Integrating Balanced Scorecard and Enterprise Risk Management in Banking

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Abstract : **Risk management that created from credit risk management, market risk management, liquidity risk management, operational risk management, legal risk management, reputation risk management, risk management strategies, and compliance risk management become incentive for top management (CEO) in determining better performance management decisions Performance management of commercial banks is an important aspect of banking business management. This paper makes study about how to use the Balanced Scorecard as a tool, which is applied to commercial banks performance management system, and points out that it breakthrough the defects in the traditional single application of financial indicators which measures performance. And it raises the value of performance management appraisal system based on the introduction of customer factors, internal business processes, employee learning and growth and financial factors. This paper also makes study about the commercial banks in the performance of the Balanced Scorecard Management System mechanism, the strategy of application, application limitations, and outlook on the future of commercial banking services model based on the above points**

Keywords : Risk Management, Balanced Scorecard and Bank

I. Introduction

Having recorded a growth of 15.5% in asset value, the banking sector still becomes a promising industry for the players in Indonesia. They have been vigorously competing in optimizing third-party funds from customers, particularly in distributing credit. Not only public banks, but also both regional development banks (BPD) and sharia banks have been seriously attempting to establish their existence among the national competition

Insert Graph 1 Banking Asset Growth

Insert Graph 2. Banking Asset (IDR Trillion)

Although the national banking still shows a rapid growth these days, the players still need to wary of a new challenge in collecting the third-party funds. The Indonesia Deposit Insurance Corporation already defines the interest rate limit that is relatively lower than other investment alternatives, namely 5.5% for public bank and 8% for BPD . As a result, such low

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interest rate will drive the national banks to be more creative in collecting third-party funds from customers.

In addition to the positive growth on asset, Indonesia banking also accomplishes a high Return on Assets (ROA). Compared to other countries, ROA of our national banking can be classified as very high. However, such circumstance occurs in the mid of the domination of only four top banks. Three of them even record a higher level of ROA than the industry average

Insert Graph 3. Return Of Asset Of Banks

The accomplishment of recording such high ROA is much driven by their success in establishing a strong position in specific segments. For instance, Bank Mandiri is fairly strong in two segments, corporate credit and commercial credit, while BRI already has a firm position in the SME credit segment. Meanwhile, BCA and BNI have even capability in the credit portfolio.

Insert Graph 4. Loan Disbursement in trillion IDR

Banking sector is a system that linked one to another. The failure of one bank not only cause problems at individual banks. Furthermore, a bank failure can cause a domino effect in banking industry. Because bank provides a means of payment, then the failure of banking sector will lead to failure in corporate sector where there is a bottleneck in payment settlement. As a result of failure in this sector can have a negative effect on entire system. Failure of one bank can cause problems in banking system as a whole and can cause massive withdrawal of health bank (Sunarsip and Salamun, 2003).Bank is a financial institution that is most tied to regulation (Mukuddem - Petersen and Petersen, 2008). Banks regulation is associated with banking institutions as well as products and services offered. Purpose of regulation in banking industry is to protect customers and increasing their confidence to products of banking industry. Regulation for a bank is different from regulation of other industries. The effect of any bank management will have an effect on overall economy. If on other industries regulation generally concerning with standardized products and business competition, regulation on banking industry comprehensively covers the entire bank (Idroes, 2008)

Indonesia has vast potential and a bright prospect to emerge as a new global economic power. This is supported by growth in numerous sectors particularly in the industrial sector as well as the development of an infrastructure that is more conducive for businesses. This also applies in the financial and banking industry.

The financial industry and banking industry in particular, attempts to accommodate the needs of businesses by offering more banking products including financial products, credit, service and investments. With the ever-growing variety of banking products and the increasingly complex transactions performed by bank customers, good risk management is increasingly needed by banks in order to avoid potential substantial losses. Risk Management is available as an instrument that can be used to identify, measure, monitor and control the potential risks, thus limiting the potential losses that may occur.

Globalization, competition, strict regulation, litigation, technology, and complex financial models all contribute to the challenges facing businesses. The inability to meet the challenges in any of these areas can result in negative consequences for an organization. Berinato (2004) claimed that the only way to meet the risks associated with conducting business in today’s environment is to “balance risk.”

Enterprise Risk Management (ERM) is one technique that has been developed to meet the challenge of doing business in an increasingly complex global market. ERM differs from traditional risk management techniques that manage risk as independent “silos,” because

ERM uses a coordinated method to manage a wide variety of risk throughout the entire organization.

