



Sacred Heart
UNIVERSITY

New England Journal of
Entrepreneurship

Volume 17 | Number 1

Article 5


2014

The Impacts of Trust and Feelings on Knowledge Sharing among Chinese Employees

Michael J. Zhang

Sacred Heart University, zhangm@sacredheart.edu

Follow this and additional works at: <https://digitalcommons.sacredheart.edu/neje>

 Part of the [Entrepreneurial and Small Business Operations Commons](#), and the [Management Information Systems Commons](#)

Recommended Citation

Zhang, Michael J. (2014) "The Impacts of Trust and Feelings on Knowledge Sharing among Chinese Employees," *New England Journal of Entrepreneurship*: Vol. 17 : No. 1 , Article 5.

Available at: <https://digitalcommons.sacredheart.edu/neje/vol17/iss1/5>

This Research Article is brought to you for free and open access by the Jack Welch College of Business at DigitalCommons@SHU. It has been accepted for inclusion in New England Journal of Entrepreneurship by an authorized editor of DigitalCommons@SHU. For more information, please contact ferribyp@sacredheart.edu, lysobeyb@sacredheart.edu.

The Impacts of Trust and Feelings on Knowledge Sharing among Chinese Employees

Michael Jijin Zhang

This article examines the differential effects of two types of trust (affect based and cognition based) and two types of feelings (*ganqing* and *jiaqing*) on different knowledge-sharing processes (seeking, transfer, and adoption) among Chinese employees.

The influences of these different types of trust and feelings on Chinese employees' propensities to seek, transfer, and adopt explicit and tacit knowledge are also analyzed and discussed. The analysis shows affect-based trust increases knowledge transfer, while cognition-based trust is more important to knowledge seeking and adoption. Affect-based trust alone can facilitate the different processes of sharing explicit knowledge. Effective sharing of tacit knowledge, on the other hand, requires the simultaneous support from affect-based trust and cognition-based trust. *Ganqing* and *jiaqing* are also important in knowledge transfer and adoption. Either feeling may increase the likelihood to seek, transfer, and adopt explicit knowledge by itself. The influences of both feelings on tacit knowledge seeking, transfer, and adoption hinge on the presence of cognition-based trust.

Keywords: trust; feelings; knowledge; sharing; Chinese

Nowadays, knowledge management is widely viewed as a key determinant of sustainable competitive advantage in the global economy. Effective knowledge management practices enable firms to harness innovative and entrepreneurial activities for continual change and survival in today's fast-changing environment. Previous research has shown that firms improved their competitiveness and organizational performance through innovations and corporate entrepreneurship enabled or supported by better knowledge management (Darroch, 2005; Du plessis, 2007; Jiang & Li, 2008; Palacios, Gil, & Garrigos, 2008; Zack, Mckeen, & Singh, 2009; Kim, Song, Sambamurthy, & Lee, 2012). For instance, Zack et al. (2009) argued and empirically found that companies implementing certain knowledge management practices, such as identifying knowledge sources, enjoyed product leadership. Kim et al. (2012) showed that knowledge integration capability mediated the positive effects of entrepreneurial activities on firm performance.

For a company that operates in more than one country, one of the primary knowledge management challenges is to create and mobilize knowledge effectively in different cultural environments. In the knowledge management literature, there is growing recognition that effective knowledge management practices, such as knowledge sharing, are culturally bound; that is, they are affected by differences in national cultures (Glisby & Holden, 2003). Current studies on the knowledge-sharing behavior of Chinese employees suggest that interpersonal trust and feelings formed in the Chinese culture may play important roles in influencing Chinese employees' propensity to share knowledge with others (Zhou, Siu, & Wang, 2010; Huang, Davison, & Gu, 2011; Wang, Tseng, & Yen, 2012). Given the increasing importance of a multinational firm's operations in China and their contributions to the firm's global knowledge

management efforts, it is important and necessary for Western managers to gain a deeper understanding of how trust and feelings influence Chinese employees' knowledge-sharing behaviors so as to manage the creation, dissemination, and utilization of valuable knowledge in China effectively.

The purposes of this article are twofold. First, it examines the potential differential effects of two types of trust (affect based and cognition based) on different processes of sharing explicit and tacit knowledge among Chinese employees. Prior research on the knowledge-sharing impacts of trust in China focused on how trust affects one's tendency to transfer (provide) knowledge to another person and paid less attention to trust impacts on other processes (knowledge seeking and knowledge adoption) involved in knowledge sharing (e.g., Huang et al., 2011; Wang et al., 2012). As Holste and Fields (2010) showed in their study, affect-based trust and cognition-based trust influenced knowledge transfer and knowledge adoption to different degrees. Hence, investigating the effects of different types of trust on knowledge-sharing processes would help increase our understanding and knowledge of how trust affects knowledge sharing in China.

Second, the article explores the potential influences of interpersonal feelings on knowledge sharing among Chinese employees. Although feelings Chinese people hold about others determine how they treat each other in social relations and exchanges (Chen & Chen, 2004; Wang et al., 2012), research on how Chinese feelings affect knowledge sharing remains scant in the literature. The potential impacts of two common types of feelings (*ganqing* and *jiaqing*) in China are examined in this article. Figure 1 depicts the conceptual model where the two types of trust and two types of feelings are related to different knowledge-sharing processes, which include seeking, transferring, and adopting knowledge. The manners in which different types of trust and feelings affect different knowledge-sharing processes are elaborated in the rest of the article. The impacts of different types of trust and feelings on Chinese employees' propensities to seek, transfer, and adopt different types (explicit and tacit) of knowledge are also examined and discussed.

