

# Semi-Decentralized Knowledge Management Governance: A Case Study in Indonesian Financial Company

Achmad Nizar Hidayanto, Fathiya Achmad, Irene Sherlyta Gloria, Kasiyah M. Junus  
Faculty of Computer Science, Universitas Indonesia

## ABSTRACT

Today, knowledge management known as a tool that will give lots of benefits for companies, such as facing employee turnover and creating competitive advantage. In order to control the process of knowledge management, companies need Knowledge Management Governance. This research is conducted to formulate and examine Knowledge Management Governance process, especially in a company with semi-decentralized manner in managing its knowledge. To gain the insight of such Knowledge Management Governance, we conducted a case study in a financial company in Indonesia that has successfully managed its knowledge. The data is collected by semi-structured interviews with Training, Learning, and Development department, Credit department, IT and Communication department, and observations of the company practices and documents. This research successfully identifies the Knowledge Management Governance process in the company that classified in some aspects, such as Authority, Risk Management, Organizational Culture, Strategy Development, Value Delivery, Resource Management, and Evaluation & Measurement.

**Keywords:** Knowledge Management, Knowledge Management Governance, Authority, Risk Management, Organizational Culture, Strategy Development, Value Delivery, Resource Management, Evaluation & Measurement.

## 1. INTRODUCTION

Business developments in the knowledge era become an important issue that should be taken care of a company to manage information as a company asset. Every company needs to manage or take advantage of the asset correctly to achieve and optimal result. Knowledge is a critical asset in a company that plays a role in the global competition (Ardianto & Tanner, 2011). In other words, knowledge management is one of the steps to compete globally.

Knowledge management is a process of identifying, creating, explaining, and distributing knowledge to every people accurately and effectively. The precise implementation of knowledge management will increase the efficiency of operational activity and productivity in the company, enhance the quality of service to the customers, and, improve the innovation of services or products in the company. Company needs technology aid to manage the knowledge by using Knowledge Management System (Rich & Duchessi, 2004). Knowledge Management System is adopted by the company as a tool to automate the identification, selection, management, distribution, and transformation of the knowledge in a company (Turban *et al.*, 2008). Knowledge Management System is utilized for facilitating the employee in the company to share knowledge that resulted in higher productivity and competency.

However, the implementation process of Knowledge Management System in the company often faces some obstacles, primarily related to different work culture of the employees and minimum support of the management (Zyngier, 2005). Another obstacle is the complexity level of translating the different needs of the company that will be documented systematically (Zairi & Almashari, 2002). Consequently, company needs a mechanism to direct and control the knowledge management process so that the implementation of knowledge management could accomplish the expectation of the company.

Knowledge Management Governance process is a standard used to direct and control company activities both in the strategic and operational level that focused on knowledge management activities (Onions & Langen, 2006). Knowledge Management Governance is aiming to control knowledge management activity, guide the change process, minimize the risks, and ensure the accomplishment of the company objectives. Moreover, Knowledge Management Governance will ensure the compatibility of the company needs and the result of knowledge management in the company. Ardianto & Tanner (2011), Onions & Langen (2006), and Zyngier (2005) are some researchers who successfully define the key-area processes in Knowledge Management Governance, particularly for companies which implement centralized knowledge management.

In practice, some companies apply a semi-decentralized Knowledge Management Governance system, where the enterprise-wide knowledge is managed by one particular department, while particular knowledge management is organized by respective department who has interest to the knowledge. Therefore, this research will contribute in the following matters:

- Develop the key governance functions that needs to be observed in Knowledge Management Governance, by adapting Knowledge Management Governance concepts that already been defined by prior researchers and combine them with the key governance functions in IT Governance area.
- Map out the Knowledge Management Governance in the semi-decentralized company environment.

To observe the Knowledge Management Governance practices in the semi-decentralized company environment, we choose a finance company in Indonesia as our case study. We consider this company as our case study as they show their success in managing their knowledge. Regarding to this, we expect that our result can be used as a lesson learned for other companies with respect to Knowledge Management Governance.