Meier [2000] indicated that conventional methods for managing risk do not take into account stakeholder value and the firm's responsibility to their investors. ERM provides a way for organizations to apply risk management strategies to the company as a whole enabling adjustments to their decisions to minimize the risk to their investors [Lam and Kawamto, 1997, Meulbroek, 2002]. According to the most recent literature, creating shareholder value is ultimate goal of ERM. This argument comes from the assumption that there are no other stakeholders in the firm except the shareholders [Acharyya and Mutenga, 2013]. However, shareholders are not the only group of stakeholder that influences and has interest in the performance of the firm [Freeman, 2004, Friedman and Miles, 2006].

Stakeholders have a role in the value-creating process of the organization and all organizations should be responsible for the interest of other stakeholders (e.g., employees, customers, government, suppliers, society, etc.) as well as shareholders [Acharyya and Mutenga, 2013, Freeman, 2004. Friedman and Miles, 2006]

The Stakeholder theory was the result of developments in the Social and Environmental fields. It suggests that organizations are motivated to reduce and control potential risks (Freeman, 2004). The stakeholder theory suggests that every organization is motivated to increase value for their shareholders as well as other stakeholders [Brealey and Myers, 2002, Block and Hirt, 2000]. In other words, in addition to fulfilling the economic responsibility to the shareholders, it is equally important to fulfill the legal and ethical responsibility to society, and the legal responsibility to the government and customer in order to attain sustainable long-term value for the organization. Indeed, failure to accomplish the aforementioned responsibilities can cause failure the in value creation process for organizations.

Generally it is argued that ERM can enhance firm performance, but most of the previous studies only focused on measuring the economic value of the organizations' performance, moreover, according to McShane et al. [2011] the main effect of ERM on firm performance remained inconclusive. The lack of empirical studies in this area is one reason that the relationship between ERM and company performance is not well understood [McShane, et al, 2011, Beasley, Pagach, and Warr, 2008, Tahir and. Razali, 2011]. To complicate matters, the few studies that have been published present different results and only concentrated on economic aspects. Currently, there are no published studies that examine company performance using a Balanced Scorecard (BSC). Consequently, this paper will present a conceptual framework based on the existing literature to illustrate the relationship between ERM and performance by expanding the study of risk management from a financial to a multidisciplinary perspective. Ultimately, this framework will provide a guideline for future research in this area. Furthermore, the formulation of the problem in this paper is : how the influence of enterprise risk management on overall firm performance?

II. Literature Review

II.1 Risk Management in Banking

The PMBOK (Project Management Body of Knowledge) has an entire chapter dedicated to the concept of risk management. In some cases, seasoned professionals are actually brought in to provide their consulting expertise to make sure that all project risks are effectively itemized. But in most cases, it falls onto the shoulders of the project manager to be able to make that assessment. If one follows the PMBOK's suggestions, it is important to create a task list. The PMBOK suggests the following tasks to be performed in sequence:

1. Define the Risk Management Process (And make this part of the overall project plan)
2. Identify Risks

3. Perform a Quantitative Risk Assessment
4. Perform a Qualitative Risk Assessment
5. Create a Risk Response Plan
6. Monitor Risks during the life-cycle of the Project.

The following graphic is a good frame of reference when it comes to the risk analysis cycle:

Insert Graph 4. Risk Analysis

Banks as well as other financial institutions and companies generally run business in order to obtain return of operations that always exposed to risk. Risks that occur can result in losses for bank if not detected and not managed properly. Therefore, banks have to understand and know risks may arise in carrying out its business activities. The top leadership in management of bank as well as all relevant parties should know risks that may arise in business activities of bank, as well as knowing how and when these risks appear in order able to take appropriate action. Common understanding of each risk category is important in order managers, executor and supervisor can discuss common issues that naturally occur from a variety of emerging risks (Idroes and Sugiarto, 2006).

Risk management practice aims to avoid a loss that is caused by occurrence of risk or event. Risk management is identification, assessment, and risks priority that accompanied by implementation of economical and coordinated resources to minimize, monitor, and control the possible effect of unfavorable events (Njogo, 2012).

Essentially risk management is a comprehensive process that is equipped with tools, techniques, and science that needed to identify, measure, and manage risk more transparently. Motivated by the sense to take a risk in carrying out the functions to offer financial services, bank must take or accept risk and manage various types of financial risks effectively to avoid negative impacts. Before awareness for risk management need emerges, almost all banks argue that risk should be avoided or eliminated. According Idroes and Sugiarto (2006), risk itself should not always be avoided in all circumstances, but should be managed properly without reducing the achieved. Risks that managed properly can provide benefits for banks to generate attractive profits. In order these benefits to be realized then decision-makers must understand about risk and its management.