In the next section, the concepts of trust, its two major types, and their general effects on knowledge sharing are first reviewed. This is followed by a discussion of the different influences of affect-based trust and cognition-based trust on Chinese employees' propensities to engage in different knowledge-sharing processes (seeking, transfer, and adoption) and to share different types of knowledge (explicit vs. tacit). The following section discusses two types of feelings (*ganqing* and *jiaqing*) Chinese people often form about others as well as the manners in which each feeling affects Chinese employees' propensities to seek, transfer, and adopt explicit and tacit knowledge. The last section discusses the research and practical implications of the article as well as its limitations.

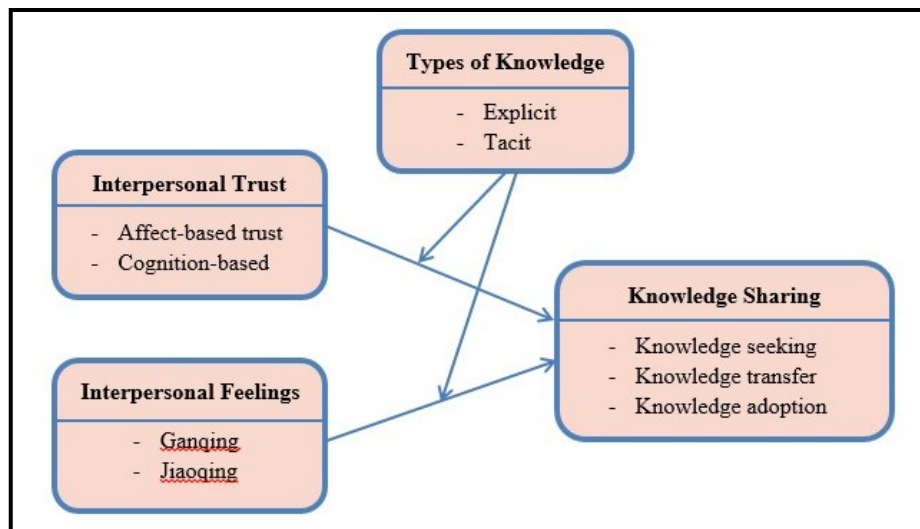


Figure 1: A Conceptual Model of Trust, Feelings & Knowledge Sharing

Trust and Knowledge Sharing

Literature Review of Trust and Its Linkage to Knowledge Sharing

Different definitions of interpersonal trust have been offered in the trust literature reflecting the Western view of trust. Mayer, Davis, and Schoorman (1995: 712), for instance, defined trust as “the willingness to be vulnerable to the actions of another party based on the expectation that the other will perform a particular action important to the trustor, irrespective of the ability to monitor or control that other party.” McAllister (1995: 25) viewed trust as “the extent to which a person is confident in, and willing to act on the basis of, the words, actions, and decisions of another.” Ng and Chua (2006: 45) synthesized these two prevalent conceptualizations of trust as “an individual’s confidence in the goodwill of others and the expectation that others will act in beneficial way.”

In the Chinese discourse about trust, the equivalent word of trust in Chinese is *xing*. While *xing* can imply both *xingren* (trustworthiness) and *xingyong* (credit worthiness), researchers who compared the concept of *xing* to the Western notion of trust generally regarded *xing* as *xingren* or trustworthiness (Chen & Chen, 2004; Kriz & Keating, 2010). Indeed, trustworthiness is deemed as closely related to trust in the Western trust literature (Mayer et al., 1995; Levin & Cross, 2004; Colquitt & Rodell, 2011). Furthermore, there are some similarities between the attributes of Chinese *xing* and those of Western trustworthiness. For example, Mayer et al. (1995) conceptualized trustworthiness as encompassing ability, benevolence, and integrity. Ability reflects the trustee’s skills and competencies; benevolence refers to the belief that the trustee wants to “do good” to the trustor; integrity describes the trustee’s adherence to a set of acceptable principles or shared values. In a similar vein, Chinese scholars view *xingren* as manifested in sincerity, honesty, credibility, reliability, and capability (Chen & Chen, 2004). Among these attributes of *xingren*, sincerity (a person’s true intention to form and maintain a relationship with another and have the other person’s best interest at heart) seems to be more unique to the Chinese conceptualization of trustworthiness (Yang, 2001a; 2001b).

Trust has been widely viewed as a critical facilitator of knowledge sharing in the knowledge management literature. Nonaka (1994) viewed trust as an indispensable base for creating a shared experience among individuals to facilitate tacit knowledge sharing. Husted and Michailova (2002) noted that people in general are not willing to share knowledge without a feeling of trust. This is especially the case when sharing knowledge involves the risk of losing one’s competitive advantage over their peers (Leonard & Sensiper, 1998; Stenmark, 2002). Ample evidence in the literature confirms this supportive role of trust in knowledge sharing (Szulanski, 1996; Lee & Choi, 2003; Chowdhury, 2005; Lucas, 2005; Holste & Fields, 2010). In his study of barriers to internal transfer of best practices in eight organizations, Szulanski (1996) found that the lack of trust between knowledge seekers and knowledge recipients hindered knowledge exchange. Lucas (2005) also found a similar pattern on how interpersonal trust affected knowledge transfer among employees within a Fortune 500 company in the United States.

