# A Review of Strategic Implementation Initiatives for Enterprise Sustainability Management

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**Abstract.** Corporate sustainability management integrates the necessary parts of sustainable development components into the enterprise's day-to-day business operations. It ensures sustainable development of the corporation that not only meets its own business needs, but also emphasizes in extending the life expectancy of ecosystems, and economies within which it operates. The paradigm of sustainable development entails the rethinking of how business is being performed. Thus, sustainability management will inherently change the organization's competitive landscape through the manner the enterprise develop its resources, capabilities, and activities. This in turn, will influence the strategic nature of the organization. It is imperative for the enterprise to realize that corporate success is a function of its sustainable development, both of which can be measured in either financial or non-financial terms. The building blocks for corporate sustainability management are for the corporation to focus on its capability to continue manage its businesses risks and stakeholder expectations to the best it could. To this end, this paper explores a model of strategic implementation initiatives towards establishing a corporate sustainability management framework by incorporating knowledge management and enterprise risk management programs as two core pillars supporting the management of business risks and stakeholder expectations.

Keywords: Corporate Sustainability Management, Enterprise Risk Management, Knowledge Management

#### 1. Introduction

There have been a lot of discussions of late on the issues of sustainable development. In the corporate setting, the subject matter has been revolving around that of corporate sustainability management. There are various definitions of sustainable development but the core idea is to design systems that are able to incorporate the regeneration of resources while at the same time utilize them in a balanced manner so that continuation of prosperity can be ensured. Global phenomena of rising energy prices, diminishing natural resources, rampant changes in our climate, socio-political changes, growing competition from emerging economies and trade liberalization, are but compelling evidences of the cry for sustainable development and sustainability management.

Since the United Nations sanctioned World Commission on Environment and Development (Brundtland Commission) published its report in 1987, the concept of sustainable development has attracted widespread attention from various stakeholders. The concept became a key reference point in shaping the international agenda and the international community's attitude towards economic, social and environmental development [1]. In the business world, corporate sustainability seems to be tantamount to long-term corporate survival. Recent development in regulatory requirements (best practice) and stakeholder expectations for initiatives such as carbon-footprint reduction, publications of sustainability reports, green accounting reporting and the likes underscore the increasing emphasis from investor and the public for higher and meaningful attainment of corporate sustainability in terms of corporate performance in environmental stewardship and social responsibility.

Corporate sustainability management integrates the necessary parts of sustainable development component into the enterprise's day-to-day business operations. It ensures sustainable development of the corporation that not only meets its own business needs, but also emphasizes in extending the life expectancy of ecosystems and economies within which it operates. The paradigm of sustainable development entails the rethinking of how business is being performed. At times, corporate chieftains find themselves in the situation to carry out intricate balancing act between short-term financial performance and long-term corporate

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success. In the process, the changes or transformation of the business processes, organizational models, competitive strategies, and leadership methods are inevitable while realigning strategies towards achieving corporate sustainability [2]. Thus, sustainability management will inherently change the organization's competitive landscape through the manner the enterprise develop its resources, capabilities, and activities. This in turn, will influence the strategic nature of the organization. It is imperative for the enterprise to realize that corporate success is a function of its sustainable development, both of which can be measured in either financial or non-financial terms. The building blocks for corporate sustainability management are for the corporation to focus on its capability to continue manage its businesses risks and stakeholder expectations to the best it could.

As such, the aim of this paper is to explore a model of strategic implementation initiatives towards achieving corporate sustainability through knowledge management and enterprise risk management programs.

# 2. Corporate Sustainability Management

#### **2.1.** The Definition

One notion of sustainable development is a value added business provided that the business integrates the necessary parts of sustainable development components into their day-to-day business operations. Sustainable development means rethinking how business is being performed. It will significantly (1) change the business organization's competitive landscape, (2) influence the way in which the organization develop their resources, capabilities, and activities, (3) influence the strategic nature of the organization, and (4) promote the organization's reputation and innovation as persistent source of competitive advantage [3].

To develop a management framework for corporate sustainability, business enterprises should implement initiatives with a defined focus and aligned the positive impact from such initiatives of the management framework to corporate strategy, brand and value creation. These objectives can be achieved through thorough analysis of stakeholder focus, corporate strategy, value drivers and sustainability risks [4].

## 2.2. Managing Business Risk and Stakeholders Expectation

Risks are inherent in all business operations. From the perspective of finance theories, profits are derived from taking risk in business activities. Business risk resides in the other side of the theoretical risk-reward trade-off equation in which the profit an enterprise makes is determined by the risks it takes. As such, by fully understanding business risks and having the capability and capacity to manage and leverage these risks to an enterprise's advantage can improve on the enterprise's profitability. On the other hand, failing to understand business risk can disrupt the continuity of an enterprise's business operations and even expose it to sudden collapse.

Thus, risk management is a crucial aspect of business continuity plan development. It involves determining what risks the organization faces and their relative importance to the organization. It also entails making decisions on what actions needed to be taken to address these risks. Specifically, risk management is defined as identification, assessment and economic control of those risks that endanger the assets and earning capacity of a business.

