

ECO-EFFICIENCY, SUSTAINABLE DEVELOPMENT AND ENVIRONMENTAL ACCOUNTING IN THE TOURISM INDUSTRY DURING A CRISIS

Nikolaos Sariannidis^{*}, Alexandros Garefalakis^{**},
Panagiotis Ballas^{***}, Evdoxia Grigoriou^{*}

^{*} Department of Accounting and Finance, Western Macedonia University of Applied Sciences, Greece

^{**} Corresponding author, Accounting and Finance Department, Technological Education Institute of Crete, Greece;

Contact details: Accounting and Finance Department, Technological Education Institute of Crete, 71004 Heraklion, Greece

^{***} Laboratory of Accounting and Financial Management, Accounting and Finance Department, Technological Education Institute of Crete, Greece



Abstract

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Tourism industry exploits the local fragile resources of a destination including biodiversity, archaeological and cultural areas with tourists expressing a propensity to visit places with high environmental quality and intensely local culture elements. Thus, traditional tourism management practices that are associated with the environmental degradation and catastrophe of these resources should be scrutinized and avoided. The aim for the particular study is to investigate the notion of sustainable development within the realm of hospitality and tourism industry by suggesting avenues for further research regarding both policymakers and practitioners. The contribution of this study is that it links sustainability management with financial reporting and business performance. Building on the above, it highlights the importance of accounting by shedding light on how the latter could better incorporate environmental practices and performance of a business entity into reporting improving the quality of narratives and usefulness of financial reports to various stakeholders. The novelty of this study is that it proposes the focus on accounting as a mediating factor to imprint sustainable practices adopted by a business entity in an effort to provide quality reports to stakeholders and a tool to diffuse environmentally sensitive practices from the side of policymakers.

Keywords: Sustainable Development, Eco-Tourism, Sustainability Strategy, Tourist Management, Competitiveness, Environmental Accounting

1. INTRODUCTION

Since the early days of 2001, the United Nations Division for Sustainable Development (UN, 2001) prepared proposed environmental management accounting procedures and principles with a focus on techniques for quantifying environmental expenditures and costs for the development of guidelines and framework to promote sustainable practices. The initiator to the above is the need for drawing a link between environmental practices adopted by a business entity with accounting variables. The rationale is to acknowledge natural resources as assets and record business practices

with a significant environmental impact accordingly to narrative reports and financial statements produced. This is particularly important for an industry such as hospitality and tourism due to its involvement into practices with major implications for natural resources and the environment.

The World Travel and Tourism Council (WTTC, 2014) reported on the global economic impact of travelling and tourism with details on the dynamics of the industry supporting that the number of tourist arrivals in 2024 is expected to reach approximately a maximum of 1.7 billion travellers. In 2013, the direct contribution of travelling and tourism to the global GDP was 2.9%, generating

100.894.000 jobs, and is expected to be increased by 4.2% by 2024, contributing to the increase in employment by 2.0%. Correspondingly, the overall contribution of travel and tourism to the global GDP was 9.5%, employing 8.9% of the global workforce, with the prediction to reach the level of 10.3% by 2024 in terms of global GDP and 10.2% for total employment. In 2013, travel and tourism industry attracted 754.6 million US \$ in the form of capital investments with the projection to be increased by more than 5 percentage units by 2024, reaching US \$ 1,310.9 billion (WTTC, 2014).

Under such circumstances, tourism destinations should be alert and proceed to proper investments and preparations to welcome such flows of tourists. The pivotal role of tourism in economies and markets globally requires the promotion of sustainable development practices by governments and their adoption by tourism organizations. Moreover, practitioners should cooperate with policymakers by establishing incentives to incorporate details on environmental performance in reporting. Thus, additional research effort is required in bringing accounting into the equation exploring how it could contribute to providing a clearer picture of the quality of environmental performance of an organization proving its usefulness to stakeholders.

In terms of structure, the study presents developments in the tourism and hospitality literature and then focuses on the need to shift focus on the role of accounting and how it could contribute to the adoption of sustainable practices both from the side of government and practitioners. The paper concludes with proposals regarding future research in the field and the importance of including accounting and corporate governance variables to the preparation of financial statements aiming for improving the quality of reporting offered to stakeholders helping at the same time policymakers into their decision making regarding environmentally sensitive practices.

