

## Environmental Accounting and Reporting – A principled analysis in Indian scenario

Sudhir Kumar Shukla\*

Amit Kumar Pandey\*\*

Shivam Shukla\*\*\*

In recent years, environmental pollution has become a severe issue and the stakeholders are considerably uneasy about the issue which has paved way for the ever increasing concern about the implementation of environmental accounting. The field of environmental accounting has made a gigantic stride in the past two decades, moving from a rather secret practice to the one tested in many countries with a well established framework in a few of them. As far the case of India is concerned it is not mandatory for the corporate entities to reveal the environmental related cost and benefits sans certain industries. Therefore, in India such disclosures are of voluntary nature and are pioneered by corporate social responsibility norms which are mandatory. The prime intention of the study is to unearth the roots and the inclinations of the growth of environmental accounting. In addition, environmental accounting will also be discussed in terms of its contingency to supplement the traditional accounting system in practice. Despite the shortfalls and problems described in this paper, however, there is growing interest in modifying national income accounting system in order to promote sightedness of the bridge between economy and environment. In this paper an attempt has been made to deliberate upon the theoretical foundations of environmental accounting and reporting practices with special reference to Indian companies. Environmental accounting and awareness require more importance as it is the need of the hour.

**Keywords:** Environmental Accounting and Reporting, SWOT analysis, Corporate Social Responsibility, Listed Companies, Annual Reports, Green Accounts, sustainability reports.

### INTRODUCTION

Just because concern regarding environmental safety has become a global purport, managers have become bound to focus their attention on manufacturing biodegradable products that can be recycled again. Also there is an increasing need to have greater control over air pollution, to curtail as much as possible the energy consumption, and exploit natural resources in a prudent way. Managers have to take into notice costs and harm for not complying with the laws concerning the environment. Therefore, they seek information from finance and accounting department, information concerning revenues and expenses. Information pertaining to economy and accounting has to be complicated, objective, and relevant and should be provided perpetually in such a way that it permits speedy and accurate decision making with a low cost incurrence. The developmental activities undertaken by the ongoing civilization generates

immense quantity of wastage with potential ingredients. The disposal of such wastes contributes towards the environmental pollution. Today, the magnitude of environmental pollution is at a distressing level in many parts of the globe. Well-known environmental tragedies like Minamata mercury poisoning in Japan (1956), Bhopal gas tragedy (1984), Chernobyl nuclear-power plant disaster in Ukrain (1986) reaffirmed the significance of environmental protection in the minds of masses.

### ENVIRONMENTAL ACCOUNTING DEFINED

Environmental accounting is the practice involving incorporation of principles of environmental management and conservation into reporting practices and cost/benefit analysis. Environmental accounting allows a business to foresee the influence of ecologically sustainable practices in every activity right from their supply chain to facility enhancement. It allows accountants to report on the economic effect of those decisions on stakeholders so as to allow for proactive decision making about processes which simultaneously meet environmental regulations while adding on to the bottom line of the corporate enterprise.

Thus, Environmental Accounting involves the identification, measurement and allocation of

environmental costs, and the unification of these costs into business and encompasses the way of communicating such information to the stakeholders of the organisation. In this sense, it is a comprehensive approach to assure improved corporate governance that includes transparency in its societal activities. Finally, Environmental Reporting can be defined as an umbrella term that describes the various means through which companies disclose information on their current and future environmental activities.

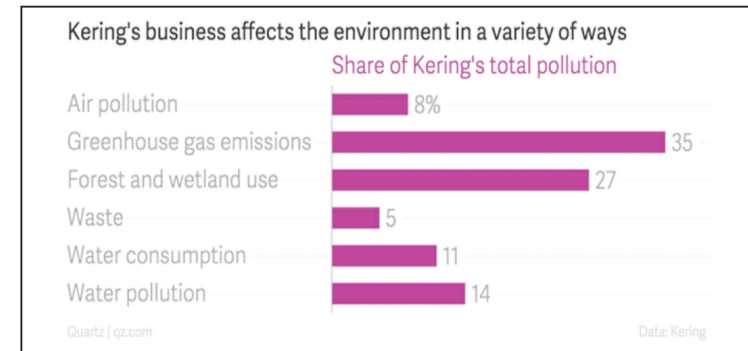
### Objectives of the study

- To understand the concept of environmental Accounting;
- To analyze the Environmental accounting and reporting framework
- To identify the issues in environmental reporting in India
- To suggest some measures to overcome the problems in environmental accounting.

### Environmental accounting and reporting framework

	Monetary Units	Physical Units
Internal	Monetary Environmental Accounting (MEA)	Physical Environmental Accounting (PEA)
External	Monetary External Environmental Accounting and Reporting & Monetary Environmental Regulatory Accounting and Reporting	Physical External Environmental Accounting and Reporting & Physical Environmental Regulatory Accounting and Reporting

### How do businesses affect environment



### The SWOT analysis of the organization on environmental accounting

Strengths	Weaknesses
<ul style="list-style-type: none"> <li>• the economic entities are keenly interested in getting involved in activities concerning the environment;</li> <li>• it is a current field which has a special dynamics of its own;</li> <li>• the selective accumulation of waste and prevention of pollution could create financial resources for the economic entities;</li> <li>• there is a strong competition in the cleanliness (sanitation) services market.</li> </ul>	<ul style="list-style-type: none"> <li>• the managers in India do not understand the importance of environmental accounting yet;</li> <li>• there are untrained or semi trained personnel in this field of environmental accounting;</li> <li>• the personnel for the financial - accounting department do not possess enough information about environmental accounting and also lack awareness on how the aspects connected to the environment reflect in the environmental accounting and what impact they have upon the economic entity and environmental politics;</li> <li>• there is not a specific system concerning the environmental accounting which is to be applied at economic entity's level;</li> <li>• the technologies that are used to recycle and to take value from waste or to prevent pollution are obsolete.</li> </ul>

\* Professor & Head, Department of Commerce, M.G. Kashi Vidyapith, Varanasi (U.P.)-221002

\*\* Assistant Professor (Marketing & Sales), Amity Business School, Amity University, Noida (U.P.)