Bank Indonesia Regulation No. 5/8/PBI/2003 dated May 19th 2003 about Risk Management for Commercial Banks is a manifestation of problem seriousness in bank risk management. This is reinforced by the issuance of Circular Letter of Bank Indonesia No. 5/21/DPNP dated September 29th 2003 concerning with Risk Management Application for Commercial Banks. Bank Indonesia's seriousness is more emphasized with the issuance of Bank Indonesia Regulation No.7/25/PBI/2005 in August 2005 on Risk Management Certification for management and officers of commercial banks, which requires all banks from low-level officials to highest to have a risk management certification that appropriate with his rank (Idroes and Sugiarto, 2006). Essence of risk management application is a set of procedures and methodology that used to identify, measure, monitor, and control risks that arising from business activities of bank (Bank Indonesia, 2009).

Bank Indonesia continues to tighten its risk management regulations for banks. Bank Indonesia Regulation (PBI) Number 11/25/PBI/2009, which is an amendment of Bank Indonesia Regulation Number 5/8/PBI/2003 on Risk Management Implementation for Commercial Banks, states that Banks are obligated to implement Risk Management effectively, both for banks individually and consolidation of subsidiary companies. The purpose of this regulation is to manage risks faced by banks in order to improve the quality of risk management in banks. The efforts to improve risk management implementation are not only directed for the interests of the bank, but also for the interests of its customers. The improvement in the quality of risk management implementation is also expected to support the effectiveness of the framework of risk-based bank supervision performed by Bank Indonesia.

Through Bank Indonesia Regulation Number 13/1/PBI/2011 on Assessment of Soundness Ratings of Commercial Banks, Bank Indonesia also states that Banks (including branches of foreign banks) are obligated to perform an Assessment of Bank Soundness Rating through risk-based methods both individually and as consolidation. The Monetary Authority's full attention has brought The Indonesian Banking Development Institute (LPPI), in accordance with one of its mission to support the development of a high quality and healthy banking industry, to put extra attention to the implementation of risk management for the banking industry and other financial institutions.

There is still much to be done in the implementation of risk management in banks and non-banks in Indonesia. Among others, preparing human resources both in quality and quantity, databases, and infrastructures such as methodologies, and many more. To fulfill the hopes of the actors in the economy and in the efforts to create a culture of risk awareness, an assembly that can consistently facilitate the needs for studies in the development of Risk Management in Indonesia is called for.

Answering this need, since 2011, the Indonesian Banking Development Institute has established a Center of Risk Management Studies and Development (PMR) that is provided for the realm of banking and other financial service institutions. PMR itself has a vision "To become a prominent and trustworthy center of Risk Management studies in Indonesia," and a mission "To serve the function as a center of socialization, consultation, discussion, research and development of Risk Management for banks and other industries in Indonesia."

Through this vision and mission, PMR consistently strives to improve the quality, competence and professionalism of the parties that have a concern for the establishment of a sound, accountable, transparent and efficient Risk Management in the finance, banking and real sectors

II.2 Benefits of Enterprise Risk Management

The available studies on ERM frequently describe many benefits of using ERM. For example, ERM allows firms to consider risk in their decision making processes, preventing the duplication of processes and reducing risk management expenses (Hoyt and Liebenberg, 2011). Organizations that incorporate ERM principals can better recognize the risks inherent in a variety of business activities. Additionally, companies that use ERM can objectively evaluate how resources can be allocated thus improving the efficiency of their capital and increase the return on their equity. Furthermore, large cash flow shortages are reduced when risk is managed using ERM (Nocco and Stulz, 2006). As well as reducing monetary losses, ERM benefits organizations because it can be used to provide investors with risk profiles. As a result, the costs associated with regulatory scrutiny and external capital are also reduced [Meulbroek, 2002).

The results of previous studies revealed that companies that embrace ERM have a competitive advantage over those organizations that rely on traditional silo approaches [Nocco and Stulz, 2006,Beasley, et al 205, COSO, 2004)

Pagach and War [2010] pointed out that ERM is a management tool that ultimately enhances shareholder value Liebenberg and Hoyt [2003] and Beasley et al. [2003] explained that ERM reduces financial distress because it identifies the negative consequences of a single risk to the organization as a whole thus allowing it to be identified and controlled. These two researchers also found that one of the greatest advantages of ERM on corporate earnings was its ability to control variable costs and revenue sources.

Overall, ERM benefits organizations by increasing stakeholder value, competitive advantage, performance, and the ability of an organization to accomplish their objectives [COSO, 2004, Pagach, 2010, Beasley, 2005, Liebenberg, 2003 Arena, 2010, Tahir and A. R. Razali, 2011, Burnaby and S. Hass, 2009, Gordon, et al 2009, Nocco and Stulz, , 2006, Donnell, 2005]

2.3 **Balanced Scorecard**

Most senior executive realize that remaining competitive in today's market requires that they consider nonfinancial measures of success because nonfinancial measures have a significant effect on investment and corporate value. The data from these measures combined with financial data lets managers and executives better control the value creation processes of their company. They also acknowledge that there is no single measure that can provide all the information they require.

