



# Eco-innovation in Mexican tourist accommodation companies

## La eco-innovación en las empresas mexicanas de alojamiento turístico

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### Abstract

*Eco-innovation is shown as one of the great challenges of the tourism industry given the growing connection between environmental quality and its good performance. Although the tourism literature has considered the topic of business sustainability in broader terms, the notion of eco-innovations represents a new field of research with studies that still investigate in depth the adoption of eco-innovations among tourism companies. This work addresses the conceptual evolution of eco-innovation to subsequently develop an analytical framework that tentatively explores this concept and its implementation in Mexican tourist accommodation companies through two basic internal characteristics of these organizations: their business performances and their respective sizes, measured in number of rooms. The methodology used has been the case method, making a set of case studies related to six hotel groups of purely Mexican capital through documentary evidence and structured interviews. The conclusions derived from the findings suggest, firstly, that eco-innovation is directly linked to the evolution of business results and the size of organizations and, secondly, that eco-innovation is perceived as a strategic bet generating comparative advantages for Mexican companies studied, independently of the signals issued by an ecologically aware demand and beyond the governmental regulatory actions.*

### Resumen

La eco-innovación se muestra como uno de los grandes desafíos de la industria turística dada la cada vez mayor conexión entre calidad medioambiental y la buena marcha del sector. Si bien la literatura turística ha considerado el tema de la sostenibilidad del negocio en términos más amplios, la noción de eco-innovaciones representa un nuevo campo de investigación con estudios que aún investigan a fondo la adopción de eco-innovaciones entre las empresas turísticas. En este trabajo se aborda la evolución conceptual de la eco-innovación para, posteriormente desarrollar un marco analítico que explore tentativamente dicho concepto y su implantación en las empresas mexicanas de alojamiento turístico a través de dos características internas básicas de dichas organizaciones: sus resultados empresariales y sus respectivos tamaños, medidos en número de cuartos. La vía metodológica empleada ha sido el método del caso, realizando un conjunto de estudios de casos relativos a seis grupos hoteleros de capital netamente mexicano a través de evidencias documentales y entrevistas estructuradas. Las conclusiones derivadas de los hallazgos obtenidos sugieren, en primer lugar, que la eco-innovación está vinculada directamente con la evolución de los resultados empresariales y con el tamaño de las organizaciones y, en segundo lugar, que la eco-innovación se percibe como una apuesta estratégica generadora de ventajas comparativas para empresas mexicanas estudiadas independientemente de las señales emitidas por una demanda concienciada ecológicamente y más allá de las acciones reguladoras gubernamentales.

### Keywords | palabras clave

Sustainable tourism, environmental sustainability, business management, organizational change, enterprises, technological change.

Innovación, eco-innovación, sostenibilidad ambiental, gestión de empresas hoteleras, método de estudio de caso

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## 1. Introduction

A company's ability to compete is increasingly influenced by their relationship with sustainability and innovation, whether they are implemented separately (Hitchens *et al.*, 2005) or synergistically (Esty & Winston, 2009), generating new markets for environmentally benign products (Beise & Rennings, 2005) and a new field of academic study, eco-innovation (Fussler & James, 1996; Jänicke, 2008). The company-environment pairing is transforming processes, products, markets and business strategies by incorporating the principles of sustainability into strategic business planning (Bengochea *et al.*, 2006, Segarra *et al.*, 2011). On the other hand, new technologies and their impact on the changes in the behavior patterns and consumption patterns of today's tourists are not new to the tourism industry (Agarwal, 2002, Aguiló *et al.*, 2005). In short, eco-innovation—or environmental innovation—could play an increasingly revealing role in shaping a tourism model adapted to the principles of environmental sustainability (Hunter & Shaw, 2007).

Companies in the tourism sector are increasingly implementing innovative practices and policies, not only to sustain growth, but also as a response to the changing scale and nature of global environmental change (Bell & Ruhanen, 2016). For some companies, this has included the development and adoption of green innovations (Bell & Ruhanen, 2016). Although tourism literature has considered the topic of business sustainability in broader terms, the notion of eco-innovations represents a new field of research, with studies that still investigate the adoption of these strategies among tourism companies in depth (Tzschentke *et al.*, 2008).

