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RISK MANAGEMENT AND ORGANIZATIONAL PERFORMANCE: NEW REVISION OF QMS ISO 9001:2015

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ABSTRACT

Quality management system (QMS) ISO 9000 is a major contribution to achieving local and global competition in the industry. Applying the principles of quality management system and adoption of risk management strategies can help the organization sustainable in their business. Moreover, identifying at early stage the potential risk can have consequential results such as eliminating defects, reducing cost, meeting customer satisfaction and also promoting organization sustainability. In this study, a model that has tendency on how the risk management in the new revision of quality management system (QMS) ISO 9001:2015 can influence the organizational performance is conceptually proposed.

Keywords: Risk management, organizational performance, MS ISO 9001:2015

INTRODUCTION

In this decade, risk management plays important role in organizational sustainability. Furthermore, increasing the pace of business change in product or services requires the organization to put risk management as the main agenda in their company objectives to achieve sustainability in business (Sun et al., 2010). Today's business strategies have no longer merely depended on the quality of products not only in meeting but also exceeding customer expectations (Mohd Akhir & Rushami, 2014). Furthermore, the revised of quality management system ISO 9001:2015 is designed to involve risk management as part of the strategic plan in an organization. In addition, new embedded quality management system ISO

9001:2015 would only be successfully implemented in an organization if top management were committed to adopted risk management into their organizational strategies. Moreover, this paper explores the impact of risk management of quality management system ISO 9001:2015 on organizational performance.

LITERATURE REVIEW

This literature review discusses the QMS (quality management system) of ISO 9001:2008 and the newly revised QMS ISO 9001:2015. The study also proposes a risk management model based on PDCA concepts and recommends the involvement of the processes of risk management. Finally, it discusses the impact of ISO 9001:2015 risk management on organizational performance and their managerial implication.

Quality Management System (QMS) ISO 9001:2008

The International Organization for Standardization (ISO) is an organization based in Geneva, Switzerland responsible for ISO 9000 standards (Abraham et al., 2000). The standard will benefit to organization in term of customer focus and suppliers management. According to Pinto et al. (2008) this standard can use as reference for quality management in organizations.

As a result, the percentage of organization that obtains certification of QMS ISO 9000 has increased tremendously since 1990. In fact, it could reach up to more than 1 million globally. Nevertheless, there are many reasons why the organization considerably in an effort to gain QMS ISO 9000 certification by third party. Among the reasons are management control procedure (Yahya & Goh, 2001), design approaches and production process in enhancing customers' satisfaction (Quazi et al., 2002), and organizational performance (Mohd Akhir & Rushami, 2014). For example, Najmi and Kehoe (2001) claimed that QMS ISO 9000 will create competitive advantage, cost reduction and market share increase. Fuentes, et al. (2000) stressed that QMS ISO 9000, an international recognized standard, is a fundamental of TQM (total quality management) and is, associated with customer satisfaction (Davis & Manrodt, 1996).

The QMS ISO 9001 emphasizes more on process approach in enhancing quality management in an organization (Rusjan & Alic, 2010). The construct of QMS ISO 9001 is based on eight quality principles (Cargill, 2001; Russell, 2000) and six important procedures. Furthermore, the improvement QMS ISO 9000 has been reviewed with the inclusion of risk management in a context of an organizational performance. Thus, this concept paper is to find out the significant impact of risk management towards organizational performance.

Quality Management System (QMS) ISO 9001:2015

The newly reviewed QMS ISO 9001:2015 emphasizes on the risk management as a preventive strategy in business to enhance customer satisfaction, reduce defects and gain competitive advantage (Sun, 2000). Instead of a process approach, the implementation of risk management QMS ISO 9001:2015 will give advantage to the organization in terms of business sustainability and customers' satisfaction. It is good for an organization to implement QMS ISO 9001:2015 in achieving the next step of best practice (Prabhu et al., 2000). Moreover, the reviewed QMS ISO 9001:2015 have seven principles compared to

previous QMS ISO 9001:2008 which had eight principles with additional emphasis on risk management.

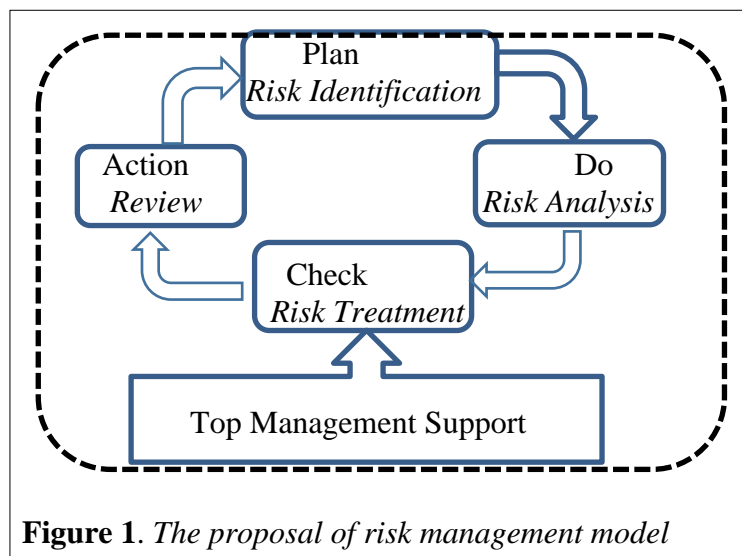
RISK MANAGEMENT

According to ISO 31000, the definition of risk is the effects of uncertainty on the objectives. Moreover, Merna and AL Thani (2011) defined risk management a set of actions by the organization to eliminate it from arising.