## **2. LITERATURE REVIEW**

### **2.1. Knowledge Management**

There are some definitions about knowledge management by prior researchers, such as:

- Knowledge management is an managerial level activity that pay attention in the knowledge transfers, transmits, stores, and applies processes to the fullest extent so that every members could use the information in the decision-making process precisely in the accomplishment of the company objectives (Al-Mabrouk, 2006).
- Knowledge Management is a process to create, capture, codify, and transfer knowledge among companies to achieve competitive advantage (Fernandez, Gonzalez, & Sabherwal, 2004).
- Knowledge management could be described as an attempt to utilize company asset in the process of value actualization and company objectives accomplishment (Wiig, 1997).
- Knowledge management is one of a strategy to deliver the right knowledge to right people in the right time by facilitating the information exchanges to improve the company activities effectiveness (Valmohammadi, 2010).

Based on the definitions explained above, we can conclude that knowledge management is a process of collecting and identifying information, converting tacit knowledge to explicit knowledge, storing knowledge, and distributing the knowledge inside the company.

## **2.2. Knowledge Management Governance**

Based on research conducted by Onions & Langen (2006), knowledge management needs a direction and control in every activity in the strategic or operational level. Governance is aiming to ensure that every knowledge management activity achieves company objectives. Governance becomes an importance and very useful things in the company to ensure the quality of knowledge management process and measure the performance of a knowledge management process in the company. Based on Onions & Langen (2006), Knowledge Management Governance aspects that need to be observed are standards and processes. Standards are related to regulation in directing and controlling knowledge management while processes are related to procedures or steps in knowledge management process that needs to be complied with standards. Standards consist of a maturity model and knowledge criteria. A maturity model is used to observe the targets while knowledge criteria are used to measure the result quality of the knowledge management system.

Zyngier (2005), on the contrary, states that Knowledge Management Governance is an authority that assures the achievement of the benefit of knowledge management process. Knowledge Management Governance aspects are authority, risk management, and evaluation & measurement. Authority aspect is used to see the role of the stakeholders in knowledge management process that are decision-making, communication, and knowledge management coordination. Risk aspect is related to analysis of the challenges and risks that could arise, then used as a consideration in the solution creation process. Last but not least, Evaluation & Measurement aspects are used in the evaluation process to assess the achieving performance. The achieving success or failure is measured then used for an improvement of the knowledge management process in the future.

In other cases, Knowledge Management Governance is utilized for managing different knowledge management projects to accomplish the projects' necessity (Schroeder & Pauleen, 2007). According to Schroeder & Pauleen (2007), the aspect that needs to be consider to fulfill the projects' necessity is role defining and describing of each stakeholders. Structure becomes an important aspect as it describes consultant, strategy planner, communication coordinator, and operational executor role in knowledge management process. Second aspect is process, that include planning, decision-making, communication, and coordination process. Process and structure is related where every process have to be managed by the right people so that the projects' necessity could be achieved.

Furthermore, Ardianto & Tanner (2011) state that the important aspects in Knowledge Management Governance are authority, knowledge management strategy development, organisational culture, risk management, and evaluation & measurement. Ardianto & Tanner (2011) utilize the aspects defined by Zyngier (2005) and add two new aspects, knowledge management strategy development and organisational culture, which applied for multinational companies or companies with some branches in different areas. Below is the explanation of every aspect.

- Authority, focused on ensuring the qualified leadership to maintain knowledge management process and developing a suitable approach in decision-making process, which is related to the authority of a person in the company.

- Knowledge Management Strategy Development, focused on developing the strategy compliance among people, process, and technology in knowledge management.
- Organizational Culture, focused on designing, thinking, and creating the environment that support the knowledge management related to interaction culture between individual in the company.
- Risk Management, focused on ensuring the planning process in identifying and Minimizing risks in knowledge management is maintained correctly.
- Evaluation & Measurement, focused on developing an accurate approach to measure performance of the knowledge management. Besides, it also develops feedback mechanism that could be used as an evaluation process to minimize and correct the weakness in the managing process which has been running.

