Knowledge Sharing and Affective Commitment: Mediating Role of Trust Between Knowledge Sender and Receiver

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Abstract

The main determination of current study is to explore antecedents of knowledge sharing. Hence; affective commitment is an antecedent which shows how knowledge can be shared among the knowledge participants by using employee's emotional attachment and recognition with the organization. Similarly, mediating role of trust was checked between employee's knowledge sharing attitude and affective commitment. Data was collected from hi-tech information technology (IT) industry from Pakistan with a sample of 143 as valid responses. Regression, correlation, factor loading and path coefficients were used to check the reliability, validity, and model fit of research framework. The findings suggested that employees' recognition and emotional attachment with organization is positively related to the knowledge sharing. In addition, the mediating role of trust between affective commitment and knowledge sharing is significant and positive.

Keywords: affective commitment, emotional attachment, employee's recognition, knowledge sharing, trust.

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1. Introduction

Knowledge sharing (KS) is recognized as a significant method for various organizations in order to develop skills and expertise to be competitive (N.-C. Liu & Liu, 2011; Ramirez & Li, 2009). Knowledge sharing has been considered as a pre-condition for improvement and entrepreneurial ventures such as ideas, thoughts, and concepts that rely on efficient sharing of KS among different employees and hence organizational top management is to transform and apply efforts for having new, unique, and innovated products and services (Nonaka, Von Krogh, & Voelpel, 2006). On the other hand, KS can induce conflicts of interest among employees and employers because concept and thoughts differ from individual to individual (Y. Liu & DeFrank, 2013; Nonaka, et al., 2006). Hence, organizations are mostly in search of unique tools and systems that can overcome individual, group, and organizational barriers to enable workforce in sharing knowledge efficiently and effectively. In addition, innovation performance can be improved once a positive system is adopted among employees (Schwaer, Biemann, & Voelpel, 2012).

It is evident from numerous studies organizational culture can improve and enhance affectivity the organizational KS i.e. Centralized and functional structure as well as hierarchy of organization (Nonaka & Takeuchi, 1996; Pierce, 2012) and effect of it's climate and culture i.e. culture of organization tilted toward individual competition and innovation (Argote & Ingram, 2000; Bock, Zmud, Kim, & Lee, 2005). In addition there is lot of perception and motivation of KS because of rewards, personality, justice, and trust (Gagné, 2009; Ibragimova, 2006; Matzler, Renzl, Mooradian, von Krogh, & Mueller, 2011; Schwaer, et al., 2012).

Researchers have explored that KS and affective commitment (AC) are significantly associated with each other (Camelo-Ordaz, Garcia-Cruz, Sousa-Ginel, & Valle-Cabrera, 2011; Hislop, 2003). Similarly, they also found that once individuals are able to develop a positive emotion and gestures for an organization, then, KS can develop and nurture as it demands significant internal motivation (Becker & Kernan, 2003; Meyer, Stanley, Herscovitch, & Topolnytsky, 2002). Instead of the growing literature, there are a few researches that highlighted impact of individual cognition, behavior, and motivation in this relationship(Han, Chiang, & Chang, 2010). For instance, (Naeem, Mirza, Ayyub, & Lodhi, 2019) found that trust and AC both mediate the effect of HRM practices on KS.

However, the significance of AC on KS has been expressed in the previous studies. Dey & Mukhopadhyay (2018) found that there is no impact of trust on AC and KS. Li, Yuan, Ning, & Li-Ying (2015) found that psychological ownership mediates the correlation between KS and AC. It is likely that whenever affectively committed employees trust each other, they are more likely to share information.

The current study is an attempt to check the mediating role of trust of knowledge senders and receivers on the association between KS and AC. We will apply a logic based conceptual model that associates various variables used in the current study like "AC" (how we feel), "KS" (what we do), and "mediating role of trust" (how we evaluate). According to the hierarchy of affects model (Hansen, 2005), emotions and perceptions lead to attitude which in turn shape the behaviors of individuals. As trust is an attitude among individuals that leads them towards information sharing. Because, KS is an individual action and it needs communication with many persons that needs to be considered in the form of group. Therefore, it is mandatory to add this minor level concept towards major level phenomena in order to improve organization effectiveness(Felin & Barney, 2013).