Managers require balance between financial and operational measures [Banker et al, 2004]. Kaplan and Norton [1992] developed the Balanced Scorecard (BSC) as a way to measure performance in such a way

Insert Figure 5 : Balance Sorecard Perspective

The BSC combines financial measure with operational indicators on customer satisfaction, internal process, and the organization's innovation and improvement activities. It can be seen as portfolio containing interrelated indicators. It provides an easy to understand way for managers to monitor the entire organization, including its financial and organizational activities and compare approaches for improving performance (Kaplan and Norton, 1992, R. Ak and Oztaysi, 2009, Kaplan and Norton 2002). The accuracy of BSC is the result of its nonfinancial measurements (customer satisfaction, internal business process and opportunities for learning and growth) and it financial measurements (Ak and Oztaysi, 2009)

The customer perspective measures are related to issues such as customer satisfaction, customer expectations, and the quality and number of products or services (Banker et al, 2000, Ittner and Larcker, 1998). Internal .business processes are related to the producers the company uses to fulfill the needs of its customers. Typically, these processes would be those that affect cycle times, product quality, and the skills and productivity of employees or other activities related to customer satisfaction. On the other hand, employee opportunities for growth and learning are result of a competitive market that encourages companies to provide the chance for employees to obtain the skills they need to develop new products and improve existing ones. Opportunities for learning and growth add value to a company because it generates increased customer satisfaction and shareholder value while decreasing cost. Banker et al (Banker, 2004) indicated that financial measure are also the fundamental components of BSC. These components are profitability, growth and shareholder value

Consequently, the balance scorecard allows companies to employ their periodic evaluation sessions to appraise the quality of the unit's execution and the validity of its strategy by using the for perspectives. It can translate company's strategy into specific measureable and focuses overall organization on implementing the long term strategy ((Banker, 2004, Niven, 2006)

2.4 THE PRACTICALITY OF THE BALANCED SCORECARD TO PERFORMANCEMANAGEMENT SYSTEM OF COMMERCIAL BANKS

Based on the above, commercial banks Bank of evaluation index system based on the Balanced Scorecard performance management is divided into four angles:customers, business processes, financial and enterprise sustainable competitive edge. Figure 4 lists the four ndicators, as well as its sub-index Wang, Su, 2008

Insert Figure 6. The four indicators of commercial banks Bank of evaluation index system

When it develops BSC, the commercial banks should turn organizational and operational strategies into a series of objectives and measurable indicators. At this time, bank manager needs to re-examine and modify the strategy, and BSC provides the opportunity and means of communication about business strategy on the specific meaning and the implementation. At the same time, because the process of the strategy formulation and implementation of the strategy is an interactive, the bank manager can test and adjust the strategy after using BSC and knowing about implementation of the strategy.

Balanced Scorecard reflects the balance of many aspects, such as the financial and non-financial measure, long-term goals and short-term goals, external and and internal, results and the process, and management performance and operating results. Hence it can reflect the integrated operation of organizations, so that it can balance and perfect the performance evaluation, and is conducive to long-term development of the organization.

In essence the commercial banks are comprehensive, multi-function financial enterprises which is in terms of profits and operate financial assets and financial services as a target. In the current financial innovation would be difficult to produce differentiated, so the service relationship is the direction the bank want to lead to. The Balanced Scorecard can provide support in this regard:

Commercial banks should not only focus on quantitative analysis about the financial profitability, liquidity and safety but also on effective qualitative analysis about bank risk control, internal management, customer service levels when it takes performance assessment.

Qualitative analysis cannot be used with quantitative analysis, but it is exactly what the banks need to do to safeguard the healthy operation, which requires qualitative and quantitative analysis to be closely integrated. Balanced Scorecard can consider such a qualitative analysis to reveal the potential risks of operations. Balanced Scorecard has great foresight for the future development of the bank, and takes the long-term development into account, which makes banks have a high degree of adaptability and long-term strategy when they are in the face of rapidly changing business environment.

In addition to taking internal operational process into account, the external environment factors should be also considered at the same time, such as the Balanced Scorecard customer level. By considering the bank's market share, customer acquisition rates, and customer satisfaction. It takes market competition factors into the performance of management, to achieve a more truly reflecting on the bank's operations and development. he establishment of the governance mechanism for the Balanced Scorecard is shown as Figure 7.

Insert Figure 7. Governance mechanism for the Balanced Scorecard

2.5 **Enterprise Risk Management and Firm performance**

The literature of ERM often focuses on shareholder value maximization theory to measure the value on firm performance (Bartram, 2000,Casidy et al, 1990).