### **2.3. Information Technology (IT) Governance**

According to Australian Standard for Corporate Governance of IT, IT Governance is a mechanism to direct and control the utilization of IT in the company. This involves monitoring, evaluation, and directing the planning of IT utilization to support companies and to monitor the accomplishment of use of technology to the company's plan, including strategy and policy to use IT in the company. The main objective of IT Governance is ensuring the IT investment will create benefits for companies and minimizing risks related to IT investment. Van Grembergen (2002) states that IT Governance is an organization approach in controlling the planning and implementation process of IT strategy. IT Governance is a mechanism to ensure the compliance between IT and business. Besides, Weil & Ross (2004) states that IT Governance is a specification of a decision and a measurable framework to encourage the IT utilization. Area focuses in IT Governance are (Saul, 2006):

- Strategic Alignment, this area focus on seeing the connection between IT and business. This aspect is aiming to observe the compliance between IT purpose and business purpose. IT is expected to be compliance with business so that business can get benefits from IT.
- Value Delivery, this area focus on ensuring that IT investment is creating value to business. This aspect is aiming to defining value of the IT investment in business so that it could be monitored and optimized.
- Risk Management, this area focus on defining risks. This aspect is aiming to describe risks that become threats for organization. This aspect is also examining the steps to minimize risks.
- Resource Management, this area focus on describing kinds of basic elements of IT resources. This aspect is aiming to optimize the investment of resource benefits for IT. Resource are expected to be effectively and efficiently utilized by organization.
- Performance Measurement, this area focus on measuring results from IT investment in organization. This aspect is aiming to observe the achievement of IT in organization. The detected weaknesses will be prevented and the success will be maintained and sustained.

### **2.4. Proposed Model of Knowledge Management Governance**

One of the objectives of this research is to define importance aspects as an area focus that needs to be considered in Knowledge Management Governance. Our proposed model is developed by combining some aspects in Ardianto & Tanner (2011) and Saul (2006) with respect to the IT Governance.

Some aspects defined by Ardianto & Tanner (2011) have similar purpose with Saull (2006), such as risk management and evaluation & measurement while there is an aspect with the same area focus but with different output, that is strategy. Saull (2006) wants to see the compliance between business strategy and IT strategy while Ardianto & Tanner (2011) use the strategy aspect to discover the components in defining strategy and seek for compliance among the components. This research will combine both of the purpose to observe the business objectives, knowledge management objectives, and knowledge management strategy to find out the compliance between company needs and the steps in knowledge management process in the company. Afterward, we will discover the components in the running of knowledge management process to see the compliance between the strategy and the defined components.

Two other aspects from Ardianto& Tanner that are authority dan organisational culture will be used to find out the responsible parties (departments or people) in knowledge management process and the relation between organization culture and knowledge management process. Besides, we also add 2 other aspects from Saull (2006) which related to IT Governance that are value delivery and resource management. Value delivery focuses on ensuring that knowledge management will create benefits for the company as defined in strategy aspect. Resource management focuses on ensuring that the company has utilized the resource optimally in the implementation of knowledge management. Resource management aspects will be focus on defining the elements needs to be managed and utilized while evaluation & measurement aspect will be focus on assessing every aspect which considered important in knowledge management. Figure 1 is our proposed model of Knowledge Management Governance.



Figure 1. Proposed Model of Knowledge Management Governance

- Risk management, focuses on managing risks and knowledge management process by considering the definition of risks and the steps in preventing and minimizing the likelihood of risks.
- Evaluation & measurement, focus on assessment, measurement, and evaluation of knowledge management performance by assessing the evaluation method and KPI (Key Performance Indicator).
- Strategy development, focuses on defining the business objectives, knowledge management objectives, steps to achieve the objectives, discovering the correlation

between the steps and the components (people, process, and technology) in knowledge management.