Recent research on the impact of trust on knowledge sharing in the Chinese context has also generated evidence in support of the positive role of trust. For instance, Tong and Mitra (2009) conducted a qualitative case study of Chinese cultural influences on knowledge management practices in a Chinese mobile phone company and found interpersonal trust increased Chinese employees’ motivation to share their knowledge by reducing some cultural barriers to knowledge exchange such as being afraid to lose face and being modest. Using data collected from the top firms in Taiwan’s high-tech industries, Wang et al. (2012) confirmed the positive relationship between trust and knowledge sharing. Similar empirical evidence was obtained by Huang et al. (2011) in their recent survey of 200 MBA students, many of whom held senior full-time positions in a variety of industries in China. Specifically, the authors found one type of trust (affect based) explained significant variations in tacit knowledge sharing as well as explicit knowledge sharing.

Two Types of Trust and Their Influences on Knowledge Sharing

In the Western trust literature, trust is commonly regarded as a multidimensional construct. Lewis and Wiegert (1985) noted

that interpersonal trust had cognitive and affective foundations. Based on this distinction, McAllister (1995) classified trust into two types: cognition based and affect based. Cognition-based trust is founded on the trustor's assessment of the trustee's competence and dependability. Affect-based trust, on the other hand, is formed through the emotional bonds between the trustor and trustee as well as their mutual care and concern for each other. While acknowledging these two forms of trust were closely related, McAllister (1995) argued and empirically demonstrated that they were qualitatively different. This dichotomy of trust has been widely adopted in many studies on interpersonal trust and its impacts on cooperative behaviors including knowledge sharing (e.g., Levin & Cross, 2004; Chowdhury, 2005; Ng & Chua, 2006; Chua, Ingram, & Morris, 2008; Holste & Fields, 2010). From the Western point of view, the formation of cognition-based trust in general precedes the development of affect-based trust (Holmes & Rempel, 1989; McAllister, 1995). According to McAllister (1995), the trustor's baseline expectations for the trustee's reliability and dependability must be met before both sides invest further in building an emotional tie. The notion that cognition-based trust is more fundamental than affect-based trust does not necessarily hold true in Chinese culture, as discussed below.

While recognizing the dichotomy between cognition-based and affect-based trusts also exists in Chinese culture, Chinese scholars noted that Chinese affect-based trust refers primarily to sincerity and tends to bear more influence on the development of close interpersonal relationships (Chen & Chen, 2004; Tan & Chee, 2005). Moreover, it is likely that Chinese people build affect-based trust before developing cognition-based trust. In other words, a Chinese would typically evaluate the sincerity of another person before appraising his or her ability or credentials in forming relationships. Even though affect-based trust appears to precede and outweigh cognition-based trust in the Chinese culture, they are harder to separate for Chinese than for Westerners (Chua, Morris, & Ingram, 2009). Chua (2012) further noted that Chinese business people today place increasing emphasis on cognition-based trust in building business relationships.

Since each type of trust "functions in a unique manner and has a distinct pattern of association to antecedent and consequent variables" (McAllister, 1995: 51), both Western and Chinese researchers have attempted to differentiate between the two types of trust in investigating the relationships between trust and knowledge sharing. Using data collected from 164 MBA students from a large state university in the United States, Chowdhury (2005) found that both affect-based trust and cognition-based trust increased complex knowledge sharing, although there was no joint effect between the two. The author also found a stronger effect for cognition-based trust, which is consistent with the Western emphasis on cognition-based trust. Based on data collected from U.S managers and professionals, Holste and Fields (2010) also found both affect-based trust and cognition-based trust positively related to willingness to share tacit knowledge and willingness to use tacit knowledge. Furthermore, their results showed that affect-based trust had a stronger influence on willingness to share tacit knowledge, whereas cognition-based trust increased willingness to use tacit knowledge to a greater degree. As mentioned earlier, Huang et al. (2011) used a Chinese sample to investigate the relationships between the two types of trust and sharing of tacit and explicit knowledge. Congruent with Chinese emphasis on affect-based trust, the researchers found this type of trust positively related to the intentions to share both types of

knowledge. On the other hand, cognition-based trust had no influence on the intention to share either tacit or explicit knowledge.

Affect- and Cognition-based Trust in Different Knowledge-sharing Processes

According to Hansen (1999), the entire knowledge-sharing course involves the processes of knowledge seeking, knowledge transfer, and knowledge adoption. Before knowledge is transferred, it is usually located and requested by someone (the knowledge seeker). After the knowledge is transferred, the recipient must decide whether he or she would adopt the knowledge received. From the above review of the current research on how the two types of trust are related to knowledge sharing in both Western and Chinese contexts, it appears that affect- and cognition-based trusts may affect different knowledge-sharing processes in different manners in China. Before a Chinese employee (the knowledge seeker) initiates a knowledge request to a coworker (the knowledge holder), the knowledge seeker must trust the knowledge holder's expertise as well as his or her ability to transfer the knowledge effectively and efficiently. Although trust in the sincerity of the knowledge holder is also important to the extent the sincerity-based trust affects the knowledge seeker's confidence in the knowledge holder's sincerity and honesty in not giving wrong or misleading knowledge, the major consideration is given to whether the knowledge holder is capable of providing the knowledge being sought. In other words, it is unlikely that the knowledge seeker would request knowledge from someone not very trustworthy for his or her expertise or ability even though the knowledge seeker trusts the sincerity and honesty of that person.