According to shareholder value maximization theory the primary goal of a successful organization is to maximize shareholder value (Brealy and Myers, 2002, Bartram, 2000). There most of the previous studies on evaluating value creation of ERM only focused on the financial aspect of firm performance (Hoyt and Liebenberg, 2011,). According to Acharyya (5) ther are stakeholder in the firm besides shareholder. Most notably in the financial sector customers, employees, government and social responbilities are integral components and based on the statement of many authors as COSO (2004), Acharyya (2013), Arena et al (2010), and Noco and Stulz (2006) all of an organizations significant and critical risk can not be related to capital and finance

Another point of view is that Hillman and Klein (2001) who argued that stakeholder managemen leads to create and improve shareholder value. Indeed to fulfill the calims of different stakeholders is a sign of strong management culture of proactive organizations (Barnard, 1938, Chakrayarthy, 1986). In other wors, in addition to fulfilling the economic responsibility to investors and shareholders, it is equally important to discharge the legal and the ethical responsibility to society, and the legal responsibility to the government in order to achieve sustainable long-term value for the organization.

Through ERM, management has better knowledge of the critical risks and their potential impact on the company. ERM system involves the interest of all stakeholders [Acharyya and S. Mutenga, 2013]. The organization by practicing ERM will be better prepared to manage all financial and non-financial risks and maximize its opportunities within acquisition, product and funding programs.

Above all, according to the ERM literature, practice of ERM could improve overall performance of organizations. Perhaps this relationship is supported by one of the clearest definitions provided by the Casualty Actuarial Society Committee on Enterprise Risk Management [Casualty Actuarial Society, 2003] who defined this relationship as "an area of study through which firms in an industry assesses, controls, exploits, finances, and monitors risks from all avenues in order to improve the firms' short and long-term value to its stakeholders" [Casualty Actuarial Society, 2003)

The relationship between ERM and performance has been evaluated by several empirical researches [e.g. Tahir and Razali, 2011, Gates, et al 2012, Gordon, 2009, Pagach and War, 2010. For example, Hoyt and Liebenberg [2011] calculated the rate at which organizations adapted ERM and then determined the values incurred as a result of adapting ERM. One hundred and seventeen American insurance companies were used in the study conducted by Hoyt and Liebenberg [2011] and the natural logarithm of Tobin's q was used to represent value of organization. The authors discovered that ERM was positively correlated to the size of a company, its international diversification, and institutional ownership and the values of the organization. In another study among 528 Malaysian public listed corporations, the authors found that ERM is positively correlated to organization value but insignificant and unlike Hoyt and Liebenberg [2011], they found that there was a negative relationship between ERM and the size and profitability of a company [Tahir and Razali, 2011].

Malaysian public listed companies were also investigated in another study with the purpose of determining if ERM could be used to improve a company's total economic value. The author interviewed risk managers from 20 different companies. The aforementioned participants reported that ERM improved the financial value of their companies. They provided the following examples of how ERM benefited their organizations:

- ERM encouraged top management to be committed and transparent.
- ERM enabled management to become more systematic in terms of risk management.
- The leadership and the support of top management were more visible.
- ERM resulted in competency being created within the system.
- Employees were better educated and trained regarding risk management.
- ERM encourages the development of a risk aware corporate culture [Grace, et al 2010].

The primary objective of a study conducted by Gordon et al. [2009] was to determine how ERM was connected to performance by examining one-year excess stock market earnings of shareholders of 112 American companies. They not only determined that ERM enhanced performance but they discovered that the association between ERM and performance was indeed reliant on a proper match between ERM and five factors including industry competition, environmental uncertainty, company size, company complexity, and the monitoring of board of directors.

In addition to the above, another study examined how ERM impacted the long term performance of 106 publically listed American companies. They looked at economic indicators, assets, and market characteristics and found that there was no significant indication that ERM was strongly linked to values of the company. In addition, they found little evidence that risk reduction was linked to the income of a corporation [Pagach and Warr, 2010].

Moreover, Grace et al. [2010] studied the impact of ERM on an organization by assessing its effect on income efficiency and organization cost in the U.S.A insurance industry. Like Gordon et al. [2009], Grace et al. [2010] found that ERM enhanced the performance of organizations, at least in terms of its operating performance. Higher levels of performance were associated with those companies that employed chief risk officers, had dedicated risk committees or other risk management entities that reported to the chief financial officer.

In a Malaysian study, Manab et al. [2010] looked at the interaction of ERM, corporate compliance with regulations, and the creation of value for 55 publically listed companies. Their results indicated that organizations were interested in ERM concepts and they also found ERM enables firms to manage the bottom line and defend shareholder value, where its adoption indirectly affects the organization value.

The connection between the degree of risk management activity in a company and performance was studied by McShane et al. [2011]. The performance of 82 publically traded Insurance companies in America was examined. They utilized Standard and Poor's as a newly available tool to analyze the linkage between the extent of risk management execution and company performance. The authors discovered that there was a positive association between conventional risk management techniques and increased company value but they found no such relationship between ERM and company value.