2. SUSTAINABLE DEVELOPMENT IN THE TOURISM INDUSTRY

The concept of sustainability in the tourism industry has attracted the attention of not only scholars but also industry practitioners (Sharpley, 2000). Sustainability is no more an innovative concept; rather it is used by stakeholders of the tourism industry to form their strategy acknowledging that sustainability is indeed an important mediating factor (Saarinen, 2006). Tourism essentially exploits the local, and in many cases, fragile resources such as biodiversity, archaeological and cultural sites. However, according to the World Tourism Organization, tourists prefer to visit places with high environmental quality and intensively local culture elements. Hassan (2000) noted that destinations that invested in environmentally sustainable practices achieved higher growth rates compared to their peers that did not. Consequently, the insufficient management and planning of tourism services in numerous destinations could potentially lead to a future reduction in their tourist

volumes, due to environmental degradation and the subsequent destruction of these resources with severe negative impacts on future development. United Nations World Tourism Organization (2005; p. 12) suggests that the concept of sustainable development requires a holistic consideration of economic, societal, cultural, and environmental aspects explicitly defining sustainable tourism as:

"Tourism that takes full account of its current and future economic, social and environmental impacts, addressing the needs of visitors, the industry, the environment and host communities."

Indeed, the Center of Environmental Education of Archanes in Greece notes that:

"The more apparent become the negative effects of mass tourism, the greater understanding of the need for development of sustainable forms of tourism."

All the above reflect both the essential role of the tourism industry to the global economy; hence, it requires immediate action with specific initiatives from local authorities in tourist destinations associated with practices of sustainable development. The need for sustainable development starts from bridging the gap of ecological and social problems, resulting from human activity (Robinson, 2004). The Brundtland Report (1987) states that sustainable development, is the development:

"That meets the needs of the present without compromising the ability of future generations to meet their own needs²."

The latter is the most widespread definition of sustainable development and also reflects one of the basic principles of sustainable development in tourism; namely, the notion of intergenerational equity principle that captures the economic and ecological impact of current activities on future generations (Padilla, 2002). Moreover, Okello and Kiringe (2004) highlighted the importance of biodiversity too pointing that it is not possible to estimate the value of materials and spices accepting that their loss could be significant for future generations.

In addition to the ethical obligation to avoid transferring environmental and economic problems to next generations, the transferring of problems from one area to the other follows the same rationale and should be strictly avoided. This is the concept of geographical equity or trans-frontier responsibility, which is calculated through the estimation of the ecological footprint analysis. The latter approach contributes to the analysis of environmental regeneration of resources needed to be consumed for the development of a particular activity; thus, concluding whether an activity implements the principles of ecological sustainability or not (Wackernagel & Rees, 1996; Chambers et al., 2000).

Another concept close to the above is that of carrying capacity, which depicts the maximum number of organizations that could be supported by an ecosystem since each micro-environment has its limits beyond which decay begins (McCool & Lime, 2001). Similarly, the specific concept dictates the maximum space needed to carry out a particular activity or the maximum number of visitors/tourists

² The Brundtland Commission Report (WCED 1987, p. 43).

that an area could host for a specific activity, an exhibit or a specific period of time. Essentially, this principle intends to identify and group the environmental risks stemming from human factors. However, there are specific methods that contribute to the evaluation of such risk such as the driver pressure state impact response. This method is accepted by EUROCAT, a European Union program for the epidemiological surveillance of congenital abnormalities³ (Pirrone et al., 2005). Research evidence supports the importance of carrying capacity as a significant factor to affect the competitiveness of tourism destinations (Crouch, 2011). Also, policymakers could consider the specific factor as important to their decision making and to the formulation of their strategy, the issuing of regulations and plans for the design and construction of destinations that attract tourists as well as to the adoption of policies that raise citizens' awareness over sustainability issues (Wei et al., 2015).

