Sustainable Development and New Revision of ISO Management Standards

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Abstract. The World Commission for Environment and Development defined sustainable development as a process of change in which exploitation of resources, new investments, concentration on technology development, and institutional changes are focused on present and future needs of society. Managers need to think about the future because they need to make decisions. Decisions are, by definition, about future events. There are many ways of thinking about the future. This article is guided by the concept of the “corporate sustainability”—a conceptual framework supported by new revision of ISO management standards (ISO 9001:2015, ISO 14001:2015, ISO 45001: xxxx)

Introduction

Sustainable development (SD) is a broad, dialectical concept that balances the need for economic growth with environmental protection and social equity. The term was first popularized in 1987, in the report published by the World Commission for Environment and Development. In the report, SD was defined as a process of change in which exploitation of resources, new investments, concentration on technology development, and institutional changes are focused on present and future needs of society. Now sustainability is rapidly becoming mandatory for business. Managers can no longer afford to ignore sustainability as a central factor in their companies’ long-term competitiveness. A number of authors have discussed the strategies for the integration of SD into business processes [1, 2, 3, 4], including efficient use of resources [5] for providing stable and sustainable development in contemporary business environment.

This article aims to identify the corporate sustainability requirements to be inserted in the management systems proposed by International Organization for Standardization (ISO). The standards considered in this article are ISO 9001:2015 (quality management systems), ISO 14001:2015 (environmental management systems), and the ISO 45001: xxxx (Occupational Health and Safety management systems).

Corporate Sustainability

Sustainable development was initially conceived as a concept applicable to the global level. However, the term is increasingly being applied in a corporate context. Although the term corporate sustainability has gained increased attention over the past few years, there is no universal definition for the concept. By [6] the concept of corporate sustainability is defined as “meeting the needs of a firm’s direct and indirect stakeholders(...)without compromising its ability to meet the needs of future stakeholders as well.” According to [7] corporate sustaina-
bility is a combination of economic success, environmental protection and social responsibility. However, regardless of the definition adopted corporate management for sustainable development is emerging as a core competency for business leaders, the way to make their company stable and mature [8]. The ability to create value from, and mitigate risks associated with, sustainable development increasingly impacts markets, access to capital, company reputation and shareholder value. Managers who understand the need for a strategic approach to corporate sustainability management will perform across the 'triangular bottom line' of environmental, social and financial performance to preserve value and create new business opportunities.

The question is what actions individual companies can take to achieve sustainability? Review of literature on the subject provides recognition of the three groups of strategies [9]: (1) approach based on international and national standards, and integration of standards, (2) approach based on business excellence models, and (3) other approaches, benefiting from various elements of various management ideas.

Do standards published by ISO, such as ISO9001, ISO14001 and to-be-published ISO45001 can support enterprises in their struggle with challenges and requirements of sustainable development?

**New Edition ISO Management Standards**

By [6] sustainability challenges represent the ability to meet the organization’s responsibilities with respect to environmental stewardship, social well-being, and the economic prosperity of the organization and the community as a whole. In recognition of these challenges, a number of management standards have emerged to help managers systematically address those requirements. After the introduction, in 1987, the ISO 9000 series of standards for quality assurance, other standards were developed for environmental management (ISO 14001) and health and safety (OHSAS 18001) and corporate social responsibility (ISO 26000). As more and more organizations implement multiple management systems so the need to implement and maintain them more efficiently has grown. This has led to the creation of a common framework for all new ISO management system standards which is referred to as Annex SL (fig. 1).

![Figure 1. Annex SL scheme.](image-url)

Annex SL applies to all management system standards, such as full ISO standards, Publicly Available Specifications and Technical Specifications. All management system standards of the future will have the same high level structure, identical core text, as well as common terms and
definitions. For actual and potential users of ISO management standards, the biggest changes involve requirements to:

(1) Describe the “organization” and its internal and external contexts. The organization is required to identify explicitly any external and internal issues that may impact their management system’s ability to deliver its intended results. An organization’s external context includes its outside stakeholders, its local operating environment, as well as any external factors that influence the selection of its objectives (goals and targets) or its ability to meet its goals. An organization’s internal context includes its internal stakeholders, its approach to governance, its contractual relationships with its customers, and its capabilities and culture [7].