- Organizational culture, focuses on assessing the internal culture in the company in the continuance of knowledge management process. This aspect will define the culture value and discover the influence of culture in knowledge management process.
- Authority, focuses on defining the individual role and organization role in knowledge management process, such as people-in-charge for planning, operational, communication, and evaluation process in knowledge management process.
- Resource Management, focuses on defining the required resources in knowledge management process and the process of managing and utilizing these resources.
- Value delivery, focuses on defining the benefits of knowledge management process which later could be used as indicator of success.

### **3. METHODOLOGY**

This research involves a finance company in Indonesia as a case study which implement semi-decentralized knowledge management concept. This company has successfully obtained an Indonesian Most Admired Knowledge Enterprise (MAKE) Award in 2008 which proven as a company with an outstanding knowledge management governance implementation in the company.

#### **3.1 Profile of Case Study**

The case study is a finance company which engaged in consumer finance, such as procurement finance based on the consumer needs with installment payment. Management understands that knowledge is valuable asset in the company that needs to be managed so that it will improve the employee insight, optimize business proves, and provide optimal service to the customers that will resulted in the revenue increasing.

The knowledge managed in the company divided into two types that are general knowledge and particular knowledge. General knowledge is SOP, Technical direction, Operational direction, SK, base practice, and case study. Moreover, particular knowledge is any type of internal knowledge managed to record important information related to a department that must be known by the employee in the department, such as in the credit department there will be knowledge related to verification and validation process of credit data, decision-making process in the approval of credit submission, and payment process to dealer.

The methods used to manage knowledge are both formal and informal. In terms of formal way, the management defines and organizes some activities systematically, such as monthly focus group discussion, department workshop gathering among consumers, and monthly meeting. In terms of informal method, it occurs without any planning, such as department seminar and additional training. Both methods could be conducted offline or online.

The technology used in storing and distributing knowledge in the company is e-learning, a virtual learning media. Furthermore, knowledge gallery is the knowledge portal of the company using Microsoft SharePoint 2007. The company also has Oracle Learning Management System (OLMS) which useful in online training application and e-learning learning process. In addition, the company has a Training Evaluation & Instruction Scoring (TEIS) to evaluate the learning process. The company also implements FIF APPS as an operational internal transaction, such as credit, collect & recovery, and reprocess asset.

### 3.2 Research Instruments

As we explained in section 2.4, the proposed aspects of Knowledge Management Governance used in this research are strategic alignment, value delivery, risk management, organizational culture, authority, evaluation and measurement, and resource management. Each aspect will be break down into some questions that will be used in the interview process with Training & Learning Development (TLD) department, Credit department, and Communication Information Technology(CIT) department. Those departments appoint the knowledge management concept in the company that is general knowledge managed by Training & Learning Development (TLD) department while particular knowledge managed by related department, which, in this research, are Credit department and Communication Information Technology(CIT) department.

Table1. Research Instruments

ASPECTS	LIST OF QUESTIONS
<b>Authority (AU)</b>	AU1. Who has the role to make knowledge management strategy? AU2. Who has the role for carrying out the operational activities of knowledge management? AU3. Who has the role for monitoring the knowledge management?
<b>Risk Management (RM)</b>	RM1. What are the risks that may arise in the process of knowledge management? RM2. What methods are used by company to anticipate the risk of knowledge management? RM3. Is there a mechanism that company use to evaluate the performance or effectiveness of risk analysis methods are used? RM 4. Are there any troubleshooting procedures related to knowledge management?
<b>Organizational Culture (OC)</b>	OC1. Describe the cultural values within the company? OC2. Are the values of the organization can support knowledge management strategy? what are those values? OC3. What is the impact of culture on knowledge management within the company?
<b>Strategy Development (SD)</b>	SD1. What is the purpose of managing organizational knowledge? SD2. How does the organization achieve these goals? SD3. Whether in defining the knowledge management strategy, refer to the components of people, processes, and technology? SD4. How the organization measures align with the organizational needs of the knowledge management process?
<b>Value Delivery (VD)</b>	VD1. What are the benefits of knowledge management within the organization VD2. How does the organization achieve these benefits
<b>Resource Management (RM)</b>	RM1. What are the resources needed in the process of knowledge management? RM2. How to manage resources that have been defined?