Optimal management of sustainable development practices cannot be achieved without the involvement of the local community (Blowers, 1993). This is evident from the early days of Agenda 21 suggested by United Nations Sustainable Development (UNSD, 1992), which pointed at the decisive role and encouraged participation of local communities to the achievement of sustainable development. But the effective solution will be given through an integrated approach (i.e. holistic approach), which accepts that it is difficult to isolate changes in tourism from changes to the rest of the society and economy (Butler, 2000). Moreover, sustainable development is built on the underlying principle of foresight (precautionary principle); namely, to avoid taking up actions which entail future risky implications with irreversible side effects. To this direction, Farsari et al. (2007) supported the view that strategic decisions in tourism industry should consider that sustainable development goes beyond than being simply a key success factor, affecting local resources and quality of life. Going a step further, it is also important to diversify the consumption patterns, which would lead to the adoption of a new pricing policy or would internalize environmental costs. Also, special attention should be paid to the environmental impact of transport and the use of renewable resources. Hence, sustainability requires changes to rules and regulations regarding transportation by all operators.

During the global tourism conference in Lanzarote (WCST, 1995), the basic principles to guide sustainable development in tourism were established. At the heart lie the principles of friendliness, environmental and economic sustainability tourism development. Essentially, these principles invite all decision makers, both professional and non-professional, to adopt the values of sustainability, contributing to sustainable development, realizing the natural, cultural and human environment as a unity and estimating the impact on cultural heritage when taking decisions.

The literature on the topic has proposed sustainable development as a critical success factor

to the achievement of competitive advantage, which could differentiate service packages offered to tourists/customers, even though it may be associated with increased costs compared to conventional forms of tourism (Pulido-Fernández et al., 2015). In line with the above, tourism sector could explore deeper into sustainability factors and, possibly, go beyond the sole environmental aspect of them in a quest for the identification of critical success factors by adding economic and cultural dimensions to it (Lim & Cooper, 2009).

The importance of sustainability in tourism is evident in the theoretical models proposed to measure the competitiveness of tourist markets and destinations. Dwyer and Kim (2003) suggested the inclusion of environmental management practices such as the recognition from the public and private sector of the importance of sustainable tourism development, the existence of laws to protect environment and heritage, and the focus of research on the monitor of the environmental impact of tourism to a model that measures competitiveness. Hong (2009) inferred the inclusion of domestic/local (e.g. climate, scenery, landscape, minerals, spread of diseases, deterioration of natural resources, ethnic tensions, cultural diversification, etc.) as long as global (e.g. global collaboration, terrorism, peace/war zones) environmental factors as being important to the measurement of competitiveness of a tourist destination.

In an effort to maximize the economic benefits of tourism for OECD members, Dupeyras and MacCallum (2013) provided guidance on the measurement of tourism competitiveness. Distinguishing between the core and supplementary indicators, OECD highlights the importance, among others, of natural resources and biodiversity. Both of them could act as drivers to attract tourists to a destination though. Interestingly enough, they are seen as private property and a global common. The rationale is that destinations that are capable of offering unique experiences within natural resources and/or points of heritage have a competitive advantage. The challenge for destinations is to adopt a strategy to capitalize on the above, without underestimating factors such as costs, required infrastructure, education of participants/suppliers of products and services, and sustainable development. Moreover, we should bear in mind that tourism industry is vulnerable to sustainability policies due to its relationship with the consumption of natural resources. Hence, from a policy point of view, tourism should undertake a proactive leadership role in addressing the multifaceted impacts of sustainability decisions or lack of them (McKercher, 1993).