However, the relationship of KS and effective commitment might be more complex than the past studies. Similarly, significant impact of AC can be checked by other variables among KS individuals. The current study focuses on the trust as the mediator in relationship between KS and AC. Researchers believe in KS to be a social dealing among the individuals, groups, and organizational members (Reagans & McEvily, 2003). Hence, it is very critical for the organization to consider the minds, ideas, thoughts, and workforce behavior while considering the impact of KS that need a similar culture of supporting routine work activities. In addition, (Bartol & Srivastava, 2002) explained that main purpose of KS that is focused on organizations' critical need and it ensures that organizational system must support strategy and tactics to build trust by focusing on fundamental virtues instead of values.

2. Theoretical framework and hypotheses development
Theory of planned behavior studies individual or group behavior and belief towards an action. The theory states that "attitude toward behavior, subjective norms, and perceived behavioral control, together shape an

individual's behavioral intentions and behaviors" and hence, aforementioned theory is smeared in this study. The theory assumes that actions are the behavioral intention of the individual's and it was suggested that KS between knowledge sender and receiver and AC is always on the motives of the some beliefs and thought. Moreover, it was also assumed based on planned action theory that if people evaluate the suggested behavior as positive (attitude), and if they think their significant others want them to perform the behavior (subjective norm), this results in a higher intention (motivations) and they are more likely to do so. The theory of planned behavior provides the solid justification in the relationship between KS and AC, as these are social norms and dealt with attitude and behavior (Ajzen,1991).

2.1 Affective commitment and knowledge sharing

Knowledge sharing is not an easy and a simple construct (Sitlington, 2012; Yen, Tseng, & Wang, 2014). Similarly, many researchers differentiated between KS (communicate with peers and others with colleagues about their intellectual capital) and collection of knowledge (consulting colleagues and co-workers for sharing of knowledge and intellectual capital). Similarly, AC has significant impact on KS and knowledge collection. On the contrary, numerous researchers also probe out the knowledge differently and stated that KS is slightly complex and important for firms in order to ascertain a basic foundation with implicit knowledge (Augier, Shariq, & Thanning Vendelø, 2001; Hu & Randel, 2014; Swift & Virick, 2013).

According to the past literature available on this field, scholars found that human beings are always reluctant to learn and share a new and unique idea that may be associated with the core values and interests of their workplace while on other the hand they are intended to share knowledge where there personal interest is not concerned (Archer, 2000). Additionally, KS is divided into two types such as common and key KS (Ipe, 2003). Key KS involves coded knowledge and common KS includes implicit knowledge; both holding a positive relationship. Current paradigms of organization KS tend to focus at information technology that facilitate technologies as well provide the individuals with convenient workplace environment. Similarly, less attention was to be given in connecting the firm's knowledge management with human resource management (Han et al., 2010). It is also suggested that organizational

culture and effective regulatory system are useful in increasing individual's emotional responsibility and attachment in organization (Cushen & Thompson, 2012). AC is defined as "emotional attachment to, identification with, and involvement in the organization" (Allen & Meyer, 1990). It is because; sense of having an ownership in firm and AC may encourage KS attitudes and behaviors among groups and organization as a whole. Furthermore, common knowledge routine sharing would direct to a great probability of KS (Nonaka, et al., 2006). Similarly, planed behavior theory states that (Ajzen, 1991) attitudes lead to behavior. Hence it can be argued that AC with organization makes a person share knowledge with his colleagues. Matzler, Renzl, Mooradian, von Krogh, and Mueller (2011) proved that AC influences the KS. It is hereby hypothesized that:

H1: Affective commitment has a positive impact on knowledge sharing.