In a similar vein, it is likely for a Chinese employee receiving knowledge from a coworker to evaluate the expertise and ability of the knowledge holder first and then his or her sincerity and honesty before adopting the knowledge. Levin and Cross (2004: 1480) noted that "knowledge seekers who trust a source's competence to make suggestions and influence their thinking are more likely to listen to, absorb, and take action on that knowledge." Holste and Fields' (2010) finding that cognition-based trust had a stronger influence on the willingness to use knowledge provided some empirical support for the more pronounced role of cognition-based trust in knowledge adoption.

H1. Both cognition-based trust and affect-based trust are positively related to Chinese employees' propensities to seek and adopt knowledge, with the relationship being stronger between cognition-based trust and the propensities to seek and adopt knowledge.

While cognition-based trust may have a stronger effect on Chinese propensity to seek and adopt knowledge, affect-based trust seems to be more salient in influencing Chinese employees' willingness to transfer knowledge to coworkers who need it. It is evident in the extant literature that providing knowledge may carry some risks for the knowledge contributor such as losing his or her knowledge power and competitive advantage (Huang et al., 2008). The knowledge contributor may even lose face if the knowledge he or she shares turns out to be inadequate or inferior (Tong & Mitra, 2009). Consequently, knowledge hoarding is still common in the workplace in China (Hutchings & Michailova, 2006; Liu & Porter, 2010). For a Chinese employee to give his or her knowledge to another em-

ployee, the knowledge holder must have confidence in the sincerity of the knowledge seeker and/or have close emotional bonds with him or her. In contrast, cognition-based trust in the knowledge seeker is less important or even irrelevant to the knowledge holder whose main concern here is whether to provide the knowledge requested by the knowledge seeker. Findings by Huang et al. (2011) noted earlier demonstrated that, between the two types of trust, only affect-based trust influenced Chinese employees' propensity to offer their knowledge.

H2. Affect-based trust is positively related to Chinese employees' propensity to transfer knowledge sought by others.

Affect- and Cognition-based Trust in Explicit and Tacit Knowledge Sharing

The knowledge management literature draws a distinction between two types of knowledge: explicit and tacit. Explicit knowledge can be easily articulated and captured in documents, reports, presentations, and formulas (Nonaka & Konno, 1998). In contrast, tacit knowledge (e.g., skills, insights, and "gut feelings") is hard to articulate and document (Polanyi, 1967) because it is "deeply rooted in action, commitment, and involvement in a specific context" (Nonaka, 1994: 16). Tacit knowledge is of greater strategic significance to firms because it is harder to be imitated by competition (Barney, 1991; Nonaka, 1994).

Prior research has demonstrated that the characteristics of knowledge transferred influence the knowledge-sharing effects of affect- and cognition-based trust (Hansen, 1999; Levin & Cross, 2004; Chowdhury, 2005; Huang et al., 2011). Since explicit knowledge is easy to codify and explain, it can stand alone and be understood apart from the expertise of the knowledge holder (Levin & Cross, 2004). Hence, trust in the competence of the knowledge holder is less crucial (Hansen, 1999). From the knowledge holder's perspective, affect-based trust in the knowledge seeker's sincerity and honesty is important in that the knowledge holder must believe that the knowledge seeker's adoption and use of the knowledge transferred would not harm the former. Evidence from previous research in both Western and Chinese settings lends support to the more pronounced role of affect-based trust in knowledge transfer. Levin and Cross (2004) found that competence-based trust did not facilitate the transfer of codified knowledge. Huang et al. (2011) and Zhou et al. (2010) both found that it was affect-based trust that increased explicit knowledge sharing.

H3. Affect-based trust is positively related to Chinese employees' propensity to seek, transfer, and adopt explicit knowledge.

Affect-based trust is not only essential to sharing explicit knowledge, but also it plays an important role in tacit knowledge exchange. Since tacit knowledge often entails insights, beliefs, and intuitions that are hard to articulate and tightly intertwined with the experience of the knowledge holder, social collaboration with close and frequent social interactions between the knowledge seeker and the knowledge holder is often necessary to create shared experiences (Nonaka, 1994). Affect-based trust facilitates the creation of shared experience by promoting social and emotional ties between the two parties (Simonin, 1999), which, in turn, increase openness with shared values, mental models, and perceptions (Chowdhury, 2005). Cognition-based trust also contributes to tacit knowledge sharing in that both sides must trust each other's competence to

create shared professional experience (Chowdhury, 2005). In other words, the knowledge seeker must believe the knowledge holder not only possesses the tacit knowledge, but also has the ability to externalize the knowledge. In addition, the knowledge holder must have confidence in the knowledge seeker's capacity to understand and absorb the tacit knowledge. Since affect- and cognition-based trusts are both indispensable to the seeking, transfer, and adoption of tacit knowledge, it can be argued they jointly influence tacit knowledge sharing.