Eco-innovation, as a concept used in academic literature, is relatively recent (Peiró *et al.*, 2014). It includes organizational procedures linked to the incorporation of environmental aspects in different points of the value chain, even in their very designs and organizational strategies (Klewitz & Hansen, 2014). Interest in this concept has grown significantly as a consequence—direct or indirect—of the new options and business possibilities that are opened with eco-innovation and that could arouse a special interest in small and medium-sized companies facing the task of improving their efficiency and competitiveness: i) with the implementation of new or improved processes and products, or ii) with a thorough reconsideration of their business models. Eco-innovation offers, as indicated above, a path of competitive efficiency capable of opening new markets (Ruiz *et al.*, 2013). Although eco-innovation is based on technical progress (Velázquez & Vargas, 2015), it can also be promoted simply through arguments that express a genuine concern for the environment or an evident economic need in the business organization, one aimed to see the gains in efficiency and competitiveness to which reference has already been made. In any case, the unique characteristic of an «eco-innovative process» in organizations is that it must promote and consubstantiate itself always with a clear benefit for the environment.

Eco-innovation appears as one of the great challenges of the tourism industry given the increasing connection between environmental quality and the good performance of the sector (Tzschentke *et al.*, 2008). In fact, numerous studies on the hotel industry have shown that the commitment to environmental practices improves the financial performance of hotels (Tarí *et al.*, 2010, Tzschentke *et al.*, 2008). Despite the

industry's progress to be sustainable, hotels are still struggling with the most effective way to promote their green status (Peiró *et al.*, 2014).

## 2. Literature Review

### 2.1. The concept of Eco-innovation

The term eco-innovation can be defined in many different ways (see table 1), but we can point out by their breadth and generality, at least two definitions that treat eco-innovation as: i) a new list of processes and products capable on the one hand, to increase the value for clients and companies and, on the other, to favor a significant reduction of negative externalities on the environment (Fussler & James, 1996, Mossalanejad, 2011); ii) the appearance of any novelty or improvement in products or processes, organizational redesign or new marketing possibilities that, jointly or in isolation, are capable of optimizing the use of natural resources while minimizing the negative impacts associated with such changes (Alonso *et al.*, 2016).

Ecological innovations are not exclusively related to the individual implementations of companies, but they occupy a very important place in ecological business models. This not only creates products that respect the environment, but also generates a more sustainable economy. Finally, eco-innovation can contribute to the establishment of business and social networks, increase in social capital, business cooperation and the creation of new relationships between the public and private sectors (Alonso *et al.*, 2016). For these reasons, all definitions of eco-innovation agree with the growing value of the environment and reflect two effects of eco-innovations: significant reduction of negative externalities and better use of the productive factors obtained from the environment (Hojnik & Ruzzier, 2016).

Table 1. Definitions of eco-innovation

Author	The concept of Eco-innovation
(Fussler & James, 1996)	New products and processes that offer value to the client and the business, but that significantly reduce environmental impacts.
(Klemmer <i>et al.</i> , 1999)	All actions undertaken by relevant social actors (companies, politicians, unions, associations, churches, private homes) that: i) develop new ideas, behaviors, products and processes, ii) apply or introduce them, and iii) contribute to the reduction of environmental burdens or achieving ecologically specified sustainability objectives.
(Andersen, 2002)	Any innovation capable of attracting green rents to the market.
(Little, 2005)	The creation of new market spaces, products, services or processes driven by social, environmental or sustainability problems.

(Charter & Clark, 2007)	Process in which sustainability considerations (environmental, social, financial) are integrated into the company's systems, from the generation of ideas to research and development (R&D) and commercialization. It applies to products, services and technologies, as well as new business and organizational models.
(Kemp & Arundel, 1998) (Rennings, 2000) (Rennings & Zwick, 2003) (Kemp, 2010)	The production, assimilation or exploitation of a product, a service, a production process, a commercial method or new management for the organization (that develops or adopts it) and that favors, throughout its life cycle, a reduction of environmental risk, pollution and other negative impacts derived from the use of resources (including the use of energy) in comparison with the relevant alternatives.
(Oltra & Saint Jean, 2009)	Processes, practices, systems and new or modified products that benefit the environment and contribute to environmental sustainability
(Freeman, 1996)	It is the same as other types of innovation, but with two important distinctions: i) it represents an innovation that results in a reduction of the environmental impact and ii) its scope can go beyond the conventional organizational limits of the innovative organization and involve pacts or broader social agreements that trigger changes in sociocultural norms and existing institutional structures.