\*\*\* Research Scholar (UGC - JRF), Faculty of Commerce, Banaras Hindu University (U.P.)-221005

Opportunities	Threats
<ul style="list-style-type: none"> <li>the entire legislation of the Government of India concerning the environmental can be applied also at the level of economic entities and particularly for all of them irrespective of their sector of operation;</li> <li>the perspective of the need of a greater number of workers in the environmental accounting in a very coming future – recycling, capitalization, and remediation;</li> <li>the possibilities to bring new and advanced technologies and equipments;</li> <li>the possibility to attract foreign direct investment in the field</li> </ul>	<ul style="list-style-type: none"> <li>there are several difficulties in introducing an information system which is time efficient and cost effective;</li> <li>There is need of a significant budget in order to apply environmental accounting and the benefits are not obtained immediately, which attracts a resistance of the economic entity;</li> <li>the correspondent legislation is normally absent and if at all present then very little and treated tangentially.</li> </ul>

#### Environmental accounting Issues in India and their suggested solutions

Environmental Accounting Issues	Proposed Solutions
Definition of environmental cost and expenses	Environmental costs that do not lead to future expected benefits
Environmental costs recognition and measurement issues	Materiality, Measurability and Certainty
Capital or revenue allocation problem	Capitalize if it is intended to prevent or reduce future environmental damage or to conserve resources
Capitalization of environmental costs incurred subsequent to the acquisition of a capital asset	Capitalize either (i) if the costs result in an increase in expected future income benefits or (ii) if the costs are considered to be a cost of expected future benefits from the assets.
Accounting for future environmental expenditure	Where an entity has a legal obligation to incur future costs, the cost involved represents an environmental liability.
Accounting for the impairment	Reduce the carrying amount of assets rather than introduce a liability
Environmental accounting policy disclosures	All significant accounting policies relating to financial statement items to be disclosed

Source: GAAP based solutions for some environmental accounting related issue (The Cost and Management, May-June 1998)

## Conclusion

Corporate reporting is a key and important vehicle for the corporate bodies to communicate with the external world. With the rise in complexities of the business world the role of information has been gradually and steadily increasing for making correct and pointed economic decision. It is also a recognised fact that due to increase in level of environmental awareness of stakeholder, environmental reporting has now become a part of financial reporting in India. Most of the Indian companies use to report environmental initiative in their annual report. But now majority of listed companies in India are into the process of publishing Sustainability Reports which clearly and adequately encompass the impact of the activities of business corporations on their immediate environment and the community on whose resources they prosper. However, such reporting is mere descriptive and nothing substantial is disclosed about its financial implications and

accounting policy of environmental cost. It is not practically neither possible nor feasible to measure all environmental liabilities and assets in monetary unit. As a result it is not possible to amalgamate all environmental information with existing accounting system at micro level. However, it can be inferred that the internal cost of environment to a firm which have material effect on financial results of the business can be suitably integrated with existing accounting information. For externalities it is possible to have some other quantitative measurement and disclosure. Moreover, due to annihilation of clear guidelines on the part of accounting regulatory bodies, like accounting standard board, Ministry of Corporate affairs etc. on the issue like environmental cost, environment assets and liabilities, recognition and measurement of such cost, assets and liabilities and its disclosure requirement, it is not developed as it is expected by stakeholder. The recent initiative of Ministry of Corporate Affairs (MCA), Government of India, i.e. the National Voluntary Guidelines on Social

Environmental and Economic Responsibility of the business 2011 is also in infant stage. Thus it can be safely assumed that, though environment reporting has been developed in the corporate reporting practices in India, it is found to be lacking in its approach regarding comparability and verifiability, the basic feature of accounting information. So it is expected that in the near future the government and other accounting regulatory bodies will play a greater and more active role in the development of environmental accounting and reporting by making it reliable and relevant to users.

## References

- Ahmad A. (2012). Environmental Accounting & Reporting Practices: Significance and issues, Global Journal of Management and Business Research, Volume 12 Issue 14. ISSN 0975-5853.
- Pramanik A.K., Shil N.C. & Das B. (2007). Environmental Accounting and Reporting with special reference to India, Munich Personal Repech archive, Paper No. 7712.

Banerjee, B. (2005), Corporate Environmental Accounting & Reporting Practices in India, Indian Accounting Review, December: 25-46.

Quereshi, Nasir, Kulshrestha, Dhires and Tiwari, Surya (2012), Environmental Accounting and Reporting: An Essential Component of Business Strategy, Asian Journal of research in Banking and Finance, April, Vol.2 Issue 4.

Goswami M. (2014), Corporate Environmental Accounting: the issue, its practices and challenges: A study on Indian corporate accounting practices, IOSR Journal of Business and Management, Volume 16, Issue 5, ISSN 2319-7668.

Baba M.C., Advantages Of Implementing Environmental Accounting Within An Economic Entity, IDEAS.

Hecht J.E., Environmental Accounting: Where We Are Now, Where We Are Heading

Bartelmus, Peter, Environmental Accounting in Theory and Practice, Springer Publications, ISBN 978-94-017-1433-4.

Gray R., Bebbington J., Gray S., Social and Environmental Accounting, Sage Publishing Company.

Environmental Financial Accounting and Reporting at the Corporate Level: A Report of UNCTAD Secretariat, Fifteenth session, Geneva, 11-13 February 1998