While previous empirical studies showed that affect- and cognition-based trusts each had a positive effect on tacit knowledge sharing (Chowdhury, 2005; Holste & Fields, 2010; Zhou et al., 2010), the potential interactive effect between the two types of trust remained largely unexplored. One study by Chowdhury (2005) tested the potential interaction but found no such effect. When hypothesizing no interactive effect between affect- and cognition-based trusts, Chowdhury argued that it was possible for professional collaboration (induced by cognition-based trust) with weak social ties (lack of affect-based trust) to improve tacit knowledge sharing. Of note, the sample the author used to test his model was drawn from the United States. In comparison to Westerners, Chinese tend to rely more on affect-based trust (Chen & Chen, 2004) and mix it with cognition-based trust more often (Chua et al., 2009). Consequently, it is unlikely for two Chinese employees to engage in close and frequent social interactions without mutual affect-based trust. It can then be argued that both types of trust must be present for tacit knowledge sharing to be effective.

H4. Affect-based trust and cognition-based trust jointly influence Chinese employees' propensities to seek, transfer, and adopt tacit knowledge in a positive way.

Feelings and Knowledge Sharing

Like trust, feelings play a crucial role in Chinese social relationships. Chen and Chen (2004) consider feelings to be one of the key determinants of *guanxi* (personal connections between two or more people in China). Generally known as *qing* in Chinese, feelings fall into two common types: *ganqing* and *jiaqing*. The compound of *ganqing* describes the emotional feeling, affection, and connection developed and accumulated via long-term social relations (Yang, 1994) and implies loyalty, solidarity, unconditional giving, or even sacrificing (Yang, 1994; Tsui & Farh, 1997). The compound of *jiaqing*, on the other hand, refers to the "sense of obligation and indebtedness that results from social and economic transactions to satisfy the pragmatic needs of work and life" (Chen & Chen 2004). *Jiao* in *jiaqing* literally means interaction or exchange in Chinese. Despite being more salient among familiar members and relatives, *ganqing* can be developed between acquaintances or even strangers in the workplace through socializing (e.g., having dinner and playing games together) and/or helping each other with personal problems after work (Chen & Peng, 2008). Whereas *ganqing* is based on affection, *jiaqing* arises from instrumental exchanges that are often economically driven, such as favor or gift exchanges (Hwang, 1987). The instrumental exchange between two coworkers may take place at work (e.g., helping each other solve job-related problems) and after work (e.g., exchanging birthday gifts).

Three points about *ganqing* and *jiaqing* are worth noting here. First, the distinction between the two resembles that between the expressive and instrumental aspects of a Western relationship (Chen & Chen, 2004). Second, while closely related to affect- and cognition-based trusts, respectively, *ganqing* and

jiaoqing represent distinct concepts that influence Chinese social relationships in their unique manners (Chen & Chen, 2004). Third, these two types of feeling are often mixed in acquaintance relationships (Hwang, 1987) including work relationships (Chen & Peng, 2008).

Ganqing and Jiaoqing in Different Knowledge-sharing Processes

Like affect-based trust, *ganqing* is based on the emotional bond and affection between two people. Moreover, two people connected by *ganqing* are loyal to each other and are willing to take care of each other under all circumstances (Chen & Chen, 2004). Consequently, a Chinese employee would feel very obliged to honor a request for knowledge from a coworker to whom he/she is emotionally attached. It is also possible that *ganqing* may influence the knowledge recipient's willingness to adopt knowledge. The strong sense of loyalty and emotional obligation to the knowledge sender may cause the knowledge recipient to either ignore the competence of the knowledge sender or to accept the knowledge despite having some doubt about the ability of the knowledge sender. On the other hand, *ganqing* is less likely to affect knowledge seeking in that the knowledge seeker would not necessarily feel compelled to request knowledge from a knowledge source whose competence is questionable.

H5. *Ganqing* is positively related to Chinese employees' propensities to transfer and adopt knowledge.

H6: *Ganqing* is positively related to Chinese employees' propensity to seek knowledge only if there is cognition-based trust in the knowledge source.

According to Chen and Chen (2004), Chinese people generally follow the rule of "dynamic reciprocity" in developing *jiaoqing* through instrumental exchanges. The unique features of Chinese dynamic reciprocity include "self-oriented reciprocity," unequal exchanges and a long-term orientation (Hampden-Turner & Trompenaars, 1997; Chen & Chen, 2004). Self-oriented reciprocity means returning a favor without consideration of the receiver's need and well-being so as to relieve the giver of the burden of indebtedness. In unequal exchanges, "both sides will practice trying to do more, improving with every new effort, in a system of escalating favors (Hampden-Turner & Trompenaars, 1997: 179). The long-term orientation of Chinese reciprocity values extending the time for repayment and keeping exchanges in balance in the long run. Consequently, the depth of *jiaoqing* is determined by the frequency, scope, and history of the exchanges (Chen & Chen, 2004). In view of the influence of these unique characteristics of dynamic reciprocity, a Chinese employee is expected to transfer the knowledge assistance requested by a coworker with whom the knowledge holder has had a long history of frequent favor exchanges in the past. This prediction is consistent with evidence found among Chinese as well as Westerners who also rely on instrumental exchanges frequently. Zhou et al. (2010) discovered from a survey of Chinese MBA students that an instrumental tie (based on *jiaoqing*) had a positive effect on knowledge transfer. In a recent study of the knowledge-sharing patterns among American and Canadian scientists, Ensign (2009) found that the duration and reciprocity of two scientists' past interaction were positively related to the occurrence of knowledge sharing between them. The author also found that the frequency of the interaction between scientists contributed to their reciprocity, thus influencing knowledge sharing in an indirect way.

