Green Audit – A Tool for attaining Sustainable Development & Achieving Competitive Advantage

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ABSTRACT

Increase in world population, increase in economic activities in the past few decades, enormous advancement in science & technology & globalization are leading to change in the eco system. The world today is facing the alarming situation due to imbalance in the eco system. For the long term survival of the earth & its habitat, deliberate efforts must be made to achieve sustainable development. Organizations are exploiting the natural resources & are putting pressures on environment. Nation's Governments and social activist are now vocal about the issue. "Green Audit" is a term, which is discussed a lot but not acted upon. Therefore the researcher intends to explain the conceptual framework of Green Audit. Apart from discussing the conceptual framework the Researcher also intends to throw light on other important aspects such as objectives of Green Audit, drivers of green audit, scope etc. The researcher intends to highlight more important issue regarding Green Audit. Organization should implement 'Green Audit' voluntarily because it is a tool which can be used to attain sustainable development & competitive advantage.

Key words: Competitive Advantages, Eco System, Sustainable Development.

Introduction

Increase in world population, increase in economic activities in the past few decades, enormous advancement in science & technology & globalization are leading to change in the ecosystem. Apart from these' controllable factors, viz. earthquakes, floods, tsunami, volcanic eruptions, wild fire, hurricanes etc. are creating severe impact on the earth's eco system. Of these controllable & uncontrollable factors cause an undesirable change in the physical, chemical & biological characteristics of the eco- system, especially air, water, land etc. These, in turn adversely affect the human population, wild life, historical & cultural assets.

India being a party to the United Nations Convention on biological Diversity (CBD) held in Rio De Janerio on 5th June 1992, enacted 'The Biological Diversity Act' 2002, to meet the following main objectives set by the convention

- 1. Conservation of Biological Diversity
- 2. Fair & equitable sharing of benefits arising out of the utilization of genetic resources
- 3. Sustainable use of the components of the biodiversity.

'Green Auditing' – Conceptual Frame Work

'Sustainable use' as per section 2 (0) of the Biological Diversity Act,2002, means 'the use of components of biological diversity in such manner and at such rate that does not lead to the decline of the biological diversity; thereby maintaining its potential to meet the needs & aspirations of present & future generations.

The main emphasis is on 'sustainable use' of the components of ecological diversity.

Such sustainable use can be ensured by 'auditing' the use of ecological components. Measuring & accounting these 'components' is a prerequisite to any audit. In fact audit is underlined as 'regular & systematic review & appraisal of the factors & forces that contribute to realization of the objectives

"The term 'Green' means eco-friendly or not damaging the environment. This can acronymic ally is called as 'Global Readiness in Ensuring Ecological Neutrality' (GREEN).

"Green Accounting" can be defined as 'systematic identification quantification, recording, reporting & analysis of components of ecological diversity & expressing the same in financial or social terms.

"Green Auditing", an umbrella term, is known by another name 'Environmental Auditing'. In auditing literature both the terms are being used interchangeably. Green auditing is "the systematic examination of the interactions between any business operations & its surroundings. This includes all emissions to the air, land & water, legal constrains; the effects on the neighbouring community, landscape & ecology the public's perception, of the operating company in the local area.... it does not stop at all compliance with legislation. Nor is it a 'green-washing' public relations exercise. Rather it is a total strategic approach to the organization's activities. (The Confederation of British Industry 1990). It is 'a methodical examination of environmental information about an organization, a facility or a site, to verify whether, or to what extent, they conform to specialized audit criteria. The criteria may be based on local,

national or global environmental standards' (The World Bank). It is "a management tool used by industry to evaluate its environmental performance" (United Nations Environmental programme,1989) Green audit can be defined as an audit of 'ecological system' of a particular habitat (country, state, local community, office, home, school, public place etc.) within a given period with an objective of assessing the biodiversity. Therefore, in a nutshell, green audit is a systematic & methodical assessment & review of the organization's activities & its services in relation to environmental green issue.

Drivers of Green Audit

Earlier, the main driving force behind green auditing was fear of prosecution & high penalties imposed by the regulatory authorities. But today, it is considered as an exercise to identify & reduce liabilities. Experts have identified different drives of such auditing. Vinten (1996) categorized forces in three groups.