2.2 Affective commitment and trust

Trust plays more significant role in social and moral transaction as compared to economic transaction (Bartol & Srivastava, 2002; O'Donohue, Sheehan, Hecker, & Holland, 2007). (McAllister, 1995) defined interpersonal trust as "the extent to which a person is confident and willing to act on the basis of the words, actions, and decisions of another". He also explained two dimensions of interpersonal trust. First is cognition-based trust that associates with available knowledge, responsibility, and competence of individuals. The second dimension is affect based trust which is based on sensitive bonds amongst the personages comprising of care expression and concern and beliefs in inherent values and relations (McAllister, 1995).

AC is considered to be an organizational commitment and it reveals a significant aspect of motivation level, emotional attachment, and recognition of employees working in an organization (Allen & Meyer, 1990). By definition AC and trust are based on the emotional evaluation of organization and individuals respectively. Furthermore, (Dey & Mukhopadhyay, 2018) have hypothesized the impact of trust on commitment, which was not found positive. Whereas, Nyhan (1999) claimed that AC is strongly correlated to trust. However, the theory of planed behavior explained this phenomenon that an attitude leads to another attitude (Ajzen, 1991). Based on the theory we have hypothesized that:

H2. Affective commitment is positively related to trust.

2.3 Mediating role of trust

Affective trust is much pertinent to voluntary KS as compared to competence-based trust due to many factors involved in it such as affect-based trust minimizes the feeling of vulnerability (De Cremer, Snyder, & Dewitte, 2001; Swart & Harvey, 2011). Similarly, other researchers like (Bijlsma & Koopman, 2003; Madjar & Ortiz-Walters, 2009) further emphasized the significance of affect-based trust that it eliminates the attached fear of other party as an opportunistic or exploitative. Additionally, various studies have reported significant relationship between KS and trust (Swart & Harvey, 2011). If in an organization, there is cooperative workplace environment and they regard of each other, then evaluating the individuals on economic perspective would be less and its social perspective would be more so in this scenario, KS would be more among the senders and receivers (Swart & Harvey, 2011). Hence, like AC, trust and KS is controlled by positive emotions (Swart & Harvey, 2011).Hansen (2005) claimed that according to the hierarchy of affects model, affection and perception makes an attitude (trust) which further shape the behavior. Hence, it can be hypothesized that:

H3: Trust plays a mediating role between affective commitment and KS.

2.4 Knowledge sharing and trust

An organization must produce a desire to share role of trust in knowledge sharing participants for organizational survival. However, for doing this, the trust issue is still to be resolved(Riege, 2005), and this is perhaps most critical success factor for having trust culture in sharing of knowledge. It seems that lack of trust in KS originated either from knowledge sender or knowledge receivers i.e. knowledge participants (Riege, 2005). Similarly, lack of trust prevails in two independent forms. The first form of lack of trust is at the receiving end due to misuse of knowledge or getting unfair recognition for sharing of knowledge and the second form is credibility and accuracy of knowledge that arises from knowledge senders. Hence, encouragement and value of KS for the organization require creation and development of trust culture (Abdinnour-Helm, Lengnick-Hall, & Lengnick-Hall, 2003). Moreover, workforce is more willing to share how much they are familiar within an ambit of trusting culture (Bender & Fish, 2000; Settoon & Mossholder, 2002). As projected, trust culture in workplace has a robust and strong influence as it is a vital force in KS. Similarly, Hsu and Huang (2005) recommended that trust must be

established between individual-to-individual interactions in nurturing a culture that share and ultimately move into a 'knowledge-oriented culture'. Trust always facilitates sharing of knowledge as the voluntary KS is more effective and efficient and hence it is termed as a social transaction (Martín-de Castro et al., 2011; Soliman & Spooner, 2000). In any organization Interpersonal trust plays a significant role in KS culture. (Soliman & Spooner, 2000).In the same vein, the theory of planed behavior suggested that there is a significant relationship between attitude and behavior. It is hereby hypothesized that:

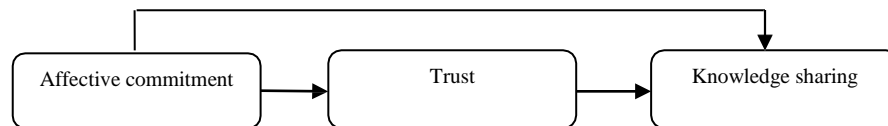**H4:** Trust between workers at workplace has positive impact on knowledge sharing.