<b>Evaluation &amp; Measurement (EM)</b>	EM1.How organizations evaluate the process of knowledge management EM 2.Specify and describe the key performance indicators for knowledge management?
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#### **4. ANALYSIS AND DISCUSSION**

This section will explain the mapping result of the Knowledge Management Governance Aspects that obtained from the company. The mapping is carried out by analyzing all the answers from the interviewees.

With respect to risks aspect, there are three important risks, such as the difficulty in finding the knowledge or a misunderstanding of the existence of the knowledge, the unwillingness of the employee in sharing their knowledge because of the ignorance of the employee or no knowledge to share, and the information misuse or the spreading of information to the irresponsible people. From those three risks, TLD department states that the one that really need to be taken care is the unwillingness of the employee in sharing their knowledge. However, Credit department, believe that the spreading of information to the irresponsible people is the most important because it related to information collected and managed by Credit department which is the core business of the company. In contrast, CIT focus on the finding process of the knowledge.

Regarding organizational culture aspect, TLD department, CIT department, and Credit Department implement the same culture value, namely team work, excellence, achieving, and moving forward in the running of knowledge management process. Each value becomes the basis of the department activities. However, TLD department find that reward program need to be added in the culture to improve the employee's eagerness in sharing knowledge. On the contrary, CIT department create a policy to every employee to create a project report so they will automatically sharing their knowledge.

In terms of strategy development aspect, knowledge is managed to record information needed in doing the routine activity that is difficult to be memorized. Furthermore, knowledge needs to be organized to face rapid changes. Specifically, CIT department manage the knowledge to provide a better services to every department and optimize their activities to increase performance. Credit department manage the knowledge to provide a better service to the customers so they will feel comfortable that will resulted in the increase of customers. In other words, knowledge management carried out by CIT department influences the company performance while Credit department directly influences the company profit and revenue.

Besides seeking out the compliance between knowledge management objectives with business objectives, we notice that every department will consider people, process, and technology elements in each process. Every departments always create strategy that will improve the employee competency, effective and efficient process, and utilize appropriate technology.

Value delivery aspect defines two benefits of knowledge management implementation which are the improvement of employee's insight and optimization of business process which will resulted in the improvement of company performance. CIT department believe that knowledge management process is implemented to support them in providing better service to other department. Credit department desires to improve the employee competency that

resulted in better services to customers from the knowledge management process. In other words, CIT department's benefits indirectly related to company profit and revenue while Credit department's benefits directly affecting the company profit and revenue.

With respect to resource management aspect, those departments acknowledge that the important resources in knowledge management are data, people, and technology. Data in CIT department is a collection of each project report and a collection of credit team activities in Credit department. Both of the departments manage a result of department business process activity. However, Credit management manages customer-related data while CIT department manages internal data. CIT department uses a file sharing system while Credit department uses flow order management.

Lastly, evaluation and measurement aspect is carried out by both departments to assess and evaluate the process if there are problems or complaints. The problems and complaints help the Person-In-Charge (PIC) in each department to collect information and conduct a review meeting. The review resulted in minutes of meeting that examine the problems identification and solution.

Table 2 below is a summary of the analysis process of Knowledge Management Governance in the company with such characteristic: service company, have lots of branches, have a lot of employee, and high-level complexity business.