- 1. Organizations strategy
- 2. Functional areas
- 3. Operational functions

Hillary (1999) identified customers, local government, community, regulators & employees as most important drivers.

FORGE Group (2002) identified four components as key drivers

- 1. Strategy
- 2. Management
- 3. Operational performance
- 4. Reporting

In his study, Sen (2005) identified a set of 44 general drivers, out of which 17 are environmental value drivers, which are-

- 1. Environmental commitment
- 2. Commitment to sustainable development
- 3. Written environmental performance
- 4. Targets for environmental performance
- 5. Sustainability report
- 6. Environmental management system
- 7. Environmental purchasing policy

- 8. Environmental training & education
- 9. Employee responsibility for environment
- 10. Product life cycle analysis (assessment)
- 11. Management understands sustainability
- 12. Fossil fuel reduction, uses renewable energy
- 13. Toxic chemical use reduction
- 14. Reducing unsustainable products
- 15. Recognition to employees' environmental issues
- 16. Quantitative environmental measures
- 17. Quantitative environmental measures

In the present paper, the Research intends to highlight two important drives

- I. Sustainable development.
- II. Competitive advantage.

Objectives of Green Audit

The basic objective of any green audit endeavour is to ensure ecological efficiency of products, process or services of a business are in accordance with environmental laws & regulations of a particular habitat. However, the same can be listed elaborately as

- 1. To ensure development along with safeguarding the environment
- 2. To reduce energy consumption to foster environmental up gradation
- 3. To ensure compliance with legislations
- 4. To physically ensure installation of devices that reduces pollution & authentication of such devices by competent authority.
- 5. To ensure optimum utilization of resources
- 6. To ensure whether provisions are made for liabilities arising out of unintentional pollution related damages
- 7. To ensure that due precautions has been taken by the industry to protect employee health &hygiene.
- 8. To suggest improvements in the overall system to promote safe & clean environment.

Scope of Green Audit

Basically Green Audit involves the inspection of a company to assess the total environmental impact of its activities, or of a particular product or a process. It indicates what type of carbon footprints organizations are leaving on the planet & also suggest ways to reduce it. Therefore, the scope of Green Audit can be listed as below,

- 1. Measuring key environmental parameters
- 2. Analysing raw & test data
- 3. Communicating with contractors, vendors, customers & regulators
- 4. Examining policies, internal records, reports relating to environmental aspects.

Accordingly, Green Audit mainly emphasize the following key areas-

1. Saving power –

This includes energy audit where the auditors identifies way to save electric, natural gas, and other forms of power that are inefficient or being wasted in the organization. This is done by recommending more efficient electric heating & cooling etc.

2. Saving water-

This involves educating the employees on ways to save, recycle & reuse precious water resources both inside & outside the premises. The basic emphasis should be to reduce water consumption.

3. Greening the work place-

This is achieved by designing a greener office space. This involves use of alternate power sources like solar power, reducing biological contaminants like pesticides, implementing green landscaping option & rain water harvesting.

4. Driving Green -

Vehicle driving is one of the largest contributors to both energy use & environmental pollution. The employees' should be trained to make more fuel efficient driving choices, optimize fuel consumption & consider alternate fuel vehicles. Possibilities to use public transport or group travelling have also to be explored for reduced gas emissions. Periodic emission tests need to be conducted to check for efficient fuel consumption.

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Legal Aspect of Green Audit

Although, in India we have comprehensive framework of legislations to protect the environment, the Researcher intends to focus on CERCLA.

CERCLA or Comprehensive Environmental Response, Compensation & Liability Act 1980, is one among many other environmental laws that are in force in US but probably the most formidable among them. Its provisions are very stringent & its jurisdiction is very wider, therefore, it has become a nightmare for US corporate. Many companies often run for bankruptcy seeking to free themselves of CERCLA liabilities.

Protection of environment is the prime concern of the world today. The cooperate world is generally blamed, & quite justifiably so, for the present level of atmospheric pollution. United Nations conference on Environment &Development (UNCED) in Rio-de Janerioin in June 1992 set specific goals & targets with regard to wasted management so that by 2015 all countries including developing countries must establish their waste treatment & disposal criteria, develop the ability to monitor the environmental impact of waste & ensure disposal of waste according to international quality guidelines. Yet the corporate world has paid little attention to this caveat.

