Does Risk Based Thinking Matters to Support Business Sustainability

A Workshop Provided for Community of Forum Standardisasi Indonesia

Firdaus Basbeth

Sekolah Tinggi Manajemen Ipmi, Jakarta, Indonesia 12750

Author E-mail: firdaus.basbeth@ipmi.ac.id

ABSTRACT

Risk can appear in any form such as environmental risk, business risk, and health and safety risk. Many companies especially in manufacturing sectors are generally familiar with the process of identification, evaluate and control the environmental, health, and safety risk predominantly at the operational level to keep their process safe for the people and environment. However, when it comes to business risk, the company's understanding, method, and level of implementation should be adjusted to achieve business objectives and fulfill requirements implied in the new IS 9001:2018 quality standards. Although there are
INTRODUCTION
Risk-based thinking is essential to achieving an effective quality management system (Sæstad, 2017). The concept of risk-based thinking has been implied in quality management system standard that has been adopted in many countries around the globe, including, for example, taking precautions to eliminate potential nonconformities, analyzing any nonconformities that occur, and taking action to prevent them from recurring (Mukhibat, 2020). Risk is generally defined as negative things while uncertainty that can bring additional benefits if it occurs is known as "opportunity" (Benjamin, 2017). Risk can appear in any form such as environmental risk, business risk, and health and safety risk. The activities to reduce and mitigate any risk in the organization will start with the identification of every activity in the process that can be harmful to people, profit, and the planet. The process and activities should be controlled to reduce the risk as low as possible and put procedure and standard to maintain the indicator low (Muschara, 2017). While the process of risk identification and mitigation is become clear in the area of health, safety, and environment, in the business process the activities become a bit different because instead of dealing with negative threats, it is also important to seek and maximize opportunities, to optimize the achievement of goals. Some organizations may choose to consider risks and opportunities as organizational or operational; and some are prioritizing at the management level. When treated in this way, the organization's risks and opportunities can often be addressed through quality objectives and specific improvement projects, for example applying new technology. Operational risks and opportunities can be addressed through process management, for example, delivery performance. Therefore, to introduce the concept of Risk-Based Thinking (RBT) and explain how the risk management implied in any company can help reduce risks and increase opportunities (Ezrahovich, Vladimirtsev, Livshitz, Lontsikh, & Karaseva, 2017). The RBT can be implemented in any area in the organization for example in the organization structure, in strategy and the system, or 3S (Figure.1).

As can be seen in Fig 1, an organization can use risk-based thinking through the formulation of an organizational context and determines the problems and requirements that can affect it, then identifies risks and opportunities, implements actions to address risks and opportunities, and integrates actions into the QMS process, and evaluates the effectiveness of actions taken to address risks and opportunities.
Organizations are required to improve by responding to any poor performance and changes in risk. Concerning Quality Management System ISO 9001: 2015 clause 10, the organization is required to reduce the risk, and eliminate the cause that causing poor-risk performance (Standardization, 2015). While the requirements seem obvious in health safety and environmental management, the organization practicing a quality management system would ask whether they need specific documented risk management in every process and record to demonstrate conformity.

There are no special requirements for the organization to maintain or retain documented information related to actions to address risks and opportunities. Organizations can choose to do so and this will be influenced by the size and nature of the organization (Ezrahovich et al., 2017). In addition to process risks, it is also shown how to identify safety and environmental risks and evaluate risks using a risk matrix and reduce risks using a risk reduction hierarchy (Asbury, 2013). Many organizations have maintained lists of risks and opportunities but cannot manage them properly. Equipping oneself with knowledge related to risk management then becomes very important. By knowing the requirements, leaders can make plans to identify, evaluate, and improve their supervisory systems and determine more precise policies. What is important for management is that risks are suppressed so that profits are high enough, how to work efficiently, assets are safe and well maintained, a healthy capital structure and that the company has a good plan for the future, both at the strategic and operational levels.

**METHODS**

The activity was held by zoom online on 28th of April 2020, with the cooperation of Forum Standardisasi Indonesia (FSI), an organization based in Surabaya East Java, which focuses on the implementation of international standards and providing service for an organization that seeks any help in improving their performance. A flyer was made as an invitation and was distributed by the WhatsApp group before approval by the head of FSI. The target audience selected in the Risk-Based Thinking workshop activities are members of the Indonesian Standardization Forum (FSI) communities. Most of them are consultants and middle managers in manufacturing companies from several cities throughout Indonesia such as Jakarta, Yogyakarta, Makassar, Bandung, and Semarang. This workshop activity is carried out in three stages (Figure 2).

In the first stage, the facilitator explains the workshop material to introduce the concept of RBT. In the second stage facilitator introducing the tools that can be used in RBT, next in the third stage participant was asked to do an exercise by identifying risk in a certain case. In the fourth stage, the facilitator provides an opportunity for
questions and answers and in the fifth stage, the workshop is carried out by involving the workshop participants in a simulation of making risk identification and risk assessment. The cognitive aspect of the participants was obtained through a pre-test and post-test in the google form and the data analyzed using an excel spreadsheet.