Table2. Summary of Analysis Process of Knowledge Management Governance in Finance Company

Aspects	Characteristics
<b>Authority (AU)</b>	<ul style="list-style-type: none"> <li>• Knowledge is managed in head office, while branch office use it only in particular condition reported to the head office.</li> <li>• In head office, knowledge management is divided into two things which are the general knowledge that is managed by special department and particular knowledge is managed by related PIC in the department.</li> <li>• General knowledge management department collaborates with PIC in managing center knowledge.</li> <li>• There are three important roles in knowledge management which are facilitator, initiator, and user.</li> </ul>
<b>Risk Management (RM)</b>	<p>The important risks, according to the company, are explained below.</p> <ul style="list-style-type: none"> <li>• The difficulty in finding the knowledge or a misunderstanding of the existence of the knowledge because of the uncontrolled knowledge management process.</li> <li>• The unwillingness of the employee in sharing their knowledge because of the ignorance of the employee or no knowledge to share</li> <li>• The information misuse or the spreading of information to the irresponsible people (implementation of access right control).</li> <li>• The rapid changes of information and business development.</li> </ul>
<b>Organizational Culture (OC)</b>	<p>Below are the values that have been implemented in the company.</p> <ul style="list-style-type: none"> <li>• Emphasize the importance of knowledge management as company value.</li> <li>• Reward method both financially or non-financially could be</li> </ul>

Aspects	Characteristics
	<p>implemented to increase the willingness of knowledge sharing.</p> <ul style="list-style-type: none"> <li>Enforcement method explained in the rules and regulations is one of effective method in the realization of knowledge management importance.</li> </ul>
<p><b>Strategy Development (SD)</b></p>	<ul style="list-style-type: none"> <li>The service company objectives in recording knowledge possessed by employee are improving employee's insight, effectively and efficiently support the operational activity, and improve the service to customers.</li> <li>The strategy must comply with people, process, and technology elements.</li> </ul>
<p><b>Value Delivery (VD)</b></p>	<p>Below are the benefits of knowledge management in the company.</p> <ul style="list-style-type: none"> <li>Improve the employee competency.</li> <li>Optimize business process.</li> <li>Support the innovation-creating process in the company.</li> </ul>
<p><b>Resource Management (RM)</b></p>	<p>The important resources in knowledge management are explained below.</p> <ul style="list-style-type: none"> <li>Data, which is the main resource in knowledge management. No data means no information.</li> <li>People, which are the second main resource as it is the one who manage the knowledge.</li> <li>Technology, which is the third main resource as it support the running of knowledge management.</li> </ul>
<p><b>Evaluation and Measurement (EM)</b></p>	<p>Below are the evaluation and measurement process run in the company.</p> <ul style="list-style-type: none"> <li>Formal method, which is carried out by the PIC department periodically. This method involves the KPI checking.</li> <li>Non-formal method, which is carried out every time the employees have problems or complaints.</li> </ul>

## 5. Implication

The implications of this research are explained in the following sections.

### 5.1. Implications for knowledge management governance

The concept of Knowledge Management Governance is a relatively new. Previous studies showed that they already successfully defined several aspects of Knowledge Management Governance which are Authority, Risk Management, Organizational Culture, Strategy Development, and Evaluation & Measurement. This study proposes two additional aspects the company should consider, namely, Value Delivery and Resource Management. Resource management is considered as an important aspect, as knowledge management requires supporting of data, people and technology. While Value Delivery aspect is required to ensure that all the benefits of knowledge management can be felt by all its stakeholders. Both aspects are expected to enrich the knowledge of governance functions that need to be considered by the organization so that knowledge management can align with the businesses needs.

This study also provides a different perspective of knowledge management governance, particularly for knowledge management governance with semi-decentralized processes and environment. There is a distinct challenge in the management of this knowledge, especially to ensure a clear division of responsibilities between the management of knowledge at the central level and other divisions. In addition, classification is also necessary to ensure that knowledge should be managed at the enterprise level and at the division level.