(2) Identify need and expectation of internal and external stakeholders. Stakeholder Theory by focusing on the importance of a firm’s relationships with critical stakeholders that may lead to better performance, as organizations that integrate business and societal considerations create value for their stakeholders. Stakeholders theory is the one of the main theories supporting the business case for sustainability. According to [10], the aim of organizational sustainability will be accomplished if the organization can continue to meet the wants and expectations of the stakeholders. According to [11], global sustainability will only be promoted if organizational sustainability is achieved without compromising the ability of interested parties to meet their needs, both present and future. Completing internal and external environment helps the organization to understand and find ways to deal with the context.

(3) Identify the processes needed for the management system. The process approach can be applied to any organization and any management system regardless of type, size or complexity. A major advantage of the process approach, when compared to other approaches, is in the management and control of the interactions between these processes and the interfaces between the functional hierarchies of the organization. Risk analysis tools may be employed to identify potential problems. The root cause(s) of these potential problems should also be identified and eliminated, preventing occurrence in all processes with similarly identified risks. Maintaining and improving process performance can be achieved by applying the PDCA concept at all levels within an organization. This applies equally to all processes, from high-level strategic processes to simple operational activities.

(4) Recognize the need to understand risk as a means of effecting change. International management system standards have created a means for determining the context of each organization in order to create a framework for managing the operational, regulatory, and reputational risks. Risk can be viewed as the chance of something happening that will change the organization’s planned outcomes, and can be both negative (threats and losses) and positive (opportunities). Risk-based thinking is a part of process approach and is used to: decide how risk is addressed in establishing the processes to improve process outputs and prevent undesirable results; define the extent of process planning and controls needed (based on risk); improve the effectiveness of the management systems; maintain and manage the systems that inherently addresses risk and meets objectives. Risks affecting organizations can have consequences in terms of economic performance and professional reputation, as well as environmental, safety and societal outcomes. Therefore, managing risk effectively helps organizations to perform well in an environment full of uncertainty.

In 2015, ISO published the next edition of ISO9001 standard entitled “Quality management system-requirements” and ISO 14001 “Environmental management systems-Requirements with guidance for use”. The standards are structured according to guidelines presented in the
Annex SL. ISO 9001 is a standard that sets out the requirements for a quality management system. A quality management system is a way of defining how an organization can meet the requirements of its customers and other stakeholders affected by its work. ISO 9001 now requires that top management take a strategic approach to the management system by ensuring that firstly the strategic direction of the organization has been determined. The strategy should take into account the sustainability of the organization for the near and long term future. ISO 9001:2015 is focused on economic development by delivering product which satisfies client requirements. The next standard to be discussed is ISO 14001. The new edition of the standard introduced in 2015 includes the requirements concerning environmental issues: environmental management to be more prominent within the organization’s strategic direction; a greater commitment from leadership; the implementation of proactive initiatives to protect the environment from harm and degradation, such as sustainable resource use and climate change mitigation; a focus on life-cycle thinking to ensure consideration of environmental aspects from development to end-of-life and the addition of a stakeholder-focused communication strategy. According to ISO 14001 companies are required to look at their unique context and identify the effect the environment is having on their business. It involves taking new factors into account that are specific to the organization’s context, such as climate volatility, adaptation to change in the environment and resource availability. This is a big leap forward as the effect of the environment on the organization was previously not included in the scope of the standard. Environmental Management standard (ISO 14001:2015) is focused on organization environmental impact by product and process of its realization. Now ISO is developing an occupational health and safety (OH&S) management system standard - ISO 45001, which is intended to enable organizations to manage their OH&S risks, improve their OH&S performance and to integrate other aspects of health and safety, such as worker wellness/wellbeing and achieve greater recognition for companies’ efforts toward sustainability and corporate social responsibility. An organization is responsible for ensuring that it minimizes the risk of harm to the people that may be affected by its activities (e.g., its workers, its managers, contractors, or visitors), and particularly if they are engaged by the organization to perform those activities as part of their “occupation”; developing and implementing an OH&S policy and objectives; establishing systematic processes which consider its “context”; evaluating its OH&S performance and seeking to improve it, through taking appropriate actions and ensuring workers take an active role in OH&S matters. ISO 45001 is focused on workplace and workers wellbeing.