Figure: Research framework

3. Research methodology

3.1 Sample and procedures

In high-tech organizations, culture of knowledge sharing is very important for short term opportunity and long-term business sustainability, hence: the current study is focused on high-tech organizations. A high-tech organization has highly technology-oriented environment so the current study was conducted on the IT industry that employs several employees across Pakistan. Therefore, the employees of the IT organizations are highly skilled in their fields and their top management attempts to try specific environment that is fit for knowledge transfer, exchange, and sharing. In addition, (Pavković, Štorga, Bojčetić, & Marjanović, 2013) stated that important industries that must be managed properly with respect of knowledge is the IT industry because creation and design of IT equipment's have evolved special concerns like traceability, complexity, maturity of knowledge, awareness of the status of information, interaction between experts, and trust in KS. Hence, by viewing of these observations, by assisting KS is very critical due to the continuing pressure to boost effectiveness and efficiency.

Data was collected from them in order to check the relationship among AC and KS and mediating role of trust between knowledge senders and

receivers. A standard questionnaire was forwarded to 550 employees through drop box and electronic mail. Similarly, confidentiality and anonymity were guaranteed. Employees were well explained before receiving the email about the scope of research by the research team and purpose of the attached questionnaire. Similarly, employees were also briefed about the questions dropped in box near the central point of a building.

3.2 Measures

Cronbach's alpha of affective commitment was 0.84 and its three items scale was adapted from Mayer and Allen (1991). Mayer and Allen proposed three factor models to quantify the organizational commitment and due to its frequent use as AC, its validity is guaranteed. All of the items of AC were measured on five-point Likert scale and the score value ranges from strongly disagree to strongly agree. Similarly, low score reflects low level of commitment and high score shows high level of AC score. Similarly, average variance extracted statistics (AVE) and composite reliability index (CR) for AC construct were 0.59 and 0.82 respectively. All of these values are stated in table 1.

Cronbach's alpha of trust between knowledge sender and receivers was 0.67 and its three items scale was adapted by (Cook & Wall, 1980). The scholar defines trust as "the extent to which a person is confident and willing to act on the basis of the words, actions and decisions of another". Likewise, five-point Likert scales were used to measure trust level among knowledge participants from strongly agree to strongly disagree. Low scores reflect low level of trust and vice versa. The CR index and AVE statistics for trust were 0.9 and 0.6 respectively. All of these values are listed in table 1.

Cronbach's alpha of KS was 0.85 by adapting eight items from (van den Hooff & De Ridder, 2004) who segregated knowledge sending and receiving. However, the researcher classified KS into two scales namely common KS and key common KS. In addition, five-point Likert scale was used to score items at strongly disagree to strongly agree and low and high score reflects low and high level of KS. The CR and AVE for KS construct was 0.82 and 0.75 respectively. All of these values are explained in table 1.