## **5.2. Implications for Organization Knowledge Management Governance Practice**

Knowledge management governance processes performed by the organization has actually been performed quite good. To improve the quality of knowledge management governance processes in organizations, there are few things that can be considered to, such as:

- Related to Authority aspects, the organization needs to describe more clearly the responsibilities of both departments TLD and PIC in each department. Organisations should also have at least one person in charge of the focus for managing internal knowledge. Given the nature of knowledge management is semi-decentralized, organizations need to map the connections between the PIC of each department by department TLD so there is positive synergy and optimal.
- Related Risk Management aspects, each department should be responsible for defining the risk in each department and then make risk reduction standards. In addition, organizations also need to define access control to the knowledge so that clear access rights held by any employee of an organization's own knowledge, especially knowledge that is confidential. That way all employees can easily find information and still heed the security aspects for each set of knowledge can be accessed by anyone.
- Related to Organizational Culture aspects, organizations should make the attractive program, especially to raise awareness of the importance of sharing knowledge and increasing willingness to share knowledge among employees. Each PIC must be a facilitator who were be able to persuade any employee in his department to document the knowledge that they have.
- Related to Strategy Development aspects, each department should define the purpose of knowledge management. TLD department in charge of the company's knowledge management process should map out the management objectives of each department with the primary purpose of the company resulting in the desired alignment. In addition, each PIC of each department should define the steps of knowledge management then coordinated by the department to run with optimal TLD.
- Related to Value Delivery aspects, each department should define indicators to be achieved as well as defining standards of achievement. Department of TLD as manager of enterprise-level knowledge is important to document all of these indicators and the level of achievement which then publish it on the organization's internal portal. In addition, each department should create a program to assess its achievements.
- Related to Resource Management aspects, each department should be able to map the PIC resources needed for the management of knowledge. Mapping is generated should also be communicated to the department TLD, so TLD department can find out what resources are managed by each department and can help create a training program for the maintenance of these resources.
- Related to Evaluation and Measurement aspects, each PIC in each department should work with departments to design key performance indicators and periodically review the program schedule.

## 6. CONCLUSION

This research has successfully developed key of governance functions in the knowledge management governance. The proposed model is expands from the previous researchers by adding some important aspects of the value delivery and resource management. Thus, the key of governance functions proposed in this study include: strategic alignment, value delivery, risk management, organizational culture, authority, evaluation&measurement, and resource management. The model has been successfully used to map the knowledge management practices at financial institutions that use the concept of semi-decentralized knowledge management. To obtain better results, next research need to do more in-depth survey, especially in the branches of the organization so that the concept of a semi-decentralized can be focus to draw, in particular to acquire the knowledge management process in the central and an efficient in branch

## REFERENCE

- Al-Mabrouk, K. (2006). Critical Success Factors Affecting Knowledge Management Adoption: A Review of the Literature. *IEEE*.
- Ardianto, D., & Tanner, K. (2011). Knowledge Management Governance In Multinational Companies: A Case Study of Siemens. *Pacific Asia Conference on Information Systems* (p. Full paper). Australia: AIS Electronic Library (AISeL).
- Fernandez, I. B., Gonzalez, A., & Sabherwal, R. (2004). *Knowledge management: challenges, solutions, and technologies*. Pearson/Prentice Hall.
- Onions, P., & Langen, d. R. (2006). Knowledge Management Governance. *7th European Conference Knowledge Management*. Budapest.
- Saull, R. (2006). IT Governance A Framework for Performance and Compliance. *ITGI Japan Opening Celebration Conference*. Tokyo: IT Governance Institute.
- Schroeder, A., & Pauleen, D. (2007). KM governance: investigating the case of a knowledge intensive research organisation. *Journal of Enterprise Information Management*, 414-429.
- Turban, Leidner, McLean, & Wetherbe. (2008). *Information Technology for Management*. USA.
- Valmohammadi, C. (2010). Identification and Prioritization of critical success factors of knowledge management in Iranian SMEs. *African Journal of Business Management* Vol.4(6), 915-924.

Wiig, K. (1997). Knowledge Management:an introduction and perspective of knowledge management. *Journal of Knowledge management*, 6-14.

Zairi, M., & Almashari, M. (2002). An empirical study of the impact of knowledge management on organization performance. *The Journal of Computer Information Systems*, 74.

Zyngier, S. (2005). Knowledge Management Governance. *Article for the Encyclopaedia of Knowledge Management*.