collaborate, and participate on an unprecedented scale [21]. Although social media offer a variety of synchronous (e.g., microblogging) and asynchronous (e.g., blogs, SNSs, online forums) communication options, they are normally viewed as asynchronous media. Among the five media capabilities, transmission velocity and parallelism are essential to media synchronicity. MST defines lower synchronicity as media that provide low transmission velocity and high parallelism [9]. Social media’s low transmission velocity leaves abundant time for people to deliberate information carefully and express their opinions clearly.

On the other hand, low transmission velocity may hamper convergence process by delaying feedback from receivers to reach a consensus. The high parallelism of social media enables more people to join in a conversation simultaneously, generating different information or idea easily. Rather than focusing on the same issue or topic, these multiple conversation impede participants to develop a shared focus and understanding. As a lower synchronicity media, social media will be more effective for conveyance process than for convergence process, and subsequently influence the effect of knowledge transfer. Therefore, we propose the following.

**Hypothesis 1:** Social media use at work enhances knowledge transfer with a stronger influence on the transfer of explicit knowledge than implicit knowledge.

People who use social media are not just searching and sharing information, they also regard them as a platform to meet friends, to obtain a sense of belongingness and to develop relationships with other people. Normally, individuals accumulate their social capital as a consequence of daily social interactions, but it is also feasible to make intentional investments in social interaction [49]. Prior research has provided abundant evidence that social media use helps build social capital. As suggested by DiMicco et al. [14], the main motivation of employees using internal SNSs is to “build stronger bonds with their weak ties and to reach out to employees they do not know”. Jackson et al. [29] also found that work-related benefits of using blogs centered on creating, maintaining and strengthening ties.

Trust evolves from social interactions [23]. Online social networks created by social media are beneficial supplements to offline networks, permitting employees to know detailed information about their colleagues, such as personal background, character traits, hobbies and interests. Deepening mutual understanding can reduce uncertainty about other people’s behaviors and intentions as a prerequisite of trust [6] [53]. The more we recognize others, the more we may trust or distrust them [45]. Individuals who trust each other may promote communication through various media, including social media. For instance, Ellison et al. [17] found that among American undergraduate students, use of Facebook had an intimate association with maintaining and strengthen existing offline relationships. Similarly, it is unlikely that employers will use social media to communicate with people who they actually distrust. In fact, social media use and mutual trust have a reciprocal relationship. This study focuses on the potential of social media to augment social capital. Therefore, we propose the following.

**Hypothesis 2:** Social media use at work enhances
The effect of trust

Previous studies have demonstrated that interpersonal trust plays a positive role in knowledge transfer, trust has been considered as a fundamental factor for the success of knowledge transfer [15]. Empirically, trust has been proved to result in enhanced knowledge exchange [3], makes information sharing and knowledge exchange more effectively [55] and increases the possibility that knowledge is absorbed by the recipient successfully [37]. Trust is particularly important for knowledge receivers, since it increases the credibility of knowledge and therefore enhances the likelihood that receivers will consider using that knowledge in their deliberations [10]. In virtual communities, trust is also positively associated with the quantity and quality of knowledge sharing [8].

However, the importance of trust for the transfer of explicit and implicit knowledge is different. As discussed earlier, implicit knowledge is embedded mainly in individuals, requiring much more interaction and coordination. For example, the effective approaches for implicit knowledge transfer such as apprenticeship and mentoring depend primarily on intensive interpersonal interaction. Hassan [24] also verified that strong ties are essential to transfer implicit knowledge. Deeper trust and close relationship increase the opportunities for people to communicate, contribute to better understanding and assimilation of implicit knowledge. By contrast, explicit knowledge can be transferred (via documents, manuals, templates, etc.) and learned relatively easily, and will not require high levels of interaction and trust. Therefore, we propose the following.

_Hypothesis 3: Trust enhances knowledge transfer in the workplace with a stronger influence on the transfer of implicit knowledge than explicit knowledge._

Trust has been proved as a key antecedent in shaping cooperative interaction, reducing conflicts within the organization, developing successful solutions, and increasing the effectiveness of teams [43] [31]. Trust is expected to improve the work performance of individuals both in terms of effectiveness and efficiency. Therefore, we propose the following.

_Hypothesis 4: Trust enhances work performance._

The effect of knowledge transfer

Knowledge has been recognized as the main source of competitive advantage for both individuals and organizations. People who specialize in transferring knowledge effectively are more likely to survive than those who are weak at knowledge transfer. Information processing theory claims that increased information exchange is critical in overcoming task interdependence and task uncertainty [2]. In this study, we argue that knowledge transfer based on social media has dramatically improved the effectiveness of coordination and team work. Therefore, we propose the following.

