

Determinants of Innovation Capability in the Islamic Banking

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ABSTRACT

Purpose Knowledge is fundamental that is able to make the company succeed and survive in different conditions. The focus of this study to test and analyze the role of tacit knowledge in innovation capability in sharia banking. Another factor that is capable of being very important that the existence of social capital that are determinants of tacit knowledge sharing that leads to innovation capability in Islamic banking

Design / methodology / approach This study begins with an overview of the literature related to the field of tacit knowledge sharing, knowledge quality, social capital and innovation capability, then made a hypothesis that was developed based on the model that has been created. Then validated through a survey on 210 respondents. Mechanical analysis using statistical test equipment SEM-PLS

Finding The third variable that tacit knowledge, social capital and knowledge quality has a significant influence on innovation capability, these findings differ from previous findings. In this study, knowledge quality directly influence a positive and significant impact on innovation capability.

The practical implications organization that exists today has a very tight competition that is necessary to an understanding of innovation capability. The success obtained from the application of innovation capability is expected to be applied to other organizations that are just starting out or

even walking. The application of knowledge management in addition to explicitly also expected to use the tacit knowledge, because tacit knowledge in research has been able to become a moderator of the innovation capability of variables.

Originality / value Many studies or literature that has been discussed about knowledge management in various sectors, but there is little research linking knowledge management (tacit knowledge) to the innovation capability in Islamic banking.

Discussion This study focused on the role of tacit knowledge sharing on innovation capability, which is supported by other factors such as social capital.

Keywords: innovation capability, quality knowledge, tacit knowledge sharing, social capital.

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INTRODUCTION

Bank BNI Sharia in Indonesia, as one Islamic Banking experienced a significant development, the confidence of stakeholders on the performance of BNI Sharia evidenced by the 57 awards obtained by Bank BNI Syariah throughout 2018 which include three awards International, namely Alpha Southeast Asia Award 2018 for the Best Commercial Bank in Indonesia (category Islamic Bank). Islamic Business & Finance Award 2018 for best commercial bank category Bank Syariah Book 2, and The Best Sharia in Asia and Turkey in 2018, the best Global Leader in Asia and Turkey in 2018 of the magazine Economic Review and many other awards. Bank BNI Syariah products that pioneered Sharia products in Indonesia and become an important milestone in the Islamic banking industry. The rapid development and success of Bank BNI Syariah as supported by the presence of the human resources that have sufficient knowledge to bring innovation capability.

Innovation capability is one of the tools that exist in an organization that serves to survival in an uncertainty which is usually more influenced or taken from the external environment (Johnson et al., 1997, Hussein et al., 2016), so that according to Rogers, 2003 and Zaltman et al., 1973) is considered as an idea, practice or a commodity that is considered new by a particular unit. Innovation is a central capability that can improve business performance, organizational survival, growth and competitive advantage (Calantone et al., 2002, Coad and Rao, 2008). Innovation capability within an organization can be expressed as the knowledge and competency that is required to create a

product or a new technology, and to improve something that is already there (Romijn and Albaladejo, 2002). According Kamasak and Bulutlar, 2010, in his research states that the role of knowledge management in innovation, points to the fact that the process of innovation, the organization continues to make improvements, which could not only lead to use a resource just for today, but also in bringing something new, intangible assets for the company. On the other hand, it has been observed that there is a direct correlation between innovation capability and superior business performance, which will ultimately lead to a competitive advantage. which not only can cause a resource to use it for now, but also in bringing something new, intangible assets for the company. On the other hand, it has been observed that there is a direct correlation between innovation capability and superior business performance, which will ultimately lead to a competitive advantage. which not only can cause a resource to use it for now, but also in bringing something new, intangible assets for the company. On the other hand, it has been observed that there is a direct correlation between innovation capability and superior business performance, which will ultimately lead to a competitive advantage.