With growing concern over environmental issues the demand for environment audit is continuously rising. Every cross border project is now subject to environmental audit before granting of approval. Many specified industries are conducting environmental audit mandatorily or voluntarily. As globalization progresses, rules & regulations, management, accounting related to environment in developing countries is also taking shape of international standards. India is already taking steps in that direction.

The constitution of India clearly states that it is the duty of the state to protect& improve the environment. The constitutional provisions are backed by a number of laws- acts, rules & notifications. The environment protection Act of 1986 (EPA) came into force soon after the Bhopal Gas Tragedy & is considered as an umbrella legislation as it fills many gaps in the existing laws. There after a large laws came into existence as the problems began arising e.g. Handing & Management Of Hazardous Waste Rules 1989,a gazette notification was issued by the Ministry of Environment on march 13th 1992 & later amended on April 22nd 1993 introducing 'Environmental Audit' in India to minimize generation of wastes & pollution. The Environment Ministry has made it compulsory for large projects to include environmental

compliance in their corporate audits & report deviation to the company Board of Directors as well as to public.

Green audit- as a tool to achieve sustainable development& competitive advantage

The organizations focusing on sustainability in the present competitive era of cutthroat competition need to focus on the concept of Green Audit, because by emphasizing on green Audit organizations can reap unprecedented gains not only in environmental & social terms but also in financial terms.

Integrating Green Audit framework into sustainable development is the need of the hour. SD is being used worldwide as generic term to signify 'all round development'. Organization/industry specific national Green Audit programmes help to develop national policies for stringent compliance of environmental laws, products '& customers' safety-norms. These become the parts of national government's SD policies. National Green Auditing &SD measures of various countries are the basis of formulating planetary SD framework of the earth. Planetary SD is very important from the perspective of welfare of the people & nature. If such framework can be properly established, development & welfare will flow as 'trickle down' effect from world level to individual unit level & thereby will reach each human being. Thus Green Audit initiatives at an organizational level will lead to planetary sustainable development, which will ultimately lead to increased stakeholders value & societal welfare in general.

Similarly, it is possible to achieve competitive advantage through Green Audit initiatives. Many people consider Green Auditing exercise as an action without benefit. Incorporating Green Auditing would cost an entity in both time & money-e.g. salaries of the environmental units experts & staff, fees of the auditors etc. If approached properly, the entity can recover these costs & achieve direct & indirect cost savings. e.g. if Green Audit helps organization to segregate the waste streams into harmful & less harmful, then it can save effluent treatment & discharge cost. Organizations may also be able to feed some of what was waste, back into its operations & save on raw material cost. Its stringent application reduces penalties, interests, legal costs, compensation charges & environment failure costs etc. It helps to reduce wastage & associated costs, increases product quality etc.

Sen.'s theory of societal, environmental & stakeholders competitive advantage (2006) states that it is a healthy mix of four kinds of factors:

- a) Push (license to exist)
- b) Pull (motivation to grow)
- c) Pressure (legitimacy to grow)
- d) Support for sustenance

These four factors are essential for obtaining competitive advantage.

Societal & environmental drivers contribute substantially to a firm's performance in variety of ways. Tangible contributions of Green Auditing include risk reduction & profitability improvements while intangible contributions lead to brand equity. The environment receives benefits through cleaner process & products, local community is benefited by socio-economic development, employees gain better working conditions & consumers receive quality products with less impact on environment. All tangible & intangible benefits & costs savings are the keys to achieve competitive advantage. Competitive advantage helps to place the products into the markets, achieve market growth & gain confidence of the customers & socially responsible investors. Thus Green Auditing helps organizations to achieve competitive advantage.

Conclusion

Although the concept of Green Auditing is being implemented & appreciated, it should overcome the following challenges.

- 1. There is no Standard Accounting policy or methodology unlike financial & cost audit
- 2. Collection of data may be cumbersome & expensive
- 3. It is a long term exercise-hence auditing in short term may not yield desired results.
- 4. It is difficult to quantify the entire data in financial terms as most of them are intangible.

The inherent advantages of Green Audit viz. sustainable development & competitive advantages, makes Green Audit imperative. Even though, costs, lack of legitimacy, poor supportive environment, lack of skills & technical expertise etc. acts as a barrier to Green Audit, that is the only area in which innovations are expected in future. That is the only way out to safeguard the planet.

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