In the new revisions of ISO management standards, everything depends on commitment, coherence and context. Controlling and effectively managing such standards to promote learning, efficiency, and competitiveness is a key condition to achieving higher levels of sustainable development.

**Sustainable Development Core Values and ISO Management Standards**

Meeting the presented above general requirements included in the ISO standards enables companies better understanding of internal environment, in which processes are performed and products are manufactured, their impact on stakeholders (both internal and external) and identify responsibility resulting from it. Considering the before-mentioned together with defined by [12] core values of Sustainable Development Management System the thesis can be formulated, according to which new edition of ISO standards strives for supporting organizations in realization of SD commitments and directly includes meeting the needs of a firm’s direct and in-
direct stakeholders and its responsibilities for environmental stewardship (ISO 14001), social well-being (ISO 45001), and economic prosperity over the long term (ISO 9001) (table 1).

Table 1. The core descriptive elements in a SDMS and ISO standards.

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<td>Stakeholder -oriented management</td>
<td>The standards adopt a stakeholder approach to quality / environmental /OH&amp;S management systems and focuses on Stakeholders Relationship Management with the addition of two clauses (4.1 Understanding the organizations context and 4.2 Understanding the needs and expectation of interested parties) which relates to the context of the organization. This approach recognizes the complexity and demands that are now placed on organizations from their stakeholders.</td>
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<td>Triple bottom line</td>
<td>Risk-analysis based thinking (clause 6.1) enables organization definition of factors, that can cause deviation of processes and quality / environmental / OH&amp;S management systems from results planned. Both, the risks and opportunities identified are the basis for increasing effectiveness of quality / environmental / OH&amp;S management systems, gaining better results and preventing negative effects.</td>
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<td>Systematic approach</td>
<td>A systematic approach is reflected in the: management by facts; a focus on results and creating value, and a systems perspective on managing quality/environmental/ OH&amp;S management systems. Organization has to analyze and assess the data and information received from monitoring and measuring processes executed (clause 9).</td>
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<td>Strategic management</td>
<td>The new high level structure in clause 5 places particular emphasis on leadership, not just management as set out in previous standards. This means top management now has greater accountability and involvement in the organization’s management system. They need to integrate the requirements of the management system into the organization’s core business process, ensure the management system achieves its intended outcomes and allocate the necessary resources.</td>
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<td>Innovation and learning</td>
<td>Because of changing requirements and trends, organizations have to consider their present knowledge and define the mode of gaining, purchasing or accessing any extra knowledge they need (clause 7). Organizations need to determine what, how and when things are to be monitored, measured, analyzed and evaluated (clause 9). Organizations need to ensure never-ending improvement, innovation, and learning along all quality/environmental/ OH&amp;S dimensions of stakeholder requirements (clause 10).</td>
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As the structure of all the standards is identical, the Deming PDCA-based integration of standards is supposed to be much simpler than it used to be. Developing integrated management system enables including requirements and expectations of various stakeholders and enables various stakeholders to facilitate IMS development. An integrated management system (based on the plan-do-check-act framework) can help the organization identify and evaluate risks, set goals and objectives, and create action plans to achieve those goals, thus helping reduce the risks associated with each context.

**Conclusion**

Companies are constantly looking for solutions that can improve business, enhance their operations, and optimize business performance. In today’s market, success hinges on developing competitive advantage and profitability while demonstrating good corporate governance. Sus-
sustainable development has become the center of business and academic discussions. Sustainability can be embraced by businesses of any size, in any sector. The implementation of corporate sustainability can support long-term business success as well as contribute to improving living standards.

The article aim was to identify the corporate sustainability requirements to be inserted in the management systems proposed by International Organization for Standardization. ISO 9001:2015, ISO 14001:2015 and to-be published ISO 45001 standard have an important role to play in the “sustainable development agenda”. And even though each standard was developed on its own, within its own timeframe, and is aimed at controlling specific parts of business processes or functioning in an integrated manner, each standard also evolves to the theme of sustainability. Quality Management standard (ISO 9001:2015) is focused on economic development by delivering product which satisfy client requirements, Environmental Management standard (ISO 9001:2015) is focused on organization environmental impact by product and process of its realization, and Occupational Health and Safety management standard (ISO 45001:xxxx) is focused on workplace and worker wellness and wellbeing. Thus, achieving sustainable development through the use of these standards has become feasible and practicable for companies [13].

References