Several previous studies mentioned that there are two (2) terms as a basis for knowledge sharing, the two issues play an important role in encouraging *innovation capability* (Podrug et al., 2017), it has also been conveyed by Nonaka (1994) classifies knowledge into two (2) that is explicit and tacit knowledge. Tacit knowledge is the root of all knowledge in the organization (Nonaka and Takeuchi,

1995), in this case applies in the case of innovation, a lot of knowledge related to the job by way of tacit, and therefore knowledge sharing in them makes it even more important to create a higher collective performance (Kaser and Miles, 2002). Given the importance of tacit knowledge in innovation capability, there is a need to determine the extent to which can be shared. The concept of tacit knowledge was first proposed by Polanyi (1962, 1967), it has proved to be an influential concept in the field of management, which is better known as tacit knowledge. Tacit knowledge can be regarded as an intuitive knowledge, it cannot articulate, cannot express in words or even non-verbally (Hau and Evangelista, 2007. P.1154) and mostly on existing experience and reflection on the individual's own more complex to be expressed (Nonaka, 1994). The emphasis on tacit knowledge towards innovation capability has a more dominant role in the appeal eksplisit knowledge.

Social capital act as a driving force to utilize the valuable resources that exist in the relational ties (Granovetter, 1992). Forms of social capital lies in the relationship between the individual and the interaction of the individual with the individual communities (Putnam, 1995b). According to Akhavan and Hosseini (2016) social capital has been emphasized as a major factor that is important to encourage innovation capability in an organization. In this case, the phenomenon of social has shifted from individualistic attributes to the relational approach (Borgatti and Li, 2009). This research thus compelled to examine social capital as a construct in the currently emerging which consists of relational, cognitive and structural. Several previous studies, there is no dearth of literature linking social capital,

Knowledge quality, Which is the acquisition of useful knowledge and innovative (Soo et al., 2004, p. 3), which can be referred to the extent to which a person is satisfied with the quality of knowledge (knowledge quality) and find it useful in resolving their activities (Ghobadi and D' Ambra, 2012), then by Soo et al (2004) states that knowledge quality can be measured by the frequency, usability and innovation, and can be innovative and new to the system in an organization. But if knowledge is not profitable to achieve the goal of development organizations or creating new innovation in the organization, it does not meet the criteria of quality knowledge (Soo et al., 2004). According to Waheed and Kaur, (2016), defines six dimensions of quality knowledge, namely their adaptability, innovation, deployment, upgrades, justifiability and authenticity. So these six dimensions, must bekeja in harmony to ensure quality knowledge than non-knowledge quality.

LITERATURE REVIEW AND HYPOTHESIS

Innovation capability

Innovation capability according to Drucker (1985) Is a new capability or an increase in the use of which has been determined. Innovation in this case related to products, processes, marketing and organization. Different types of innovation according to Schumpeter (1934), which consists of a new poduk, new production methods, new supply sources, the exploitation of new markets, and new ways to manage the business. Innovation capability is one of the

areas of interest that need to be studied by the researchers to explain or define, to categorize, and to investigate the impact of the performance. According Kuratko et al., 2005 to achieve a sustainable competitive advantage, the company was given a strategic orientation to solve the problems facing the company. McAdam and Keogh (2004) stated that the company believes that innovation is the most important factor to gain a sustainable competitive keunggulan. Geroski (2005) itself analyzed that the effects of innovations and things that are not can change at any size organization's performance in profitability accounting, market share and growth companies get the result that their direct effect is relatively small of innovation in the company's performance and the benefits of innovation possibilities indirectly. Innovation as one of the basic components that can be used to increase production of the productive process, to be able to compete in the market and to establish a good reputation in order to gain positive status within the customer's perception. Geroski (2005) itself analyzed that the effects of innovations and things that are not can change at any size organization's performance in profitability accounting, market share and growth companies get the result that their direct effect is relatively small of innovation in the company's performance and the benefits of innovation possibilities indirectly.