It is possible for a Chinese employee to ask for knowledge assistance from a coworker with whom the knowledge seeker has had many favor exchanges before. However, it is unlikely that the knowledge seeker would use *jiaoqing* to request the knowledge from someone who is not believed to be a competent knowledge source. The condition of whether the knowledge holder is competent also influences the decision of the knowledge recipient to adopt the knowledge advice even though he or she has deep *jiaoqing* with the knowledge holder. Unlike knowledge transfer, seeking or adopting knowledge from others is not necessarily deemed as a return of favor.

H7. *Jiaoqing* is positively related to Chinese employees' propensity to transfer knowledge to coworkers.

H8. *Jiaoqing* is positively related to Chinese employees' propensity to seek or adopt knowledge if they have cognition-based trust in the knowledge source.

Ganqing and Jiaoqing in Explicit and Tacit Knowledge Sharing

Since explicit knowledge is easier to understand without the explanations and guidance of the knowledge holder, seeking, transferring, and adopting explicit knowledge do not require cognition-based trust in the knowledge holder or the knowledge recipient, as discussed earlier. Hence, *ganqing* and *jiaoqing* are expected to increase Chinese employees' propensities to seek, transfer, and adopt explicit knowledge because both feelings promote social exchanges and ties among Chinese employees. *Ganqing* and *jiaoqing* are even more critical to tacit knowledge sharing, which requires shared experience developed through close and frequent interaction and cooperation between the knowledge seeker and the knowledge holder. Coupled with cognition-based trust, either *ganqing* or *jiaoqing* is expected to exert positive influence on tacit knowledge seeking, transfer, and adoption among Chinese employees.

H9. *Ganqing* is positively related to Chinese employees' propensities to seek, transfer, and adopt explicit knowledge.

H10. *Jiaoqing* is positively related to Chinese employees' propensities to seek, transfer, and adopt explicit knowledge.

H11. *Ganqing* and cognition-based trust jointly influence Chinese employees' propensity to seek, transfer, and adopt tacit knowledge in a positive way.

H12. *Jiaoqing* and cognition-based trust jointly influence Chinese employees' propensity to seek, transfer, and adopt tacit knowledge in a positive way.

Discussion

Theoretical Implications

This article examines the potential differential effects of two types of trust (affect- and cognition-based trust) and two types of feelings (*ganqing* and *jiaoqing*) on Chinese employees' propensities to seek, transfer, and adopt explicit and tacit knowledge. The analysis suggests that affect-based trust influences Chinese employees' willingness to offer the knowledge requested by others, whereas cognition-based trust is the primary consideration when Chinese employees decide whether to seek knowledge assistance from others or adopt the knowledge help they receive from others. The different roles each type of trust

plays reflect not only Chinese traditional emphasis on affect-based trust, but also the growing importance of cognition-based trust in business relationships in contemporary China (Chua, 2012). The important role of cognition-based trust in knowledge seeking and adoption also helps explain why previous research using Chinese subjects did not find any effect of cognition-based trust on knowledge sharing measured as the act of offering knowledge (Huang et al., 2011). To the extent both types of trust affect different knowledge-sharing processes, future research may benefit from including knowledge seeking and adoption in assessing the effects of affect-based trust and cognition-based trust on knowledge sharing.

It is also argued in this article that affect-based trust and cognition-based trust are both needed for effective tacit knowledge sharing. This revelation is important in that most of the existing studies focused on the individual effects of the two trust types. In view of the dominant role of affect-based trust in Chinese social relationships and the contribution of cognition-based trust to tacit knowledge sharing, the potential joint effect between these forms of trust may be more salient among Chinese than Westerners and thus warrants empirical testing using Chinese samples in future studies. Besides affect-based trust, cognition-based trust may also work in conjunction with *ganqing* and *jiaoqing* in increasing Chinese employees' propensities to seek, transfer, and adopt tacit knowledge. Given that Chinese people tend to mix different types of trust and feelings in social interactions (Chua et al., 2009), the potential interactive effects among different types of trust and feelings represent interesting and important topics for future studies.

Even though *ganqing* and *jiaoqing* are influential in Chinese social relations and exchanges, their roles in knowledge sharing have not received sufficient attention in previous research on knowledge sharing among Chinese employees. As argued here, both feelings may be conducive to seeking, transferring, and adopting knowledge, and their effects may vary depending on the knowledge-sharing processes. In general, both feelings facilitate knowledge transfer, while *jiaoqing* may influence knowledge adoption as well. Moreover, it is proposed that both *ganqing* and *jiaoqing* would have direct effects on seeking, transferring, and adopting explicit knowledge and interactive effects (with cognition-based trust) on tacit knowledge seeking, transfer, and adoption. In view of these findings, it is worthwhile for future empirical research to measure *ganqing* and *jiaoqing* and to test their effects (direct and indirect) on Chinese employees' propensities to seek, transfer, and adopt explicit and tacit knowledge.