4. Results

The current study used mean, standard deviation, correlation, and mediation that were applied to verify the   research framework. Demographic variables used are gender, qualification level, and job experience and structure equation model (SEM) was used to measure path analysis. Similarly, simple regression method was used to check the existence of relationship between KS and AC and the   extent of relationship was measured by correlation. The value of Cronbach's alpha of the constructs showed that items are highly reliable and valid as shown in table 1.
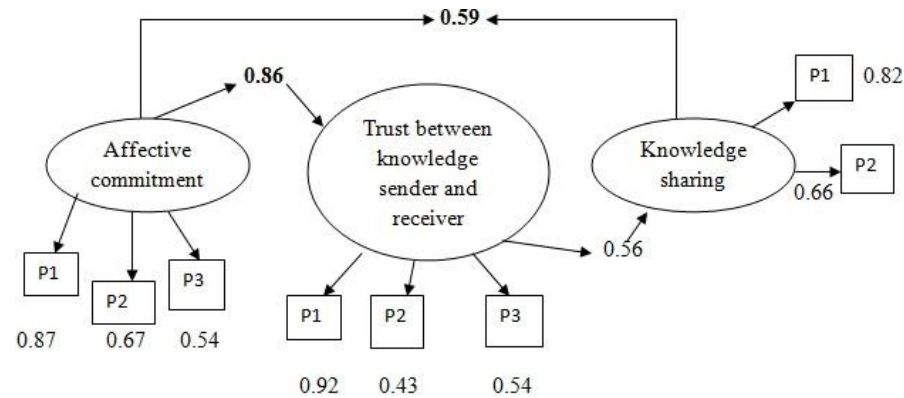
Table 1

Variable	Mean	S. D	Cranach's	CR	AVR
Affective commitment**	4.76	1.14	0.84	0.82	0.59
Knowledge sharing**	3.97	1.10	0.85	0.82	0.75
Trust**	5.64	0.82	0.67	0.90	0.60
C.R (Composite reliability); AVE (Average variance extracted)					

**Cronbach's alpha test was carried at P<0.05

4.1 Hypotheses testing and Structure equation modeling(SEM)

Structural equation modeling (SEM) was used to check the fitness of model as mentioned in table 2. The ratio of X^2 to degree of freedom were 1.90 for the structured model. Similarly, other values like GFI; 0.84, CFI; 0.74, NNFI; 0.84, and RMESA; 0.054 proved the fitness of model. Hence, the current study might be proceeded to check path coefficients of the structured model. All of the hypotheses were supported from data and R square also showed significance of predictor variable. The structure equation model parameters were being shown in table 2 and table 3.
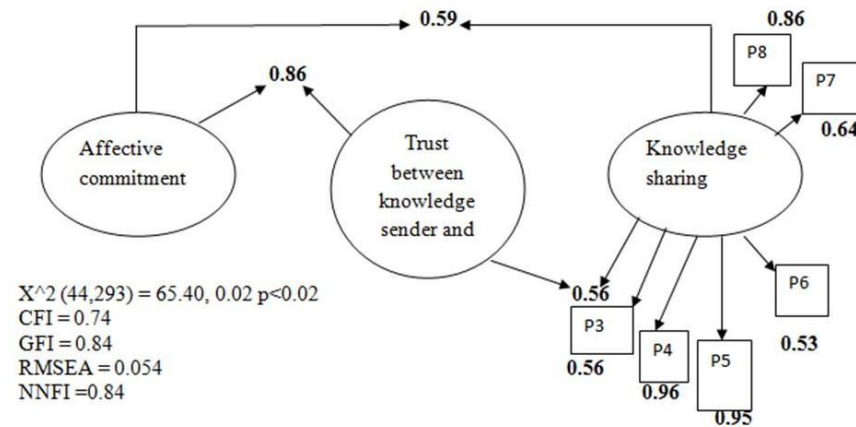
Table 2

X^2 (44,293) = 65.40, p<0.02
CFI = 0.74
GFI = 0.84
RMSEA = 0.054
NNFI=0.84
Due to space constraint, all the items could not be included so factor loading of a few were taken.