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Tacit knowledge sharing

Tacit knowledge sharinga concept first introduced by Michael Polanyi (Polanyi, 1962, 1967) who has brought the evidence became an influential concept in the field of

management, which is often referred to as tacit knowledge. Tacit knowledge sharing also called intuitive knowledge, not articulated, cannot be expressed with words or verbally (Hau and Evangelista, 2007, P. 1154) are largely based on the experience of a person or individual sole and reflection, which makes it becomes more complicated to be expressed and encoded (Nonaka, 1994; Hau and Evangelista 2007). Nonaka said that tacit knowledge is very context specific and has the personal qualities attached to it, thus making it very difficult to explain.

The process of creation starts with the creation of knowledge and a variety of tacit knowledge, which comes from socialization, facilitating interactive experience and capacity of the individual with their colleagues (Astorga-Vargas et al., 2017). Based on an idea - the idea of Polanyi (1962) deals with the ineffability tacit knowledge, Tsoukas (2005) argues that the conversion of tacit knowledge into explicit knowledge is rare but more how tacit knowledge can be discussed and shared via the social capital (Nonaka and Von Krogh, 2009)

Several previous studies have shown that knowledge sharing in this tacit knowledge is one of the antecedents is important that contributed to the success of innovation capability at the organizational level (Liao et al., 2007) that further knowledge sharing among karyawan, expected bisa increase resources knowledge available to the organization, which allows generating new ideas, so mampu affect the innovation capability of an organization

H1: *Tacit knowledge sharing* significantly affect *innovation capability* on Bank BNI Sharia employees in Java

Social capital

Social capital is a common discussion that began in the 1980s, but the discussions have not been described in detail on the definition. According to Bourdieu who explains that social capital as a collection of resources and potential within a particular network, which consists of a network of relationships involving air mutual interaction and mutual benefit (Bourdieu, 1980). According to Adler and Kwon said that the network of relationships that add value to network actors with access to resources that are embedded in the network (Adler et al., 2002). Social capital in the broad sense as a feature of social organization such as networks, norms, and social trust that facilitate coordination and cooperation of mutual benefit (Putnam, 1995, P. 67) which can be described as a set of mutually embedded resource with the same work in the social relations among social actors. Social capital according to Nahapiet and Ghoshal, 1998 there are three (3) consisting of: The first relational social capital are more concerned with the existing assets through ongoing relationships between social actors (Nahapiet and Ghoshal, 1998). The second is cognitive social capital which involves a general understanding among social elaku through code language, beliefs and narratives together (Van den Hooff and Huysman 2009).

Third structural social capital refers to the overall relationship (or relationships between social actors) Yang and Fam (2009)

According Nahapiet and Ghoshal, 1998 describes social capital as a relational embeddedness relations on the level of trust. The strength of social capital inherent in personal relationships (someone) that is close to the structure of social networks that lead to inividu and collective action (Coleman, 1988). In research Tsai and Ghoshal (1998) empirical study explains that trust as a relational dimension of social capital has a significant impact on the organization's resources.

H2: Social capital relational significantly affect *tacit knowledge sharing* on Bank BNI Sharia employees in Java

According Wasko and Faraj (2005) found *cognitive social capital* have a significant impact is to contribute to the sharing tacit knowledge, especially knowledge in coverage. Nonaka (1994) stated that the tacit knowledge sharing through the exchange mechanism involving socialization requires experience and understanding together.

H3: *Cognitive social capital* significant influence on the tacit knowledge sharing on Bank BNI Sharia employees in Java. Structural characteristics of social capital has a strong relationship with the creation of knowledge and tacit knowledge sharing within an organization (Borgatti and Cross, 2003). This is supported also by Reagan and McEvily (2003) who found that the results of structural social capital contributes to the effective transfer of knowledge between the actors in the network. The main component of tacit knowledge that is difficult to be distributed or transferred without social interaction (Kogut and Zander, 1996).