Gates et al. [2012] recently conducted a study that gathered data from 150 companies operating in the United States to determine the practical value of ERM processes in terms of improved management and performance. Their results revealed that ERM techniques improved decision making and increased accountability, which consequently lead to improvements in the company’s ability to meet their objectives, decrease income volatility and increase production.

In another study which adopted data from 500 largest Brazilian firms, the authors indicated that increasing performance depends on the level of stakeholders’ involvement in risk management and maturity level of managing risk [Souza, et al 2012]. In the recent study, Aebi et al. [2012] investigated whether risk management-related corporate governance mechanisms, such as the presence of a chief risk officer (CRO) in a bank’s executive board and whether the CRO reports to the CEO or directly to the board of directors, are associated with a better bank performance during the financial crisis of 2007/2008 in the US. Results of the aforementioned study showed that banks, in which the CRO directly reports to the board of directors and not to the CEO (or other corporate entities), exhibited significantly higher (i.e., less negative) stock returns and ROE during the crisis. The next section of this study provides a model using Balanced Scorecard as a proxy for measuring the relationship between ERM and firm performance

III. Conclusion and Proposed Model

Whereas in the efforts of maintaining the resistance of the soundness banking system, Bank needs to take steps in improving good corporate governance. As one of the steps in implementing the good governance principles, it is deemed necessary for bank to arrange and establish a strategic target and a set of corporate values. In after, the strategic target and the corporate values referred described further in the business plan, as a foundation and guideline to implement the operational activity according to bank's vision and mission.

In order to achieve the goal according to the vision and mission, the arrangements of bank's business plan needs to be well done and realistic by still paying attention to the prudential priciples and the application of the risk management. In addition, the planning must be done by bank comprehensively so that it reflects complexities of the business as well as able to accommodate the direction of bank's business development. A comprehensive business plan also may increase the flexibility of bank's operation in facing a rising business competition.

In arranging a business plan, bank should also consider the external and internal factors which either directly or indirectly may influence bank's business activity in order to be able to produce a realistic plan. A realistic business plan is one of the efforts in implementing risk management effectively, a strategic risk in especially.

In the Balanced Scorecard governance mechanism, it requires banks to set up bank management committee and sees it as core. It owns the final right of approval of the Balanced Scorecard framework, content and design of, so as to ensure the accordance between implementation point of the business and banks strategy.

The establishment of performance goals assessment and feedback processes. The process includes two aspects: First, to understand the strategic objectives implementation by checking the completion of the indicators in the Balanced Scorecard system of the banks; on the other hand, to check the operation of the Balanced Scorecard in order to balance Scorecard design and feedback and review process.

With constantly updating of information technology, commercial banks will inevitably change in service model, in order to adapt to the trend of social development. Of course, that will depend on improvement of information security technologies, so that banks can continue to innovative financial products, and enhance core competitiveness. New model of banking services is based on the connotation of the knowledge based economy and oriented in enhancing the traditional service level of knowledge and cultural grade. and will promote the services of thinking and mode.

To update mode of banking services can broaden the field of financial services, and improve the quality and the efficiency of financial services. To achieve innovation model, it is necessary to improve the "Smile" services, personal mechanism and incentive mechanism. We should speed up the reform of financial supervision, improve the level of financial supervision in order to adapt to the development of the new banking services model and respond to changing in financial innovation. The banking industry should also accelerate the transformation of service delivery model to accelerate the pace of mixed services to enhance international competitiveness.

In conclusion, the extent literature reveals that there are an insufficient number of ERM empirical studies in developing countries. In other words, most of the ERM studies have been carried out in developed countries such as U.S.A. On the other hand, the real impact of the ERM on firm performance is still questionable. This is because of contradictory findings on this relationship, as mentioned in detail above.

Furthermore, most of the previous studies have considered only financial aspects of firm performance while measuring and improving overall firm performance is a combination of both monetary and non-monetary aspects and in reality, there are no strict dividing lines between financial and non-financial performance [Cater and Cater, 2009]. As stated earlier a measurement system which considers only the financial performance of an organization while ignoring the non-financial aspects is not robust in today’s knowledge driven economy [Kaplan, 1992, Banker, 2004 , Kaplan and Norton, 2001, Acharyya and S. Mutenga, 2013].

Another finding obtained from review of the literature clarify that previous studies of ERM did not consider BSC as a measurement of firm performance because of its large number of variables [Jafari, et al, 2011, Gordon, 2009], but according to Acharyya and Mutenga [2013], ERM is a holistic method therefore it has to affect all aspects of performance in a firm not only financial, and productivity and profitability. Beasley et al. [2006] claimed that ERM and the BSC systems have common elements such as both ERM and the BSC focus on strategy, have holistic perspective, emphasis on interrelationships, for both to be successful they should be Top-Down emphasis, and both are designed for ongoing, continuous processes. Accordingly, using a strategy oriented performance measurement such as BSC would be an effective way to collect data regarding the precise effect ERM has on an organization.