Managing stakeholder expectations means communicating and working with stakeholders to stay on the same page with them on projects that an enterprise undertakes so as to address their needs and queries whenever necessary. Communicating with the stakeholders can be done by developing a communication management plan. Through the plan, the enterprise can communicate the right information at the right time to the right stakeholders by using the right methods.

Thus, a robust corporate sustainability management framework should be able to manage business risks and stakeholders expectation well in order to ensure business success and organizational excellence. This robust framework can be established via enterprise risk management (ERM) and knowledge management (KM). Specifically, this paper espouses the management of business risk through ERM program whilst addressing stakeholder expectation via KM program. Figure 1 provides a graphical representation expounding on the espoused conceptual framework.

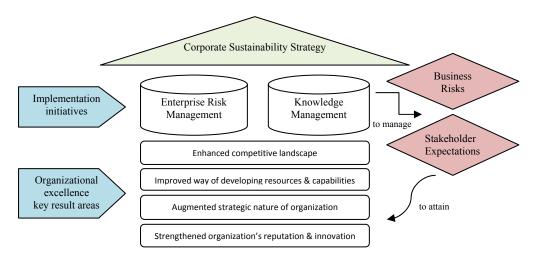


Fig. 1: Corporate Sustainability Management Conceptual Model.

With an effective management of business risks and stakeholder expectations through ERM and KM programs, the researchers believe that corporations can achieve organizational excellence which in turn will ensure corporate sustainability with the attainment of some key result areas. This paper asserts four critical dimensions of organizational excellence, namely (i) enhanced competitive landscape, (ii) improved way of developing resources & capabilities, (iii) augmented strategic nature of organization, (iv) Strengthened organization's reputation & innovation as competitive advantage.

# 2.3. Strategic Initiatives – Enterprise Risk Management

Enterprise risk management or ERM is operationally defined as a structured and disciplined approach in aligning strategy, processes, people, technology and knowledge of identifying, analyzing & managing risk from an integrated, company-wide perspective amidst creating value for shareholders. The concept of ERM entails a paradigm shift which dictates that the focus of risk management has to be shifted from the conventional operational hazards and pure financial risks to a much more strategic view of threats to business success. A robust and dynamic risk management framework should also promote an appetite for upside risk. ERM enables firms to benefit from an integrated approach in managing risk that shifts the focus of risk management function from primarily defensive to increasingly offensive and strategic in nature. This approach enables enterprises to improve capital efficiency, stabilize earnings and reduce the expected costs of external capital and regulatory scrutiny [5].

Thus, this paper proposes an ERM framework which comprises fourteen elements and processes which are deemed crucial for a successful implementation to bring about the desirable results in managing risks facing the firm. These elements are (i) to provide common understanding of the objectives of each risk management initiative, (ii) to provide common terminology and set of standards of risk management, (iii) to identify key risk indicators (KRIs), (iv) to integrate risk with key performance indicators (KPIs), (v) to provide enterprise-wide information about risk, (vi) to enable everyone to understand his/her accountability, (vii) to reduce risk of non-compliance, (viii) to enable tracking costs of compliance, (ix) to integrates risk with corporate strategic planning, (x) to be integrated across all functions and business units, (xi) to align risk management strategy with corporate strategy, (xii) to align risk management initiatives to business objectives, (xiii) to provide the rigor to identify and select risk responses (i.e. risk- avoidance, reduction, sharing and acceptance), (xiv) to quantify risk to the greatest extent possible.

The above fourteen elements cover three crucial dimensions of ERM implementation framework, namely the structure, governance and process dimensions. For instance, the first four elements above embody the structure dimension of the framework. The fifth to eighth elements cover the governance structure of the framework whilst the ninth to fourteenth elements represent the process dimension [6].

#### **2.4.** Strategic Initiatives – Knowledge Management

Knowledge management in business practice is divided into two primary aspects. The first aspect was treating the knowledge component as the explicit concern of business reflected in strategy, policy and practice at all level of organization and making direct connection between an organization intellectual assets both explicit and tacit – and positive business results. The second aspect is where knowledge management was briefly defined as the systematic approach to capture, structure, manage and disseminate knowledge in order to work faster ,reuse best practice, and reduce the cost for rework from project to project [7] [8].

Knowledge management or KM is defined as the exploitation and development of the knowledge assets of an organization with a view to furthering the organization's objectives. It entails processes associated with sharing, exchanging, creating and disseminating of knowledge to transform information and intellectual capital to achieve organization's goals. The knowledge to be managed includes both explicit, documented knowledge, and tacit, subjective knowledge [9].

The linkage between knowledge management and corporate sustainability has been discussed in many literatures covering various domains. The failure of organizations to integrate sustainability principles into its business strategy will result in a loss of competitive advantage and business opportunities, which will undermine long-term performance. Knowledge management has great potential for being applied to achieve sustainability targets. The linkage between knowledge management and corporate sustainability begins with the alignment of KM strategies and business strategies. This alignment provides the direction in developing knowledge and capabilities needed to support the business strategy [10].