Figure: Structure equation model (SEM)

Table 3

X^2 (44,293) = 65.40, 0.02 p<0.02
CFI = 0.74
GFI = 0.84
RMSEA = 0.054
NNFI =0.84

Figure: Structure Equation Modeling (SEM)

5. Discussion and Conclusion

This research study was aimed to examine the relationship of AC on knowledge sharing. Further the study was also opted to investigate the mediating role of trust in this relationship. The structure equation modeling (SEM) results supported the facts that AC was an antecedent of KS. H1 was supported. Also, this finding is similar to the previous studies for example (Matzler, Renzl, Mooradian, von Krogh & Mueller, 2011). This confirms the information processing perspective of consumer decision making which is for example, theoretical relationship between emotions and behavior in our particular culture. In the same way, AC was found to be positively related to the trust which confirms H2. It strengthens the previous evidence like Nyhan (1999) found a strong correlation between AC and interpersonal trust. H3 was about the mediation of trust between the relationship of AC and KS. This provides a theoretical contribution. Drawing on the hierarchy of affect model as suggested by Hansen (2005) the affection and perceptions lead to attitude which further leads to behavior. H4 showed a positive relationship between trust and KS. This result confirms previous findings for example (Martín-de Castro, et al., 2011; Soliman & Spooner, 2000).

Based on the given discussion it is concluded that employees with an AC with the organization share more knowledge among each other. This relationship is proved to be mediated by trust. In other words, it is the trust that makes individuals willing to share the knowledge they have. It means that the managers should create an environment of overall trust among their people. If the committed employees observe an interpersonal trust in organization, they will share more knowledge which is of great benefit for any organization. Managers could enhance trust among employees by the justice and equality, empowering them, managing training sessions on business ethics. Whenever the employees acknowledge that their rights are secured, they feel a trust in co-workers.

5.1 Theoretical and practical implications of the findings

The current study adds to a body of knowledge in existing literature of knowledge management. As the constructs and concepts that are being used in current study might not be the innovative and unique however, they emphasize on the importance of AC in getting behavior of KS in

organizations. Moreover, the KS behavior was viewed as a social exchange and social relationship model (Reus & Liu, 2004).

Despite of numerous studies on knowledge management, there are fewer studies on KS with mediating effect of trust due to less attention it received from theorists and practitioners relevant to organizational practices (Cabrera & Cabrera, 2002). The current study has filled the literature gap among the AC, trust, and KS. Moreover, this study will contribute significantly to KS literature as it operationalizes the perceived trust level that knowledge senders can have on knowledge receivers. Similarly, knowledge economy has become a reality on practical front and only sharing of knowledge and collaborative effort can accomplish the knowledge economy (Reus & Liu, 2004). In addition, not only the ownership of knowledge, but also on the ability to disseminate assets of knowledge by supporting KS can be very advantageous (Reus & Liu, 2004).

5.2 Future recommendation and Limitation

The current study's finding provides a foundation that associates attitude, behavior and cognition of KS. The findings of current study are very significant for academicians, practitioners, and HR managers. Top management should provide social and collaborative platform for KS in organization and feelings of employees should be honored and respected. There must be effective teams and groups who can initiate learning and sharing of knowledge for those peers and colleagues who are very weak in organizational processes and technology. There should be technical knowledge in documented form and employees schedule are to be set out to learn and share with others. Similarly, on-job training should be imparted with concerning to technical handouts. Top management should give a special incentive to the HR managers for imparting technical and core-interest related knowledge to the workforce (Whicker & Andrews, 2004).

In addition, employee's emotional attachment should be improved with the organizational structure by encouraging staff welfare, incentive-based salary system, and performance-based evaluation. By taking employee's skills in KS, their feedback in decision making also improves. Knowledge is an intellectual capital and should be shared among the entire workforce for better organizational outcomes.

Despite of all the efforts, the current study has some limitations as well. The selection of organization being the first limitation of study. As the current study was conducted on IT industry of two countries, so in future, the researchers can extend its scope to other hi-tech industries like aerospace, defense, and oil and gas sector in which high level of technologies are involved. The second limitation is of inclusion of more variables as predictor like effect of culture in KS participants. Similarly, in the current study trust was taken as a mediator, however, it can be taken as a moderator between AC and KS. Future researchers are advised to check the impact of trust among other individual variables (motivation, skills, attitude, values, expectations, perceptions etc.) and KS. Future researchers are also recommended to select comprehensive market surveys to collect more valid responses as it was one of our constraints in this study that we could only include 26% of responses in data analyses.

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