From the different concepts of eco-innovation it is possible to observe that this would manifest itself as a three-dimensional process, feeding on Ecology, Economics and Technology (Hong & Shuai, 2008, van Berkel, 2007). Any organization would be located in that three-dimensional space looking to progress, taking into account the opportunity costs associated with advancements without environmental improvements that could have lead to better business results or, for example, having avoided consequences on the administrative (sanctioning scheme according to the *polluter pays principle*) and social level (shortage of resources and impoverishment of future generations), derived from advancements without considering the environment.

Therefore, eco-innovation seeks to balance commercial development and productivity with ecological concerns and respect for the environment, so that the tourism sector can conserve and efficiently use natural resources. As a result, eco-innovation directly influences economic and social growth through caring for the environment, maintaining and creating new jobs, and acquiring new skills, new products and new businesses, all of which positively influence the economy (Alonso *et al.*, 2016).

There is still no consensus on the definition of the concept of eco-innovation, which implies that we are in an initial stage of construction and development in this field of research, which is even more evident when the analysis focuses on the tourism sector, given the lack of studies related to this topic (García *et al.*, 2015). In fact, when approaching the few existing studies, it can be observed that the concept of eco-innovation predominant in the analysis of hotel accommodation is perceived as a pairing of

environmental management and innovation, oriented to the continuous improvement of the organization (Velázquez & Vargas, 2015).

## **2.2. Sectoral evolution of studies on eco-innovation**

Previous research on sustainability in the tourism sector originated two decades ago as an analysis of the adoption of environmentally friendly practices among other works (Alonso *et al.*, 2015) and their economic impact (Perramon *et al.*, 2014). Sustainability affects the economy in three ways: i) it has a direct effect through energy saving; ii) it has an indirect effect because an image that respects the environment creates a competitive advantage; and iii) the business gains the advantage of positioning itself as an ecological company (Best & Thapa, 2013; Hsiao & Chuang, 2016). To a lesser extent, previous research has found that there is a social impact (Bagur *et al.*, 2013) and an impact on the acquisition of unique capabilities (Tesone, 2004).

However, eco-innovation research is more recent; therefore, it is in an initial or embryonic stage (Alonso *et al.*, 2016). As is the case in other fields of study, it began in the manufacturing sector (Segarra *et al.*, 2014). In particular, the creation and adoption of ecological innovations has been analyzed in this sector, and a series of triggers for their development have been identified (Alonso *et al.*, 2016): i) investment in Investigation, Development and Innovation (I+D+i) and the capacity of exporting an innovation (Horbach *et al.*, 2012), have little place in the services sector; ii) the possession or size of a critical mass of resources and capacities, the mastery of certain technological capabilities and the existence of specific organizational characteristics for each company (Biondi *et al.*, 2002), can belong to all types of sectors. In any case, it seems that there is a consensus that indicates that environmental regulation and market mechanisms are the main triggers for the creation, development and dissemination of eco-innovations (Horbach *et al.*, 2012); iii) It comes from the environment in which the company develops its activity more than from the company itself (del Río, 2005). Therefore, subsequent research indicated that internal factors could serve as greater boosts than external factors, because companies have little or no control over external factors (Bossle *et al.*, 2016).

We have also identified barriers to the implementation of eco-innovations in the services sector (Alonso *et al.*, 2016), including the lack of absorption capacity in processes, trained human resources, commercial maturity and technological capabilities.

Eco-innovation in the tourism sector has been scarcely documented in academic research or scientific articles (Alonso *et al.*, 2016). The tourism-environment link is evident, at least in three aspects: i) the environment is the basis for the development of many tourist attractions (nature tourism, active tourism, rural tourism, hunting tourism, etc.); ii) the environment is the source of extraction of the productive factors used in any organization; and iii) the environment is the landfill to which waste and polluting emissions go. The topics that have been studied in the academic literature include the role of eco-innovations in the choice of tourist establishments, such as restaurants (Teng & Chang, 2014), the types of eco-innovations adopted by restaurants (Daim *et al.*, 2013; Rodgers, 2007) and hotels (Bastič & Gojčič, 2012; Horng *et al.*, 2016), and the importance of using eco-innovations in the design of the physical environment of restaurants to generate an innovative atmosphere (Horng *et al.*, 2013).