References

- Barney, J.B. (1991). "Firm resources and sustained competitive advantage," *Journal of Management*, 17 (1): 99–120.
- Chen, X.P. and Chen, C.C. (2004). "On the intricacies of the Chinese Guanxi: A process model of guanxi development," *Asia Pacific Journal of Management*, 21: 305–324.
- Chen, X.P. and Peng, S. (2008). "Guanxi dynamics: shifts in the closeness of ties between Chinese Coworkers," *Management and Organization Review*, 4(1): 63–80.
- Chowdhury, S. (2005). "The role of affect- and cognition-based trust in complex knowledge sharing," *Journal of Managerial Issues*, 17(3): 310–326.
- Chua, R. Y.J. (2012). "Building effective business relationships in China," *Sloan Management Review*, 53(4): 27–33.
- Chua, R.Y.J., Morris, M.W., and Ingram, P. (2009). "Guanxi vs networking: distinctive configurations of affect- and cognition-based trust in the networks of Chinese vs. American managers," *Journal of International Business Studies*, 40: 490–508.

Managerial Implications

This article may also point the way for Western firms and their managers on how to increase knowledge sharing among Chinese employees. As noted, Chinese people are often reluctant to share information and knowledge with others in the workplace (Hutchings & Michailova, 2006; Liu & Porter, 2010). With an understanding of the potential impacts of trust and feelings on knowledge sharing, companies operating in China can take several measures to nurture trust and feelings among their Chinese employees and utilize the trust and feelings engendered to promote knowledge sharing. For instance, companies can organize more after-work social activities (e.g., dining and traveling together) to foster the development and accumulation of emotional feeling and affection between employees. Assigning employees to team-based tasks or to jobs at different departments or locations can also help connect employees with more colleagues and build emotional and instrumental bonds with them. When transferring tacit knowledge between departments, managers may consider selecting from both departments employees who have close ties or frequent interactions with their counterparts in the other department and having the employees work together on the knowledge transfer, so as to utilize any affect- and cognition-based trust existing between them.

To facilitate an employee's appraisals of other coworkers' ability and competence, companies need to provide organizational tools and channels whereby the employee can easily and quickly locate information about the professional profile, credentials, and expertise of a coworker. With the aid of Internet technology, a variety of online tools, such as knowledge portal, intranets, communities of practice and micro blogs, can assist employees in locating experts in different tasks or evaluating the task knowledge of coworkers.

Limitations

Although the key arguments advanced in this article are developed from a careful review and synthesis of the related literature, they need to be validated through empirical testing before more confidence can be placed on them. Nevertheless, the analysis and hypotheses presented here contribute to a more holistic conceptualization of the roles different types of trust and feelings play in knowledge sharing among Chinese in the workplace. As another limitation, the article does not analyze the potential interactive effects between *ganqing* and *jiaoqing*. Since many job-related relationships among Chinese employees involve both *ganqing* and *jiaoqing* (Chen & Peng, 2008), it would be interesting to investigate how these two feelings are intertwined and what impact their interaction may have on knowledge sharing.

- Chua, R.Y.J., Ingram, P., and Morris, M.W. (2008). "From the head and the heart: locating cognition-and affect-based trust in managers' professional networks," *Academy of Management Journal*, 51(3): 436–452.
- Colquitt, J.A. and Rodell, J.B. (2011). "Justice, trust, and trustworthiness: A longitudinal analysis integrating three theoretical perspectives," *Academy of Management Journal*, 54(6): 1183–1206.
- Darroch, J. (2005). "Knowledge management, innovation and firm performance," *Journal of Knowledge Management*, 9(3): 101–115.
- Du plessis, M. (2007). "The role of knowledge management in innovation," *Journal of Knowledge Management*, 11(4): 20–29.
- Ensign, P.C. (2009). *Knowledge Sharing among Scientists: Why Reputation Matters for R&D in Multinational Firms*. New York: Palgrave Macmillan.
- Glisby, M. and Holden, N. (2003). "Contextual constraints in knowledge management theory: The cultural embeddedness of Nonaka's knowledge-creating company," *Knowledge and Process Management*, 10(1): 29–36.
- Hampden-Turner, C. and Trompenaars, F. (1997). *Mastering the Infinite Game: How East Asian Values Are Transforming Business Practices*. Oxford, England: Capstone Publishing Ltd.
- Hansen, M.T. (1999). "The search-transfer problem: the role of weak ties in sharing knowledge across organizational subunits," *Administrative Science Quarterly*, 44: 82–111.
- Holmes, J.G. and Rempel, J.K. (1989). "Trust in close relationships" in *Close Relationships*, C. Hendrick ed. (187–220). Newbury Park: Sage.
- Holste, J.S. and Fields, D. (2010). "Trust and tacit knowledge sharing and use," *Journal of Knowledge Management*, 14(1): 128–140.
- Huang, Q., Davison, R.M., and Gu, J. (2011). "The impact of trust, guanxi orientation and face on the intention of Chinese employees and managers to engage in peer-to-peer tacit and explicit knowledge sharing," *Information Systems Journal*, 21: 557–577.
- Huang, Q., Davison, R.M., and Gu, J. (2008). "Impact of personal and cultural factors on knowledge sharing in China," *Asia Pacific Journal of Management*, 25: 451–471.
- Husted, K. and Michailova, J. (2002). "Diagnosing and fighting knowledge-sharing hostility," *Organizational Dynamics*, 31(1): 60–73.
- Hutchings, K. and Michailova, S. (2006). "The impact of group membership on knowledge sharing in Russia and China," *International Journal of Emerging Markets*, 1(1), 21–34.
- Hwang, K.K. (1987). "Face and favor: The Chinese power game," *American Journal of Sociology*, 92: 944–974.
- Jiang, X. and Li, Y. (2008). "An empirical investigation of knowledge management and innovation performance: The case of alliances," *Research Policy*, 38(2): 358–368.
- Kim, Y.J., Song, S., Sambamurthy, V., and Lee, Y.L. (2012). "Entrepreneurship, knowledge integration capability, and firm performance: An empirical study," *Information Systems Frontiers*, 14(5): 1047–1060.
- Kriz, A and Keating, B. (2010). "Business relationships in China: lessons about deep trust," *Asia Pacific Business Review*, 16(3): 299–318.
- Lee, H. and Choi, B. (2003). "Knowledge management enablers, processes, and organizational performance: an integrative view and empirical examination," *Journal of Management Information Systems*, 20(1): 179–228.
- Leonard, D. and Sensiper, S. (1998). "The role of tacit knowledge in group innovation," *California Management Review*, 40(3): 112–132.
- Levin, D.Z. and Cross, R. (2004). "The strength of weak ties you can trust: The mediating role of trust in effective knowledge transfer," *Management Science*, 50(11): 1477–1490.
- Lewis, J.D. and Weigert, A. (1985). "Trust as a social reality," *Social Forces*, 63: 967–985.
- Liu, E. and Porter, T. (2010). "Culture and KM in China," *Journal of Information and Knowledge Management Systems*, 40(3/4): 326–333.
- Lucas, L. (2005). "The impact of trust and reputation on the transfer of best practices," *Journal of Knowledge Management*, 9(4): 87–101.
- Mayer, R.C., Davis, J.H., and Schoorman, F.D. (1995). "An integrative model of organizational trust," *Academy of Management Review*, 20(3): 709–734.
- McAllister, D.J. (1995). "Affect- and cognition-based trust as foundations for interpersonal cooperation in organizations," *Academy of Management Journal*, 38(1): 24–59.
- Ng, K.Y. and Chua, R.Y.J. (2006). "Do I contribute more when I trust more? Differential effects of cognition- and affect-based trust," *Management and Organization Review*, 2(1): 43–66.
- Nonaka, I. (1994). "A dynamic theory of organizational knowledge creation," *Organization Science*, 5(1): 14–37.
- Nonaka, I. and Konno, N. (1998). "The concept of 'ba': building a foundation for knowledge creation," *California Management Review*, 40: 40–54.
- Palacios, D., Gil, I., and Garrigos, F. (2009). "The impact of knowledge management on innovation and entrepreneurship in the biotechnology and telecommunications industry," *Small Business Economics*, 32: 291–301.