Therefore, from the discussion so far, we propose the following model and hypothesis for future empirical studies:

H1) ERM has a positive and significant effect on overall firm performance

H1a) ERM has a positive and significant effect on customer satisfaction

H1b) ERM has a positive and significant effect on learning and growth

H1c) ERM has a positive and significant effect on internal business processes

H1d) ERM has a positive and significant effect on firm financial performance

Insert figure 8 : Conceptual Framework

It is worth noting that future empirical study based on this proposed model will be carried out by the authors in Iran as a developing country which faces different economic sanctions and therefore much more risks and hazards. The only institutions which will be included in the study are 72 companies in the financial sector which implemented ERM as well as companies listed in Iranian central bank and central insurance websites. This sector has been chosen because financial firms are among the first companies to adopt and implement ERM system and hire chief risk officer [Beasley, et al, 2005, Hoyt and A. P. Liebenberg, 2011, Platt, 2004]. The survey approach will be used for gathering data. The respondents of the study will be top managers and risk managers because they are directly involved in the management of organizational affairs and have firsthand knowledge of organizational improvement processes and risk management information.

There is also some limitation for this study. For example, as stated before, using the BSC is complex and much more time is needed to collect data because of the large number of variables. Moreover, identification of companies which are engaged in ERM is difficult. Firms typically do not disclose whether they are managing risk in a disaggregated or ag aggregated manner. Nonetheless, these limitations will not deter the motivation to complete such this research

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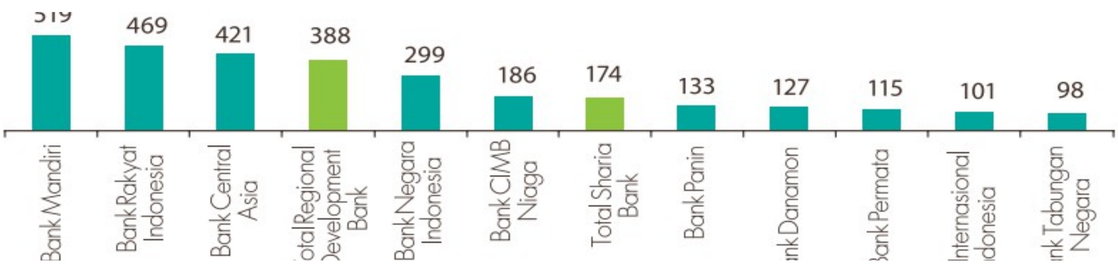
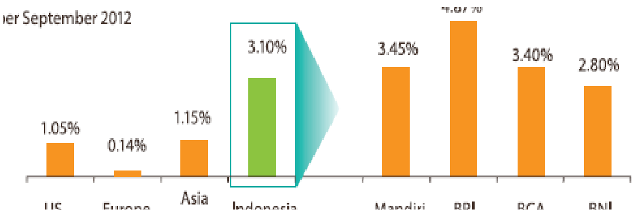
Figure

Graph 1 Banking Asset Growth

Commercial Bank	15%
Regional Development Bank	22%

Graph 2. Banking Asset (IDR Trillion)