It is important to highlight that eco-innovations include numerous activities that affect companies and tourist destinations in areas such as energy; recycling; water; development of new construction; interior design; engineering projects; responses to external environmental degradation; new products, processes and business models; adaptations of existing products and materials; new materials; the use of eco-biological products; the ordering of the territory; and the welfare industry, which, in some regions, may also include the development and transformation of organic products, ecotourism and therapeutic tourism (Alonso *et al.*, 2016). If we consider that each eco-innovation involves the combination of factors with numerous activities, we can conclude that the generation, development, adoption and diffusion of eco-innovations are different and much more complex than those of other innovations (Karakaya *et al.*, 2014) because each eco-innovation includes several innovations (Alonso *et al.*, 2016; Velázquez & Vargas, 2015).

### **2.3. Proposed Hypothesis**

Initially, the driving factors of eco-innovation could be placed both on the demand side —market— and on the supply side —capacity of the organization—. Thus, driving factors include: i) the demands on the part of the clients, ii) the existing regulations in the market that promote or impose them, iii) the improvement of the reputation of the organization, iv) the reduction of costs or v) the social commitment of a business in terms of corporate social responsibility.

In this study an attempt will be made to correlate the relationship between eco-innovation and two hypotheses linked to the internal characteristics of accommodation companies: their business results (measured in terms of annual turnover) and size (measured in relation to its accommodation capacity).

There is a direct relationship between financial performance, business results and eco-innovation that has been manifested in various works (Doran & Ryan, 2012; Przychodzen & Przychodzen, 2015): a high financial strength is a necessary condition for the development of investments in eco-innovation and, at the same time, the generation of positive results over time, inclines accommodation companies to make a commitment to eco-innovation. In addition, this relationship tends to be biunivocal: successful accommodation companies favor eco-innovation and eco-innovative accommodation companies tend to obtain better results than non-eco-innovative ones. Based on the above, the following hypothesis is proposed:

*H1: The greater the turnover of the accommodation company, the greater the incentive to eco-innovate*

Hotel organizations do not evolve towards eco-innovation from similar positions. One factor that can be decisive is the size (De-Marchi & Grandinetti, 2012; Chen, 2008, Demirel & Kesidou, 2011), to achieve incentive and streamline eco-innovation processes. There are works that indicate the high correlation between size and eco-innovation, and they argue that larger organizations tend to be more inclined to bet on eco-innovation (Bowen, 2000, De Marchi & Grandinetti, 2012), which can be a consequence associated with the greater government pressures received and greater control over compliance with environmental regulations.

On the other hand, from the internal analysis of business organizations (Churchill & Levis, 1983, Greiner, 1997), the question is whether size positively or negatively conditions commitment to eco-innovation (Molero & Garcia, 2008, Lazaric & Dennis, 2005; Brunnermeier & Cohen, 2003). Based on the above, the second hypothesis is proposed:

*H2: The greater the number of rooms of the accommodation company, the greater the incentive to eco-innovate*

### 3. Methodology and Sample

The methodology for conducting the empirical study is case method, because it is considered to meet two basic conditions or dimensions (Yin, 2009): the type of questions that this research seeks to respond to and, finally, that the problem addressed is contemporary.

Creswell (2005) considers that in a case study there should be cross-checking of data sources. Through it, we ensure constructive validity, since the use of different data sources and methods of analysis will allow us to get a more accurate picture of the reality we are investigating (Johnston *et al.*, 1999).

This research has used different methods of collecting information: a) documentary evidence, which could be obtained through advertising, catalogs, reports and reports from companies, as well as financial data, among others and b) structured interviews via Skype and e-mail.

The selected accommodation companies (convenience sampling) are six hotel chains belonging to the main Mexican national hotel groups, which have been named A1, A2, A3, A4, A5 and A6. The profile of each of the organizations studied is shown in a summarized way below (see table 2).

### 4. Analysis of the results

The tourism sector, in general, and the hotel industry, in particular and like many other sectors, has not been oblivious to changes in political and social attitudes regarding the environment and its commitment to environmental sustainability. In this new context, accommodation companies have had to face the new challenges posed by those environmental innovations that, incorporated in their respective internal processes, are able to offer a way of compatibility between the business activity typical of hotels and the environment. However, these eco-innovations entail, in addition to an awareness of the need for protection and balanced (sustainable) use of the environment, a financial bet whose returns tend to be seen not so much in the short term as in the medium or long term. In many cases, this leads companies to rethink their organizational structure to obtain competitive advantages built on this subgroup of innovations of an ecological nature.