_Hypothesis 5: Knowledge transfer in the workplace enhances work performance._

Methodology

Measures

To enhance validity, items in this paper were adapted or used from existing scales in the literature. The measurement scale for social media use at work was adapted from Kankanhalli et al. [33]. The measures of knowledge transfer were adapted from the study by Dhanaraj et al. [13] with both explicit and implicit knowledge transfer measured by three items. Trust was measured with five items derived directly from the study of [37], which closely correlates to knowledge transfer. Work performance was measured by six self-report items, adopted from Kuvaa [36]. Unless otherwise specified, all items were on a 7-point Likert scale format ranging from 1 (strongly disagree) to 7 (strongly agree). Appendix A lists the summary of construct operationalization. We also included age, gender and work experience as control variables since personal characteristics could influence employees’ work performance.

Data collection in survey

To validate our research model, we collected data online on a voluntary base from software professionals in a large Chinese software company. Before filling out the questionnaires, we (one of the authors) introduced social media (e.g., blogs, SNSs) to the staff members, explained the research objective and ensured confidentiality. The survey was translated from English to Chinese and two graduate students provided comments and suggestions about the Chinese version of the survey until they agreed that these two versions were consistent. The survey questionnaires were distributed to a total of 150 employees of the company. Over a period of one week, a total of 105 valid responses were collected, yielding a valid response rate of 70%. We assessed common method bias based on Harman’s single-factor [47]. No dominant factor emerging from the factor analyses was discovered, suggesting that common method bias was not a concern. Of the respondents, 41.0% were male, 90.5% were in the age range of 21-30, and 64.8% had less than one year work experience.

Data analysis and results

Assessing the measurement model

The adequacy of the measurement model was evaluated by examining convergent and discriminant validity [26]. Convergent validity was evaluated by examining composite reliability and average variance extracted (AVE). In Table 1, all the composite reliability scores exceed a threshold of 0.70, suggesting that our measures are reliable. The AVE values range from 0.513 to 0.701. Convergent validity is verified since each construct has an AVE above 0.50.

Discriminant validity was assessed by comparing AVE and the variance shared between the constructs. In Table 1, the diagonal values stand for the square root of the AVE, all of which are greater that the off-diagonal correlations, proving discriminant validity.
Assessing the structural model

PLS is particularly effective for small sample sizes, making it a powerful approach for testing the research model. The results of the analysis are shown in Figure 3.

As shown in Figure 3, 35.3% of the variance in work performance is explained. We also included control variables in the model and none (age, gender and work experience) had a significant impact on work performance. As hypothesized, social media use at work is significantly associated with trust (path coefficient=0.410, p<0.01), supporting H1. However, social media use at work has no significant effect on the transfer of explicit knowledge and implicit knowledge, thus H2 is not supported. Trust has a significant impact on both explicit knowledge transfer (path coefficient=0.388, p<0.01) and implicit knowledge transfer (path coefficient=0.439, p<0.01). Its influence on the transfer of implicit knowledge is stronger than explicit knowledge (t=3.07, p<0.01), confirming H3. Trust also has a significant impact on work performance (path coefficient=0.265, p<0.01), supporting H4. Implicit knowledge transfer is significantly associated with work performance (path coefficient=0.431, p<0.01), while explicit knowledge transfer has no significant effect on work performance. Thus, H5 is not fully supported.

Discussion and Implications

Summary of results

This study aims at developing a research model to explain how social media impact employees’ work performance. Specifically, we found that social media use at work can enhance trust among employees. This result is consistent with Narayan and Cassidy’s [44] argument that communication is primary determinant of social capital. However, social media’s direct effect on knowledge transfer was not significant but the influence was mediated by trust. This seems reasonable, since trust builds and maintains exchange relationships i.e., without trust, people will not share and cooperate in knowledge exchanges [50]. This finding suggests that simply using social media at work does not ensure the transfer of knowledge for which there may be several reasons. First, there is competition among colleagues in virtual communities, thus employees are concerned that the ownership of expertise will be lost after knowledge transfer [50]. The knowledge shared and exchanged via social media differs from traditional media because with the former, the content is posted in a public community while, with the latter, the communication is private.

Table 1. Composite reliability, correlations and AVE

<table>
<thead>
<tr>
<th>Construct</th>
<th>Composite reliability</th>
<th>AVE</th>
<th>1</th>
<th>2</th>
<th>3</th>
<th>4</th>
<th>5</th>
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</thead>
<tbody>
<tr>
<td>1. Social media use at work</td>
<td></td>
<td>0.840</td>
<td>0.638</td>
<td>0.799</td>
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<td></td>
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<tr>
<td>2. Explicit knowledge transfer</td>
<td></td>
<td>0.876</td>
<td>0.701</td>
<td>0.213</td>
<td>0.837</td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. Implicit knowledge transfer</td>
<td></td>
<td>0.817</td>
<td>0.599</td>
<td>0.247</td>
<td>0.590</td>
<td>0.774</td>
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<tr>
<td>4. Trust</td>
<td></td>
<td>0.842</td>
<td>0.513</td>
<td>0.410</td>
<td>0.410</td>
<td>0.466</td>
<td>0.716</td>
</tr>
<tr>
<td>5. Work performance</td>
<td></td>
<td>0.818</td>
<td>0.532</td>
<td>0.124</td>
<td>0.349</td>
<td>0.546</td>
<td>0.460</td>
</tr>
</tbody>
</table>

*Diagonal elements (in bold) are the square root of variance shared between the average variance extracted (AVE). Off diagonal elements are the correlations among constructs.