- Polanyi, M. (1967). *The Tacit Dimension*. Garden City, NY: Anchor.
- Simonin, B. (1999). "Ambiguity and the process of knowledge transfer in strategic alliances," *Strategic Management Journal*, 20: 595–623.
- Stenmark, D. (2002). "Sharing Tacit Knowledge: A Case Study at Volvo" in *Knowledge Management Systems: Theory and Practice*, S. Barnes, ed. London: Thomson Learning.
- Szulanski, G. (1996). "Exploring internal stickiness: impediments to the transfer of best practice within the firm," *Strategic Management Journal*, 17: 27–43.
- Tan, H.H. and Chee, D. (2005). "Understanding interpersonal trust in a Confucian-influenced society: an exploratory study," *International Journal of Cross Cultural Management*, 5(2): 197–212.
- Tong, J. and Mitra, A. (2009). "Chinese cultural influences on knowledge management practice," *Journal of Knowledge Management*, 13(2): 49–62.
- Tsui, A.S. and Farh, J.L. (1997). "Where guanxi matters: relational demography and guanxi in the Chinese context," *Work and Occupations*, 24(1): 56–79.
- Wang, H.K., Tseng, J.F., and Yen, Y.F. (2012). "Examining the mechanisms linking guanxi, norms and knowledge sharing: the mediating roles of trust in Taiwan's high-tech firms," *International Journal of Human Resource Management*, 23(19): 4048–4068.
- Yang, C.F. (2001a). "A critical review of the conceptualization of guanxi and renqing" in *The Interpersonal Relationship, Affection, and Trust of the Chinese: From an Interactional Perspective*, C.F. Yang ed. (3-26). Taipei: Yuan Liou Publishing Co. (in Chinese).
- Yang, C.F. (2001b). "A reconceptualization of the Chinese guanxi and renqing" in *The Interpersonal relationship, Affection, and Trust of the Chinese: from an Interactional Perspective*, C.F. Yang ed. (337-370). Taipei: Yuan Liou Publishing Co. (in Chinese).
- Yang, M.M. (1994). *Gifts, Favors and Banquets: The Art of Social Relationships in China*. Ithaca, NY: Cornell University Press, pp. 109–145.
- Zack, M., Mckeen, J., and Singh, S. (2009). "Knowledge management and organizational performance: an exploratory analysis," *Journal of Knowledge Management*, 13(6): 392-409.
- Zhou, S., Siu, F., and Wang, M. (2010). "Effects of social tie content on knowledge transfer," *Journal of Knowledge Management*, 14(3): 449–463.

About the Author



MICHAEL JIJIN ZHANG (zhangm@sacredheart.edu) is an associate professor of management in the Welch College of Business at Sacred Heart University. His current research focuses on international knowledge management, information systems support for top executives, and business simulation games. Dr. Zhang has published in such academic journals as *Journal of Management*, *International Journal of Knowledge Management*, *Journal of Engineering and Technology Management*, and *Journal of Managerial Issues*.