From the discussion so far, it has been made evident that sustainable tourism is a multifaceted phenomenon. Seeing the latter from the side of policymakers, it would be a challenge to combine the supply with the demand side. From the side of the supply, at a macro level, there are regulations and initiatives around the world, which suggest the environmental dimension of sustainability through policies to reduce cost such as the efficient use of resources together with water and energy management initiatives (e.g. UNEP, 2011). A

³ European Surveillance of Congenital Anomalies.

promising area for several destinations to search for their competitive advantage would be their coastline physical beauty. In these cases, policymakers should carefully construct a plan to use this capability in forming their tourism strategy, showing respect to the physical environment through sustainable development policies. In a research for the Danish coastal tourism market, Andersen et al. (2018) propose the need for a holistic approach in forming tourism strategy with the close cooperation between policymakers (showing government commitment to sustainability) and tourism practitioners. Another form of tourism that requires special attention due to its peculiar characteristics is island tourism. Islands around the world are usually associated with luxury vacations targeted to wealthy customer segments. Lee et al. (2015) explored tourism strategy adopted by the Maldives and highlighted the central role of government will, which should be enunciated through relevant laws and regulations to the successful implementation of sustainable development practices in tourism on islands.

On the other side, an analysis of consumers' propensity to include environmental criteria in their decision-making process for the selection of a tourist destination should be performed. Demand forecasts could comprehend investigation of the efficient establishment of hotels, atmospherics within accommodation units, tailor-made services offered, food and beverages offered, best appealing aesthetic attractions to visitors among others (Picard, 2015). Such decisions definitely impact on spatial development too; especially in smaller places. Thus, it could be a critical success factor for policymakers in small tourist destinations, particularly islands. Moreover, visitors'/consumers' views on what Weaver and Jin (2015) call "compassion" tourism could be further analysed and explore whether the focus of tourism on moral principles could prove to be fruitful for the sustainable tourism industry and the selection of tourism destinations, at least for a niche but critical mass of visitors' segment.

Another interesting aspect of sustainable tourism is its dependency on fluctuations on global and/or local spending, its vulnerability to global economic downturns, and its sensitiveness to crises. Boukas and Ziakas (2014) proceeded to an investigation of the impacts of economic crisis and downturns to tourism in Cyprus and they concluded that the lack of comprehensive policies with a holistic impact could be catastrophic. Such findings agree with Farmaki et al. (2015), who used Cyprus again as their case and proposed that success in the sustainable tourism industry cannot be achieved without the support from policymakers and politics. In any case, stakeholders in the sustainable tourism industry could try to realise/create opportunities, designing innovative service packages to attract valuable target segments again. Typical examples are the niche market of geotourism and the establishment of geoparks (Farsani et al., 2018). In order to expand the eco-efficiency of tourism, policymakers in various tourism destinations should properly define and decide on the critical values and then quantify their environmental impact concluding to the thresholds which the tourism industry should

abide with. The second step would be to award a leading role in sustainable principles when tourism strategies are planned, giving priority to cultural and environmentally fragile areas. These strategies should promote environmentally compatible tourism management systems, the so-called alternative/sustainable forms of tourism.

3. SUSTAINABILITY ACCOUNTING IN THE TOURISM INDUSTRY

In light of the above and considering that corporate communication is linked with corporate sustainability decisions, we question ourselves about the role of accounting in an environmentally sensitive sector of the economy. The demand for disclosure of information regarding social responsibility issues from companies has been identified decades ago (e.g. Estes, 1976). Sustainability accounting deals with the rules and methods to record and report information that impacts on environment and society and systematizes the process through which social, environmental and economic issues interrelate (Herzig & Schaltegger, 2006). Measuring the impact of corporate performance relative to sustainability issues is at the heart of this promising area for organizations especially in the tourism industry that aims for the creation of value over time. Findings ways to depict environmental sensitive actions from the side of a business entity is a challenge for the accounting profession. The Sustainability Accounting Standards Board promotes the focus on the above by issuing standards for the accounting management of sustainability issues in many sectors with hotels and lodging being one of them. Trotman and Bradley (1981) had searched for similarities to the characteristics of companies regarding their propensity to disclose such information concluding to the deterministic role of size due to significantly complicated risks they faced. Management accounting offers a tool to the hands of managers to facilitate their informed decision-making. Acknowledging the impact of environmental issues as well as sustainability concern from both policymakers as well as customers, management accounting inevitably suggests practices to capture the environmental impact on accounting numbers and performance of an organization (Bartolomeo et al., 2000). In light of the above, Burritt and Schaltegger (2010) reviewed the literature on sustainability accounting and concluded that it is established on two strands; namely, the first that puts the blame on sustainability accounting for corporate sustainability problems, whereas the second accepts the former as a major tool that helps managers take a number of decisions that affect - directly or indirectly - corporate sustainability matters. However, Deegan (2016) comments that reporting quality has not been improved after the adoption of sustainability accounting principles since key data on these issues is not captured. From the viewpoint of governance, research has identified a positive relationship between corporate governance variables - audit committee in particular - and the decision to enrich narrative disclosures with environmental details (Al-Shaer et al., 2017).