H4: Social capital structural significantly affect the tacit knowledge on Bank BNI Sharia employees in Java

Knowledge quality

Knowledge quality the acquisition of innovative and useful knowledge (Soo et al., 2004.p.3), so for quality knowledge can be measured by using frequency, usability and innovation, and to be innovative or new to the system or organization, but if knowledge unfavorable to achieving the goals of organizational development or create new innovations in the organization, it does not meet the criteria of quality knowledge (Soo et al., 2004). According to Waheed and Kaur (2016) identified six dimensions of quality knowledge which consists of adaptability, innovation, deployment, upgrades, justifiability and authenticity, and found these dimensions need to work in harmony to ensure quality knowledge than non-knowledge quality. On the other hand,

A higher level of quality knowledge helps a organisasi to become more productive, reduce costs and increase sales in the process (Yoo et al., 2011). According to Magnusson 2009 that innovative ideas come from the knowledge quality. The idea that quality has a strong foundation or large on the success of innovation capability.

H5: *Knowledge quality* significantly affect *innovation capability* on Bank BNI Sharia employees in Java

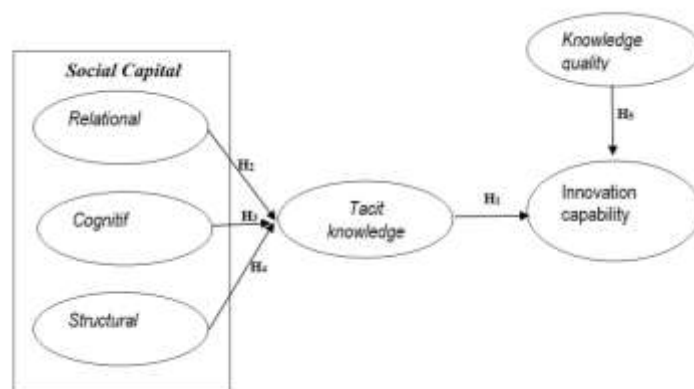


Figure 2.1: Framework research

METHODOLOGY

Sample and Data

This study starts from the deepening of the theory that will be used, based on a concept that has been in shape then do a hypothesis. The hypothesis has been there then validated through a questionnaire. Questionnaire distributed through a google form the 300 respondents from various divisions, and only returned in a perfect state a total of 210 respondents (108 men and 102 women) with an average age of 21-35 years old, have at least 5 years working experience. This study used questionnaire design concept of Churchill

(1979). All items indicator used is measured using a Likert scale (1-5) where the number 1 indicates strongly disagree and 5 indicates strongly agree. Variable innovation capability in this study using five indicators (Lin, 2007), tacit knowledge sharing in this study had a 5 indicators (Lin, 2007), Social capital-relational in this study using 4 indicators (Leana and Pil 2006), social capital-cognitive using three indicators (Leana and Pil, 2006), social capital-structure (Leana and Pil, 2006) and knowledge of quality using the 5 indicators (Chiu et al, 2006).

Table 1. Collinearity

| | INCP | TCK | KQ | SCR | SCC | SCS |
|------|-------|-------|-------|-------|-------|-------|
| INCP | | 1,887 | 2,034 | 4,324 | 2,565 | 2,482 |
| TCK | 2,070 | | 2,332 | 2,758 | 2,489 | 2,772 |
| KQ | 1,266 | 1,462 | | 1,753 | 1,355 | 1,558 |
| SCR | 1,415 | 1,464 | 1,211 | | 1,433 | 1,460 |
| SCC | 1,881 | 1,763 | 1,634 | 2,031 | | 1,670 |
| SCS | 1,516 | 1,565 | 1,414 | 1,421 | 1,534 | |

As an approach to data analysis by using SEM - PLS as recommended Kock, 2015. Table 1 shows the results that the vertical and lateral collinearity show that all VIF <10,

which means that it does not happen multikolinieritas. The absence of bias.