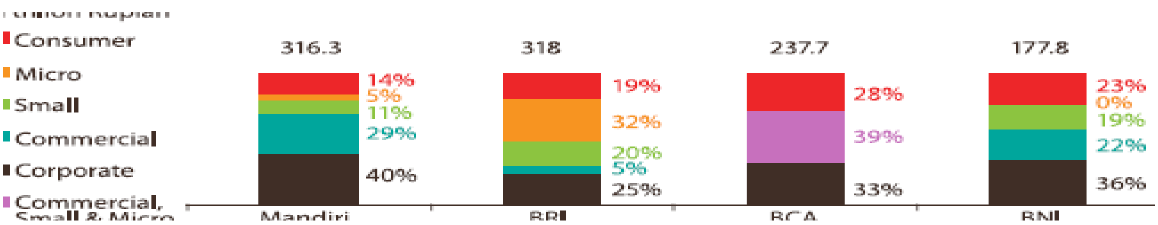


Figure 4 : Risk Analysis

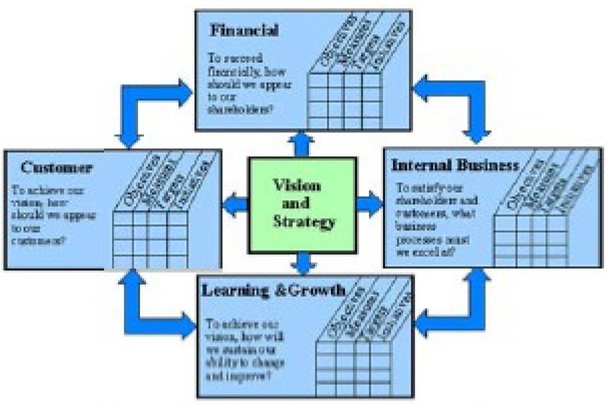


Figure 5 : BalanceScorecard Perspective

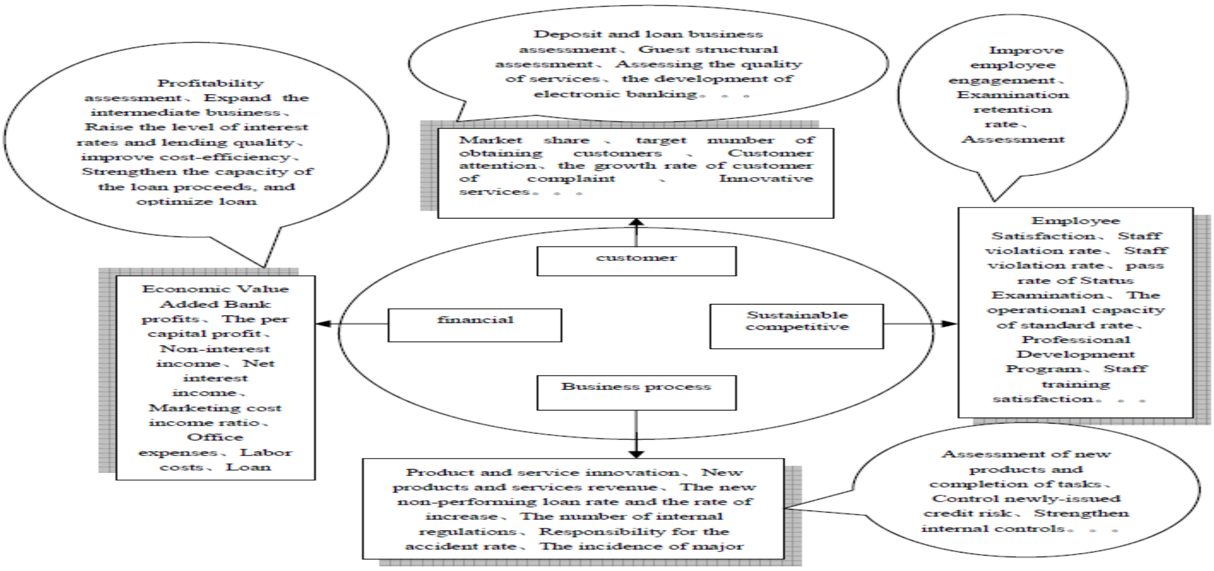


Figure 6 : . The four indicators of commercial banks Bank of evaluation index system

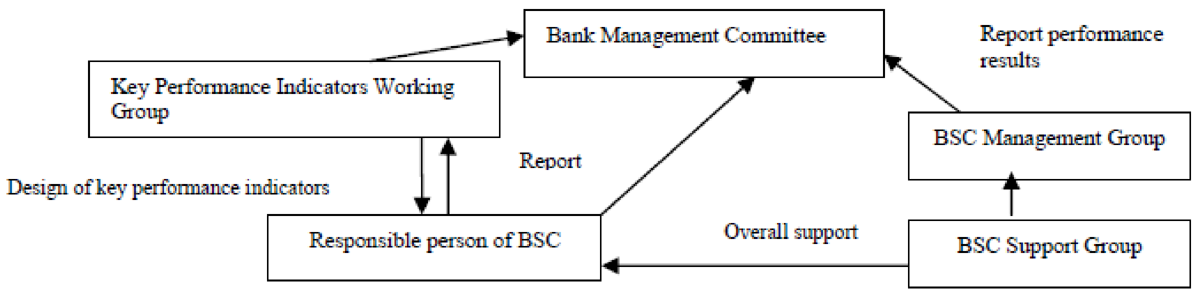


Figure 7. Governance mechanism for the Balanced Scorecard

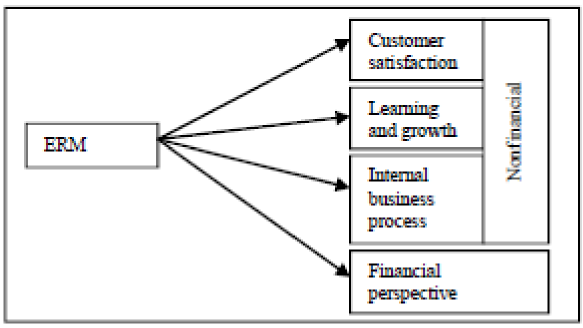


Figure 8. Conceptual Framework