Even though environmental issues have attracted research interest in the hospitality sector with the identification of alternative environmental measures appropriate to capture business performance, there is still a significant gap to link environmental variables important in the specific sector and reporting quality (Chan & Hsu, 2016). In line with the above, the hospitality and tourism sector lacks research on how environmental directives, regulations and best practices could be better reported into financial statements (Kim et al., 2017).

4. CONCLUDING REMARKS

The above discussion makes evident the relevance of sustainable development as a fruitful area for both policymakers and key players in the tourism industry in decision making and the formation of strategy. Especially in cultural and environmentally vulnerable areas, sustainable development strategies should have a priority. These strategies should promote environmentally compatible tourism management systems and alternative forms of tourism too. Hence, development should be geared towards improving the quality of everyone's life.

Moreover, it is important to quantify the environmental impact of the tourism industry, in order to further develop critical values. Sustainable development is undoubtedly a concept that requires attention when designing tourism strategies not only locally (country level), but also on a global level through the formation of directives and regulations from global organizations with the challenge being to feature forms of tourism that respect, protect and develop a destination's resources (Sharpley, 2000). What is important to point again though is the need to combine both sides of the equation; namely, policymakers and practitioners to the successful implementation of the sustainable strategic plan for tourism (Picard, 2015).

Drawing the links between economic sustainability and environmental protection is a fruitful area for future research (Pulido-Fernández et al., 2015). Further analysis and theoretical justification of conceptual frameworks rather than building sole theories on the topic is a fruitful avenue for new researchers in the field (Bramwell, 2015). On the same grounds, scholars should adopt a holistic approach and cooperate with practitioners and policy makers in exploring and proposing effective sustainable policies and strategies in the tourism industry (Murphy & Price, 2005). The

necessity to focus on real-life cases to empirically verify theoretical concepts of sustainable tourism enriched by the testing of emerging concepts (e.g. climate change, ethics, prosperity, peace) is a meaningful way forward as well (Ruhanen et al., 2015).

Given the numerous countries with coastlines and coastal points of interest, future research could be directed to the special needs and characteristics of such places collecting data and developing cases specifically for coastal tourism. Additionally, acknowledging the importance of tourism to the economy of smaller places and islands, research could be directed to them and, by applying theories of chaos, to make proposals to decision-makers regarding potential dangers that could hinder the development and performance of sustainable tourism. A helpful and promising theory in this direction could be complexity theory (Fodness, 2017). Moreover, accounting research could shift its scope to sustainable development since there are interesting contributions to be made targeting at the quality of information hidden behind accounting numbers, which inevitably would improve quality of financial reporting (Bebbington & Larrinaga, 2014). Focusing on decision making on a government basis, future studies could utilize Tourism Satellite Accounts in quantifying environmental pressures at a country level (Ragab & Meis, 2016).

On the same grounds, another avenue for future research in tourism and hospitality industry could be the reconceptualization of accounting by transferring it away from the strict numerical boundaries exploring innovative ways to depict the environmental footprint produced by organizations of the particular sector (Boyce, 2000). Besides, this could contribute to the effectiveness of managers' decision-making, especially during a crisis period. Also, future projects could evaluate the relationship between sustainability reporting and the value added to companies in the tourist industry as a result of adopting sustainable development practices. Based on the analysis made by Ball et al. (2014) who acknowledged the importance of the concept of sustainability in accounting in public sector organizations, research could use cases from this sector to conceptualize knowledge in the field of sustainable development in the tourism industry. Finally, the creation of a research network for processing and disseminating sustainable development and information technologies enriched by the global forum to exchange ideas and promote actions is deemed imperative.

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