RESULT AND DISCUSSION

Based on pretest and posttest conducted in this workshop, the knowledge and understanding of the importance of understanding Risk-Based Thinking were increased. Several factors support the implementation of this workshop activity, including the great interest and enthusiasm of the participants during the activity, so that the activity has commenced smoothly and effectively. A total of 100 people had registered and 89 were present at the time of the workshop. The improvement of knowledge level about RBT is shown in Figure 1.

Based on observations before, during, and after participating in training and direct observation during this training activity, the following results were obtained:

1. Increase employees' knowledge and understanding of the importance of understanding Risk-Based Thinking. Participants understand the importance of RBT and its difference in risk management.
2. Improve the ability of participants in identifying organizational contexts to see opportunities and threats through PESTLE and SWOT technical tools (Figure 4)
3. Improve the ability of participants in making risk identification lists for each process. Participants can show a list of risks in the process and show how they are controlled
4. Improve the participants' ability to evaluate risks using a risk matrix. Participants can evaluate each risk using the risk matrix as shown below
5. Improving the ability of participants in making priorities and determining action plans based on a hierarchy of risk reduction, as can be seen in Figure 6

Several factors support the implementation of this training activity, including the great interest and enthusiasm of the participants during the activity, so that the activity runs smoothly and effectively. A total of 100 people had registered and 89 were present when the facilitator presented the material. While the inhibiting factor is the limited training time.

After the workshop has finished, all participants and facilitator have given a certificate from the FSI as an appreciation of the effort in sharing knowledge and skills to Forum Standardisasi Indonesia.
**Figure 4.** Tools to identify risk at a strategic level

Source: (Asbury 2013)

**Risk Assessment Matrix**

| Effect       | Negligible | Marginal | Significant | Critical |
|--------------|------------|----------|-------------|----------|
| Likelihood   |            |          |             |          |
| Very high    | Serious    | Serious  | High        | High     |
| High         | Medium     | Serious  | High        | High     |
| Significant  | Medium     | Medium   | Serious     | High     |
| Low          | Low        | Low      | Medium      | Serious  |
| Very low     | Low        | Low      | Medium      | Medium   |
| Almost impossible | Low      | Low      | Low         | Medium   |

**Figure 5.** Risk matrix

Source: (Ezrahovich et al., 2017)
CONCLUSION AND RECOMMENDATION
Risk-Based Thinking is a very important mindset to have, a tool to implement and it is a very compatible concept with several other “hard” standards such as environmental management system (ISO 14001) and health and safety management system (ISO 45001). Companies can integrate the requirements of those three standards through one platform of thinking named risk-based thinking (RBT). Through Risk-Based Thinking, stages can be made to meet the requirements of several standards, such as QMS, EMS, Safety, and Energy Standards, which require companies to identify, evaluate, control, and make improvements to the management system. The discussion and workshop session on the importance of understanding Risk-Based Thinking have improved the knowledge and understanding of members of the Indonesian Standardization Forum (FSI), in terms of identifying, evaluating, and controlling any form of risks for business sustainability. For personal needs and self-improvement, a mindset of risk-based thinking would be also valuable and can be a helpful tool to achieve personal goals.

The workshop was conducted in a short time, therefore assessment in the improvement of skill in terms of using the tool of risk assessment is recommended for future research or workshop, as well as the implementation in the company to see the improvement for both personal skills and company performance.

DAFTAR PUSTAKA
Asbury, S. (2013). Health and Safety, Environment, and Quality Audits: A risk-based approach: Routledge.
Benjamin, A. S. (2017). Enterprise risk and opportunity management: Concepts and step-by-step examples for pioneering scientific and technical organizations: John Wiley & Sons.
Ezrahovich, A. Y., Vladimirtsev, A. V., Livshitz, I. I., Lontsikh, P. A., & Karaseva, V. A. (2017). Risk-based thinking of ISO 9001: 2015—the new methods, approaches and tools of risk management. Paper presented at the 2017 International Conference “Quality Management, Transport and Information Security, Information Technologies”(IT&QM&IS).
Mukhibat, M. (2020). Development of A Quality Management System Through Risk-Based Thinking. PalArch’s Journal of Archaeology of Egypt/Egyptology, 17(3), 529-543.
Muschara, T. (2017). Risk-Based Thinking: Managing the Uncertainty of Human Error in Operations: Routledge.
Sæstad, M. (2017). *Risk-Based Thinking in Quality Management, an ISO 9001: 2015 Requirement: A case study to identify underlying elements enabling risk-based thinking in organizations*. Universitetet i Agder; University of Agder,

Standardization, I. O. f. (2015). ISO 9000, 2015. Quality management systems—fundamentals and vocabulary. In.