The first hypothesis is that the higher the turnover of the accommodation company, the greater the incentive to eco-innovate.



Table 2. Description of the case studies

DENOMINATION	AGE	LEGAL FORM	RANGE OF EMPLOYEES	BILLING RANK (millions MXN)	SECTOR OF ACTIVITY (SCLAN)	CORPORATE HEADQUARTERS	N° OF HOTELS	N° OF ROOMS	TYPOLGY OF THE HOTELS	CATEGORY
A1	50	SAB de CV	>10000	More than 5,000	812990	Mexico City	150	24,000	Urban or city hotels Beach hotels	Special Gran Turismo
A2	15	SAB de CV	5001-10000	2,001-2,500	721111	Mexico City	135	14,800	Urban or city hotels	4 stars 3 stars
A3	19	SAB de CV	1001-5000	1,001-1,500	721111	Mexico City	17	6,686	Urban or city hotels Beach hotels	Gran Turismo 5 stars 4 stars
A4	40	SA	1001-5000	1501-2000	721111	Mexico City	51	4,500	Nature hotels Monuments hotels	Gran Turismo 4 stars
A5	37	SA de CV	1001-5000	2001-2500	721111	Mexico City	22	5,600	Urban or city hotels Beach hotels	Gran Turismo 5 stars 4 stars
A6	33	SA de CV	1001-5000	2001-2500	721111	Quintana Roo	16	7,000	Beach hotels	Special Gran Turismo 5 stars



Using the information obtained through case studies, we find that organizations are becoming more environmentally aware. The representative of A1 recognizes that in the last years the organization began to take the relationship between its hotels and the environment seriously. They point out that they first began with an approach to the idea of sustainability from the people, to subsequently move towards the environment. His organization detected an increasing interest on the part of its clientele in carrying out a leisure that was respectful to people, cultures and the environment, to which was added the concern of the governmental administrations that was materializing in mandatory regulations. They admit to having reached that awareness and environmental sensitivity pushed by demand. The representatives interviewed from A4, A5 and A6 offer a similar argument: they act in terms of environmental sensitivity (certifications and environmental sustainability plans, energy efficient equipment, etc.) driven by demand and government requirements.

In all these cases, it is emphasized that the financial capacity of the respective organizations made it possible to introduce different environmental management procedures aimed at achieving certifications and stamps. Over time, this formalization and institutionalization of good environmental practices within each organization has resulted in better results, reaching a range of customers who are increasingly aware and respectful of the environment.

The representatives of A2 and A3 enthusiastically expose the achievements of their respective organizations in eco-innovation. For both, beyond being or representing a necessary adaptation to social changes specified in government regulations or a perception of the new concerns of their clientele, it was a matter of advancing and improving the organization itself. For these interlocutors, betting on eco-innovation is equal to having long-term vision: energy is saved and, therefore, costs are reduced but, in addition, the prestige of the organization itself is increased. In A2 and A3, they affirm that their commitment to environmental sustainability through the adoption of innovations results in positive economic feedback for the organization. For A2 and A3, eco-innovation can be defended in their organizations not only by the need to build an awareness of respect for the environment, but the same long-term economic rationale makes the adoption of environmental innovations an opportunity to distance income and costs to advance benefits.

There is a direct relationship between financial performance, business results and eco-innovation (Doran & Ryan, 2012; Przychodzen & Przychodzen, 2015): a good financial soundness is a necessary condition for the development of investments in eco-innovation and, at the same time, the generation of positive results over time, inclines accommodation companies to make a commitment to eco-innovation. We can derive the following result based on the observations made:

*Result 1. Accommodation companies with the highest turnover have more incentives to eco-innovate because they perceive eco-innovations as investments whose returns in the medium and long term allow them to consolidate a competitive advantage derived from the positive assessment by a clientele increasingly sensitive to their relationship with the environment.*

As a second hypothesis, we propose that the greater the number of rooms in the accommodation company, the greater the incentive to eco-innovate.

Using the information obtained through the case studies, we find that all those responsible for the groups analyzed recognize the need for better waste management, optimal use of energy and water in all the hotels of their respective organizations. Particularly in the cases of A1, A2 and A3, the direct relationship between this directive concern and the size of the hotel is underlined, especially by the control of variable indirect costs associated with the processes of consumption and operations within the accommodation units. A2 and A3 refuse to transfer the burden of conscience to the client because encouraging them, for example, to use water responsibly is a wake-up call to their conscience, but it is not a suitable business solution to the challenges that arise in the accommodation relationship between tourist and environment.