Table 2. Results of Analysis Factory

| Variables | Total factor | Fit Index |
|---------------------------|--|---|
| Innovation capability | One | Chi-square/df=1,42;RMSEA=0,64;CFI=0,99;GFI = 0,86 |
| Tacit knowledge sharing | One | Chi-Square/df=1,54;RMSEA=0,013;CFI=0,88;GFI=0,87 |
| Knowledge quality | One | Chi-Square/df=0,881;RMSEA=0,000;CFI=1,00;GFI=0,88 |
| Social capital | Three (Relational, coginitif, structure) | Chi-Square/df=1,716;RMSEA=0,067;cfi=0,87;GFI=0,90 |
| Social capital relational | One | Chi-Square/df=1,37;RMSEA=0,061;CFI=0,99;GFI=0,85 |
| Social cognitive capital | One | Chi-Square/df=0,51;RMSEA=0,000;CFI=1;GFI=0,89 |
| Social capital structure | One | Chi-Square/df=0,51;RMSEA=0,000;CFI=1;GFI=0,89 |

Table 3. Descriptive statistics and correlations of variables

| Variables | SD | INCP | KQ | TKS | SCR | SCC | SCS |
|-----------|--------|------|----|-----|-----|-----|-----|
| INCP | 3,7744 | 1 | | | | | |

| | | | | | | | |
|-----|------------------|-------|--|--------|-------|--|------------|
| | 0,7139 | | | | | | |
| KQ | 3,1033 0,8208 | 0,344 | | 1 | | | |
| TKS | 3,0018 0,6417 | 0,636 | | 0,084 | 1 | | |
| SCR | 3,0600 0,6443 | 0,208 | | 0,045 | 0,342 | | |
| SCC | 4,8873 0,6701 | 0,421 | | 0,307 | 0,520 | | 1 |
| SCS | 4,5668 0,7642 | 0,277 | | 0,1311 | 0,382 | | 0,225 1 |

Table 4. Reliability and Validity

| | Cronbach alpha | Reliability | AVE |
|------|----------------|-------------|--------|
| INCP | 0,817 | 0,836 | 0,664 |
| KQ | 0,834 | 0,840 | 0,763 |
| SCC | 0,803 | 0,827 | 0,620 |
| SCR | 0,810 | 0,823 | 0,777 |
| SCS | 0,728 | 0,727 | 0,4450 |
| TKS | 0,810 | 0,729 | 0,561 |

The Table 3 shows that each variable generating value and the standard deviations of the mean <1, which means that the respondent has a good reliability value. If seen from Table 4 show that the innovation capability has significant value, positive correlation with all the variables etc., quality knowledge has value only significant correlation to the innovation capability and tacit knowledge sharing. Tacit knowledge sharing relationships significant and positive impact on social capital and the three types of social capital. In Table 4 displays the Cronbach alpha, reliability and AVE. The value of AVE on all construction <0.50 indicates that convergent validity of all constructs was good. Reliability and Cronbach alpha has a value greater than 0,70 which means that reliability is good in terms of internal consistency in each construct (Nunnally, 1978).

DISCUSSION

The main thing to be a contribution in this study that the test results and analysis states that the innovation capability, quality knowledge, tacit knowledge, social capital has a detailed relationship. Some previous research in knowledge management has proven that organizations with a strong knowledge management will be able to enhance the success of innovation capability (Soto-Acosta et al., 2018) and this research also get the same results with previous studies. In detail, the results showed that tacit knowledge sharing can improve innovation capability, this is similar to the research conducted by Kucharska and Dabrowski, 2016, Kruse and Popa et al., 2017). In social capital gain significant value to the tacit knowledge sharing, it is supported by previous studies conducted Soto-Acosta and Cegarra Navarro, 2016). This study shows that knowledge quality has a direct relationship to the innovation capability, these results are in accordance with the empirical findings of deZubielqui et al, 2018). Although the discussion of the process of the different knowledge management on innovation which has limitations, so in this study is expected to contribute that