Risk management in QMS ISO 9001:2015 is considered as most interesting and important agenda in the stages of planning, implementing and maintaining of products or services. History has proven that risk management involved various stages until it matured in corporate, strategic business and project management. Ward and Chapman (2003) argued that the risk management should be divided into eight phases namely defining the risk, planning the risk, focusing on the risk, structuring the risk, risk ownership, estimating the risk and finally, risk evaluating the risk. This study will discuss risk management framework model based on three aspects known as risk identification, risk analysis and risk treatment.

RISK MANAGEMENT MODEL

Risk management should incorporate the top management of the organization in the way they respond to ensure best practices in the organizations. The fundamental of risk management is based on PDCA (Plan Do Check Action) cycle, where the framework model is proposed in this study. This is supported by four pillars. The first pillar is the planning stage. In this stage, the risk management is identified based on previous history, customer feedback, and review input from various reliable sources. The second pillar is doing, where at this stage, risk analysis is made to quantify the categories of risks. At this stage, the identification of risk will be prioritized according to the value of grading. The third pillar is checked where the risk management is identified at the stage of risk analysis. This will minimize the risk impact by implementing the task to eliminate risk occurred. And finally, the forth pillar is an action pillar reviewing the implementation and effectiveness, risk management team that align to the organization strategies and objectives in order to achieve minimum risk impact towards organizational performance.



The enforcement of the risk management at all levels of the organization is a very demanding task. It requires total participation, and integration with risk management of all team members. Meanwhile, leadership or top management should formulate the strategy and employ a capable staffs to oversee risk management. Furthermore, this study recommends that the risk management should begin by identifying potential risk, making risk analysis and finally, risk treatment as shown in Table 1.

Table 1.

The difference between MS ISO 31000:2010 and proposed in this study.

Standard	Risk Context	Risk Identificat	Risk Analysis	Risk Evaluation	Risk Treatment	Risk Consultati	Risk Monitorin
MS ISO 31000:2010	x	x	x	x	x	x	x
Proposed by the author		x	x		x		

Risk identification

Risk identification is the process to identify the potential risk that may occur at each stage. This stage of risk identification it should involve with internal and external factors that will have an impact on product or services (William et al., 1998). Basically, the risk identification process is the first stage of risk management. It should start with basic questions on how and what risk identification that can effect organizational performance. Practically, despite being internal process of risk identification, it is also important to consider the needs of the stakeholder.

Risk analysis

The next stage is the risk analysis, stage when the potential risk that relevant the risk is identified (Fagan, 1991). The process of risk analysis should be traced to each level of activities and be defined clearly in the context of risk analysis score. Various techniques can be used in analyzing risk within the organization. This study recommends that risk analysis uses (RPN) risk priority number as mentioned in Table 2. It defines severity, probability and detection (Inoue & Yamada, 2010). The highest scores of RPN number assures the risk analysis, on the actions of the organization that should be given more focused to prevent and correct the potential risk respectively.

Table 2.

Definition on types of analysis.

Types of analysis	Definition (Estorilio & Posso, 2010)
Severity	The consequences of a failure mode. Severity considers the worst potential consequence of a failure, determines by the degree of injury, property damage, system damage or time lost to repair the failure.

Probability	The probability of the event occur
Detection	The means of detection of the failure mode by the maintainer, operator or built in detection system including an estimated dormancy period (if applicable)

Note: *Risk Priority Number (RPN) is severity * probability * detection.*

Risk treatment

Risk treatment is the final stage of risk management. This stage requires the activities of recognizing, evaluating the risk as well as the action that must be taken to avoid the occurrence of risk. Therefore, risk treatment activities must be based on the RPN number. The seriousness of the risk effects on organizational performance must be eliminated and the team members must examine all action that can be taken to reduce the risks and analyze their viability. Proper documentations are also required. This stage requires the leadership or top management to develop a team of risk management at all levels of the organization. The top management also incorporates risk treatment process, delegation of the tasks, and the enforcing of risks (Kausen, 2003). Moreover, it is important that the team is able to access any value-added process from previous record or data.

The impact of risk management on organizational performance

There are several impacts of risk management on organizational performance. Structured and well organized implementation of the risk management can lead to improve organizational performance. However, it depends on how top management plays the role in enhancing risk management strategy in the organization at all levels of company-wide. Meanwhile, according to Gilbert and Eyring (2010) the minimized risk will deal with the consequences. In this context, proper risk management will have significant impact on organizational performance.

The advantage of risk management is gaining importance because business is moving towards globalization which can increase competition (Ahmed et al., 2007). This study recommends that risk management should be based on the identification of risk, risk analysis and treatment of risk. Furthermore, by implementing risk management the organization can reduce unexpected risks that can cause the loss in the market share. The integration of risk management in quality management system ISO 9001:2015 is very important to manage integration, information within risk management team member for decisions, and thus, improve risk management achievement of the organization objectives.

CONCLUSION AND MANAGERIAL IMPLICATION

Today's business environment have faced higher levels of uncertainties that these companies need to plan for possible responses to unforeseen risk management. Therefore, there are needs to implement risk management involving all members in the organization. As a result, it can comprehensively impact organizational performance. Without any doubt, the newly revised ISO 9001:2015 requires the organization to define its contexts and risk management plan in their process or product. The sense of complexity of products or services provided by an organization requires comprehensive risk management implementation to break down into component parts as interaction until it completed products. Furthermore, the more complex the products are, the more difficult to see the risks that threaten the business. Therefore,

continuous improvement in risk management can be amplified and interlinked as required improvement activities as proposed framework of this study towards newly revised ISO 9001:2015.

In conclusion, managerial implication of the newly revised of ISO 9001:2015 is targeted to improve business uncertainties in the future. Therefore this is the right time for the top management in the organization to implement the strategies to acquire proper implementation of risk management. In addition, it is very clear that risk management requirement of newly revised ISO 9001:2015 is highly influencing the organizational performance.

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