Knowledge management system (KMS) is an information system that is developed to support and enhance the organizational processes of knowledge creation, storage, retrieval, transfer and application [11]. The distinction between ordinary information system and that of knowledge management system is with the existence of knowledge attribute. In other words, KMS shall facilitate the transformation of information acquired through it to become a useful knowledge. There are several types of typical KMS existing in the business setting, namely, the expert system, groupware, document management system, decision support system, database management system and stimulations system [12].

The start-up, take-off, expansion, progressive, sustainability, or STEPS framework has been used to implement the knowledge management in facilitating the corporation sustainability [13]. The STEPS framework can be summarized in the Figure 2 below:

Start-up Stage 1	Take-off Stage 2	Expansion Stage 3	Progressive  Stage 4	Sustainability Stage 5
Increasing awareness of benefits for business improvement	Developing     KM strategy     and working     definitions	Increase visibility of KM leadership and initiatives     Characterised by a more structured approach to implementation and change management to address barriers and risks	Improving the performance of KM activities     Characterised by the increase emphasis on using specific qualitative and quantitative methods to measure and monitor the performance of KM and to justify KM initiatives	Sustaining the performance of KM activities      KM expected to be normal routine, diffuse in the entire organization, as it become an integral part of the organizational culture – employees' behaviour, business processes and product development

Fig. 2: STEPS Knowledge Management Framework.

### 3. Conclusion

Sustainable business practices will be the way forward for all enterprises as it will not only ensure the long-term well being and survival of the corporations, but it can also enhance the corporations' unique competitive advantage. Although majority of corporate executives today consider sustainability management of such issues as environmental, social, and governance are crucial in various areas (e.g. new-product development and reputation building etc.), many still do not take a proactive approach to managing corporate sustainability due to the lack of understanding to the real meaning and definition of the term itself, let alone to invest in establishing a workable and robust corporate sustainability framework in their business setting.

In the above light, this paper has attempted to make explicit the term corporate sustainability and has endeavoured to operationalize its management by expressing the importance of managing the enterprises' business risks and stakeholder expectations. Hence, this paper has proposed a framework of corporate

sustainability management strategy by incorporating enterprise risk management (ERM) and knowledge management (KM) programs which shall present a robust yet strategic model to corporations. Going forward, challenges remain abound in effectively implementing the proposed ERM and KM initiatives towards attaining the intended corporate sustainability. Equally important is to develop a set of performance measurement gauging each critical parameter that is significant for such implementation initiatives.

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#### 5. References

- [1] United Nations Economic Commission For Europe (UNECE). Sustainable development concept and action. [online]. Available from http://www.unece.org/oes/nutshell/2004-2005/focus\_sustainable\_development.html [25 February 2012].
- [2] MIT. *Sloan Management Review*. What is sustainability. [Online], available on http://sloanreview.mit.edu/what-is-sustainability/, 3 September 2012.
- [3] M. Rodriguez, J. Ricart, and P. Sanchez, P. Sustainable development and sustainability of competitive advantage: A dynamic and sustainable view of the firm. *Creativity and Innovation Management*. 2002, 11 (3): 135-46.
- [4] PricewaterhouseCooper (PwC). Sustainability Strategy and Management Framework. [Online]. Available from http://www.pwc.com/my/en/services/strategy-n-engagement.jhtml [23 February 2012].
- [5] F. Lai, and N. Azizan. Critical review of literature on enterprise risk management and the cost of capital: The value creation perspective. *African Journal of Business Management*. 2012, 6 (9): 3126-3133.
- [6] F. Lai, N. Azizan, and M. Samad. Shareholders value creation through enterprise risk management. *International Journal of Business Research*. 2010,10 (1).
- [7] R. Barclay, and P. Murray, P. What is knowledge management? *Knowledge Praxis*. [Online]. Available from http://www.media –access.com/whatis.html. [20 August 2012].
- [8] I. Nonaka, and H. Takeuchi. The knowledge creating company: how Japanese companies create the dynamics of innovation. New York: Oxford University Press. 1995.
- [9] K. Metaxiotis, K. Ergazakis and J. Psarras. Exploring the world of knowledge management: agreements and disagreements in the academic/practitioner community. *Journal of Knowledge Management*. 2005, 9 (13): 6-18.
- [10] H. Michael. Developing a knowledge strategy. Calif. Manage. Rev. 1999, 41: 125-145.
- [11] M. Alavi, and D. Leidner. Review: knowledge management and knowledge management systems: conceptual foundations and research issues. *MIS Quarterly*. 2001, 25(1)
- [12] J. Gupta, and S. Sharma. Creating Knowledge Based Organization. Idea Group Publishing. Hershey, PA. 2004
- [13] H. Robinson, C. Anumba, P. Carrillo, and A. Al-Ghassani. STEPS: a knowledge management maturity roadmap for corporate sustainability. *Business Process Management Journal*. 2006, 12 (6).

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