Figure 3 Results of PLS analysis
Jeppesen and Frederiks [32] noted that hobbyists, rather than experts, tend to contribute high quality knowledge in online communities. Second, for implicit knowledge to be transferred, there need to be close relationships between a knowledge seeker and a knowledge source [51]. Trust strongly reflects relationship quality, while employees connected through social media are unlikely to have emotional intensive communication [25]. Even though employees do not have an intimate personal relationship, they may keep in touch with each other in online social network communities since weak ties are cheaply and easily maintained [18].

As hypothesized, trust had a significant impact on knowledge transfer, its influence on the transfer of implicit knowledge is stronger than explicit knowledge. Further, trust was positively associated with work performance.

Our results indicated that implicit knowledge transfer was significantly related to work performance. It is generally accepted that implicit knowledge can lead to improved personal and organizational capabilities. Contrary to our expectations, explicit knowledge transfer did not significantly impact work performance. One possible explanation may be that the perceived value of knowledge will differ for implicit versus explicit knowledge transfer. Ford and Staples [22] suggested that the source of knowledge (e.g., books versus mentor) was a component for value, where book-based knowledge was lower value than knowledge from a mentor. Further, usefulness will also influence the perceived value of knowledge. In online social network environment, most comments and opinions posted by employees are based on personal experiences, which have an implicit knowledge dimension. As explicit knowledge is perceived less valuable, it may also be regarded as less useful, leading to less influence on work performance.

Implications for research and practice

Social media have been little studied as a whole in the workplace. To the best of our knowledge, ours is the first study to empirically investigate the synthesized effect of social media in the workplace. Integrating media synchronicity and social capital theory, a strong linkage between media, communication and performance has been established. Our research confirmed social media’s significant role in establishing and sustaining social capital. Although some applications of social media are not related to work directly, their social characteristics can enhances trust among employees that help to obtain work-related knowledge. By exploring the synthesized impact of social media, we respond to the call for study on the combination of various media [11], demonstrating the legitimate employ of social media as a whole at work.

Different from prior media theories, media synchronicity theory contends that communication is comprised of two major processes: conveyance of information and convergence on meaning. MST argues that for conveyance processes, use of medium with lower synchronicity should lead to better communication performance while for convergence processes, use of medium with higher synchronicity should lead to better communication performance. Although this viewpoint is appealing, it has received limited empirical supporting, since it is difficult to divide conveyance and convergence. Dennis et al. [12] conducted a laboratory experiment to test MST. They created rules designed to control the communication process, preventing any “overlap” between conveyance and convergence processes (e.g., group members were prohibited to discuss other members’ ideas during the conveyance process). The drawback lies in that “the decision-making process may iterate between convey and converge activities over time and that forcing groups into one activity or the other at any given point of time may not be representative of how groups actually make decisions in all cases” [12].

To examine the propositions of MST, Hung et al. [27] developed a questionnaire to measure conveyance and convergence processes. For example, conveyance was measured by item “effectively express work opinions”; convergence was measured by item “effectively report current task status”. However, it is unlikely to measure conveyance and convergence clearly since communication is comprised of different combination of these two processes. Consistent with MST’s argument, this research did not separate conveyance and convergence processes, but to investigate their different weight in communication. Because explicit knowledge transfer demands much more conveyance than convergence, while implicit knowledge transfer involves mostly convergence process, we argue that, as asynchronous media, social media has a stronger influence on the transfer of explicit knowledge than implicit knowledge. Although our hypothesis is not supported, we have proposed a better research approach to empirically examine MST.

Practically, this study demonstrates that social media enhance knowledge transfer by fostering trust among employees, thus leading to better work performance. Although the influence of social media on organizations is controversial, we have verified that social media are effective CMC tools in the workplace. Of course, not all social media are appropriate. Organizations should adopt the best combination of social media to fit their strategic targets.

Managers should encourage employees to participate in both social and task-related activities, providing them with guidelines on the suitable amount of time to spend on social media. Without engaging employees, merely adopting social media will not fully develop the abilities of these platforms. Further, managers should realize that the organizational use of social media does not guarantee that knowledge transfer will occur spontaneously. Besides IT infrastructure, they should also try to create and foster a climate of trust to promote effective knowledge transfer. For example, managers could design combination of online and offline activities, organize group discussions on interesting topics to nurture employees’ social capital, and finally construct a learning organization. Managers should also encourage employees’ knowledge contribution through external rewards.