Therefore, the size of accommodation companies, measured in the number of rooms, can stimulate and speed up eco-innovation processes (De Marchi & Grandinetti, 2012, Chen, 2008, Demirel & Kesidou, 2011). Large companies are more prone to eco-innovation (Bowen, 2000, De Marchi & Grandinetti, 2012). This is due to the fact that they are under greater governmental pressures and are more closely monitored by the government Administration.

On the other hand, when analyzing the internal structure of the company, and keeping in mind that this will be related to its evolution (Nelson, 1982, Churchill & Levis, 1983, Greiner, 1997), as well as its size, the research question proposed asks whether this variable can suppose a speeding down on eco-innovation (Molero & García, 2008, Lazaric & Dennis, 2005, Brunnermeier & Cohen, 2003). We can derive the following result based on the observations made:

*Result 2. The greater the number of rooms in hotel establishments, the greater their incentive to eco-innovate in order to efficiently manage the available resources and thus obtain significant reductions in indirect variable costs.*

## 5. Conclusion and discussion

Based on the results obtained, it has been confirmed that in the Mexican hotel companies analyzed: i) the greater the turnover of the accommodation company, the greater the incentive it has to eco-innovate, and ii) the greater the number of rooms, the greater the incentive to eco-innovate. However, the argumentation used allows us to classify these organizations into two groups: i) reactive eco-innovators (their annual reports include progress in environmental matters, progressively certifying their hotels in environmental quality and underlining the change in market trend that is becoming more and more oriented to sustainable products and services) and ii) pro-active or anticipatory eco-innovators (develops annual sustainability reports with the actions carried out in this field trying to go ahead of the standards in this matter and trying to make use of eco-innovations in their accommodations).

In the first group (A1, A4, A5 and A6) the “push factor” was twofold: firstly, government regulations to be met and, secondly, the customers’ greater sensitivity and concern for the environment. From there, these organizations become aware that eco-innovation is not a costly obligation but a long-term strategy to reduce costs and improve the position of the different companies of their respective organizations. In

the second group (A2 and A3), there is a certain anticipation and vision “beyond” the demands of the market that makes them take control of internal processes and operations of the accommodation units of their respective groups, orienting them toward eco-innovation from the conviction that this is the right strategy to make a quality and profitable hotel.

Business organizations seek to adapt to the conditions derived from a new socio-economic and ecological framework and their leaders are beginning to accept the value of an organizational culture capable of transforming and guiding companies towards sustainable development. The first conclusion is to see eco-innovation as a source of competitive advantages (Buhl *et al.*, 2016; Kemp & Horbach, 2007; Rosen, 2001) in the medium and long term associated with: i) a significant reduction in costs, ii) an improvement in business reputation, iii) access to segments of the market (*targets*) that are ‘environmentally aware’ and want to enjoy their leisure in a way that is sustainable (respectful) to the environment.

The second conclusion is to highlight the driving role of government policies to guide hotel companies towards good environmental practices. In fact, eco-innovations and their business implementation in the accommodation sector should be supported by the different instruments or mechanisms (incentives, subsidies and tax advantages, mainly) and available government policies (policies for information dissemination, technology transfer and of creating associations and clusters of mixed public-private nature) in order to minimize the possible barriers to knowledge (Doran & Ryan, 2012; Hojnik & Ruzzier, 2016). In some cases, this orientation will have a reactive nature: the regulations act by defining the limits of what is environmentally acceptable (Horbach *et al.*, 2012; Rennings, 2000). In others, a dialogue and a social pedagogy can be opened that, beyond the government-accommodation company relationship, promotes an ecological conscience among citizens, and whose decisions in the market are modeled by it.

This work presents important limitations regarding sample selection that will, in the future, require a broader and more detailed study to see the evolution of eco-tourism innovation in a country as rich and as diverse in tourist terms. The profile of the groups considered is very marked by its urban character, but it would be desirable to evaluate housing units with different orientations to detect if there are significant differences in the incorporation of environmental innovations depending on the market to which the companies are directed.

In summary, this study tries to offer a modest attempt to approach a topic of capital importance for the strategic management of hotel companies in general, which is progressing in Europe in an outstanding way, and which is expected to follow an analogous rhythm in the context of Mexican business, considered to be one of the most important in Latin America.

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