knowledge quality can improve innovation capability. Positive findings from social cognitive and relational tacit knowledge sharing strengthen theoretical foundation. The roots of tacit knowledge in organizations, mostly in the social interaction, shared ideals and This study shows that knowledge quality has a direct relationship to the innovation capability, these results are in accordance with the empirical findings of deZubielqui et al, 2018). Although the discussion of the process of the different knowledge management on innovation which has limitations, so in this study is expected to contribute that knowledge quality can improve innovation capability. Positive findings from social cognitive and relational tacit knowledge sharing strengthen theoretical foundation. The roots of tacit knowledge in organizations, mostly in the social interaction, shared ideals andvalue (Nonaka and Von Krogh, 2009). Tacit knowledge sharing within an organization is related he relational and cognitive social capital (Nahapiet and Ghoshal, 1998). Trust is one of the core characteristics of the relational dimension of social capital (Coleman, 1988; Nahapiet and Ghoshal, 1998) and trust is one of the important underlying factors that affect tacit knowledge sharing in organization (Nonaka and Toyama, 2003). This view is also strongly supported by Collins and Hitt (2006) and Martinez-Conesa et al (2017). So, while the relational dimension social capital plays a role urgent the effective transfer of knowledge tacit, cognitive dimensions also play an equally important role in the transfer of tacit knowledge (Chow and Chan, 2008; Wasko and Faraj 2005). In this context, it is useful to discuss and draw attention to the fact that the study showed no significant correlation between the structural components of social capital and tacit knowledge sharing. This is contrary to the findings Wasko and Faraj (2005) who found the centrality bethe deciding factor in the network electronic knowledge observational evidence conflicting.

Implications of Managerial

Knowledge management has been in the industry and is in the company's management program. Further research focuses on middle managers of companies in which middle managers have more boldly innovative about the importance of knowledge sharing that is able to bring an increase in innovation capability, can even be said that knowledge sharing is an important tool to improve innovation capability. Here, although tacit knowledge sharing plasticity are underestimated, but they must realize that tacit knowledge is essential. Tacit knowledge can be in the stimulus by the social capital that has three dimensions.

Implications of Academic

This is because the growing importance of thinking based on knowledge in the academic, the results of this study have several implications, namely the construct of social capital, tacit knowledge sharing and innovation capability that is new, the implications of the second study is to investigate the role of tacit knowledge sharing in relation to the innovation capability of social capital on sharia banking firms between public and private. The third implication that the vital role of the knowledge quality of the innovation capability that far less attention.

Limitations of the study

As in previous studies, this study has its limitations, the first in the number of respondents, the geographical position is limited to the Java area where respondents are still influenced by the culture and environment that exists.

Conclusions and future research

Currently the development of existing businesses marked by their intense competition and uncertainty that has memaksas organizations to continue to develop innovative environment. One of the main roads that organizations can follow reaching innovation by way of their effective knowledge management and the sharing of knowledge. According to research Riege (2005), the success or failure of an organization is influenced by their existing knowledge sharing within the organization. The importance of tacit knowledge sharing within an organization can be considered significant and have been shown in relation to premises decision-making, time management, quality and competitiveness (Haldin-Herrgard, 2000), which all iitu regarded as an essential ingredient improving innovation success. This study also discusses the importance of social capital has an important role to tacit knowledge sharing, and the latter an important role quality knowledge to the innovation capability. These findings can be used as a strategy to develop and maintain knowledge sharing among employees in the organization, which will improve efficiency, creativity and innovation through rapid decision-making (point amayah, 2013). Research to be upcoming, are expected to use a larger sample and a broader geographic location. which will increase efficiency, creativity and innovation through rapid decision-making (point amayah, 2013). Research to be upcoming, are expected to use a larger sample and a broader geographic location. which will increase efficiency, creativity and

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