Limitations and future research

This study has certain limitations. First, the participants of this study come from a single company in China. Whether our findings could be generalized to other organization and countries is unclear. The impact
of social media in the workplace can be contingent on the culture background. By controlling the impact of organizational and national culture, further studies may collect data from different organizations and countries to demonstrate generalizability of our results. Second, as a cross-sectional study, the variables were measured at a static point. The formation of social capital and the exchange of knowledge are continuous phenomena. Future research could collect longitudinal data to capture the dynamic relationship among factors. Third, our relatively small sample comprises only computer-savvy employees, which reduces the external validity of our results. Fourth, this study examined trust as the primary construct among the three dimensions of social capital. It would be valuable to investigate other important aspects of social capital, such as network ties and shared language in an integral framework. A final limitation stems from measuring work performance based on employees’ self-report. People tend to overestimate their abilities because they suffer a dual burden: their incompetence deprives them not only of the ability to make correct conclusions and choices, but also of the expertise necessary to realize it [35]. An ideal empirical design could collect more objective data so that more convincing evidence for the contribution of social media in the workplace can be provided.

Conclusion

As the popularity of social media rises, increasing numbers of companies are incorporating social media inside their organizations. However, empirical research on social media in the workplace is rare. By integrating media synchronicity and social capital theory, we have developed a model to investigate the influence of social media in the work context and the underlying mechanism for how they create value at work. Specifically, our empirical study indicated that social media enhance knowledge transfer by fostering trust among employees, thus leading to better work performance. Although social media’s benefits for organizations are difficult to quantify, we have demonstrated that social media are valuable CMC tools in the workplace. By following the guidelines offered in this paper, companies could conceivably enhance employees’ work performance through social media.

References

[10] A. R. Dennis, "Information exchange and use in group decision making: you can lead a group to information, but you can't make it think," Mis Quarterly, pp. 433-457, 1996.


### APPENDIX A. OPERATIONALIZATION OF CONSTRUCTS

<table>
<thead>
<tr>
<th>Construct</th>
<th>Item wording</th>
<th>Source</th>
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<tbody>
<tr>
<td><strong>Social media use at work</strong></td>
<td>(1) I often use social media to obtain work-related information and knowledge</td>
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<td></td>
<td>(2) I regularly use social media to maintain and strengthen communication with colleges in my work.</td>
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<td></td>
<td>(3) What is your frequency of usage of social media in the work? not at all (1)-frequently (7)</td>
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<td><strong>Trust</strong></td>
<td>(1) I assumed that he or she would always look out for my interests</td>
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<td></td>
<td>(2) I assumed that he or she would go out of his or her way to make sure I was not damaged or harmed</td>
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<td></td>
<td>(3) I felt like he or she cared what happened to me.</td>
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<td></td>
<td>(4) I believed that this person approached his or her job with professionalism and dedication</td>
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<td></td>
<td>(5) Given his or her track record, I saw no reason to doubt this person’s competence and preparation.</td>
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<td><strong>Explicit knowledge transfer</strong></td>
<td>(1) I learned written knowledge about the technology effectively from my colleagues</td>
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<td></td>
<td>(2) I learned business manuals effectively from my colleagues in an effective way</td>
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<tr>
<td></td>
<td>(3) I learned written knowledge about management techniques effectively from my colleagues</td>
<td></td>
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<tr>
<td><strong>Implicit knowledge transfer</strong></td>
<td>(1) I learned new working expertise effectively from my colleagues</td>
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<td></td>
<td>(2) I learned knowledge about corporate culture effectively from my colleagues</td>
<td></td>
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<tr>
<td></td>
<td>(3) I learned managerial techniques effectively from my colleagues</td>
<td></td>
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<tr>
<td><strong>Work performance</strong></td>
<td>(1) I almost always perform better than an acceptable level</td>
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<td></td>
<td>(2) I often perform better than can be expected from me</td>
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<td></td>
<td>(3) I often put in extra effort in my work</td>
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<td></td>
<td>(4) I intentionally expend a great deal of effort in carrying out my job</td>
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<td></td>
<td>(5) I try to work as hard as possible</td>
<td></td>
</tr>
<tr>
<td></td>
<td>(6) The quality of my work is top-notch</td>
<td></td>
</tr>
</tbody>
</table>

Based on Kankanhalli, Tan et al. (2005)

Based on Levin and Cross (2004)

Based on Dhanaraj, Lyles et al. (2004)

Based on Dhanaraj, Lyles et al. (2004)

Based on Kuvaas (2006)