# Bridging the distance between heritage conservation and business management: heritage as a customer 'experience' – a case study of the Acropolis Museum in Athens

IOANNIS POULIOS, DANAI NASTOU & LEFTERIS KOURGIANNIDIS

#### Abstract

The distance between heritage conservation and business management is becoming increasingly narrower. In this context, the present paper introduces to the museum sector a business model from the entertainment and tourism sector, which has proved successful even in periods of economic crisis: the 'experience model'. The Acropolis Museum in Athens is used as a case study, with reference to specific tourism advertising spots that present the visit to the Museum as an 'experience'.

Firstly, the 'experience model' is outlined as formulated in the business field. Subsequently, the model is applied to the Acropolis Museum. Aspects of the Museum that have a positive effect on the overall experience of the visitor, as well as those that have a rather negative effect, are pointed out.

The paper also addresses questions on the relationship between the experience model and the concept of authenticity (as defined in heritage conservation) – i.e. whether and how authenticity can be incorporated in the model -, also with reference to most recent developments in the heritage field as outlined in the Nara+20 Document. It is shown that the experience model may be centred on the authenticity of a heritage place, while at the same time physically disconnecting the visitor from the place itself and allowing them to create a sense of the authenticity of the place 'from a distance'.

#### Keywords

Authenticity – Nara+20 Document – business management – experience model – Acropolis Museum Athens.

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## Introduction

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Nowadays, the distance between heritage conservation and business management is being gradually narrowed, mostly because of the two following developments. First, cultural organisations struggle to survive within the current economic crisis and attempt to acquire a competitive advantage in the entertainment and tourism industry, while at the same time becoming vehicles for the sustainable economic and social development of the broader areas. In this attempt, they often resort to the adoption of models and practices from the business field.<sup>1</sup> Second, 'emerging modes and technologies for accessing and experiencing heritage' are recognised, as explicitly noted in the Nara+20 Document.<sup>2</sup> This results in the embracement of a much broader spectrum of heritage places and practices such as cases of re-enactment of heritage or fictitious heritage. At the same time, the use of the term 'experience' in particular tends to open towards embracing the commercial uses of heritage.3 On this basis, 'authenticity' - the key concept in heritage conservation<sup>4</sup> – is in the process of being sensed in a way that would adjust to the embracement of this much broader spectrum of heritage places and practices, including the commercial uses of heritage<sup>5</sup>, and also to the accepting of continual evolution and creation of heritage in the present-future.<sup>6</sup>

The present paper is linked to both aforementioned developments. It introduces a business model from the entertainment and tourism sector which has proved successful even at periods of economic crisis – the model of designing experience or the so-called 'experience model'<sup>7</sup> – in the museum sector, approaching heritage as a customer 'experience'. The concept of 'authenticity'<sup>8</sup> is central to the 'experience model' though sensed in a different way than in heritage conservation. The Acropolis Museum in Athens is used here as a case study, given that the Greek State / Ministry of Culture and Tourism, in an attempt to deal with the consequences of the current economic crisis on tourism, launched a tourism advertising campaign (targeting foreign and Greek visitors) that presented the visit to Greece and Athens, with special reference to the Acropolis Museum, as an 'experience'.<sup>9</sup>

- <sup>4</sup> See Larsen 1995; Ucko 2000; Holtorf & Schadla-Hall 1999.
- <sup>5</sup> ICOMOS Japan 2014.
- <sup>6</sup> Poulios 2015a; Poulios 2014a; Poulios 2014b.
- 7 Gilmore & Pine 1999.
- <sup>8</sup> Gilmore & Pine 2007.

<sup>&</sup>lt;sup>1</sup> Poulios & Touloupa 2015.

<sup>&</sup>lt;sup>2</sup> ICOMOS Japan 2014.

<sup>&</sup>lt;sup>3</sup> See Poulios 2015a.

<sup>&</sup>lt;sup>9</sup> The paper focuses on the tourism advertising campaign of the State on the Acropolis Museum. The many other media through which the Museum is presented by other sources (e.g. tourism agencies,

The key questions of the research are: (i) whether the methodology of the 'experience model', as formulated and implemented in the business sector, can apply to museums and thus whether heritage can be offered as a customer 'experience'; and (ii) whether, and to what extent, this methodology of the 'experience model' can be applied to the Acropolis Museum.

Firstly, the 'experience model' is outlined as formulated in the business field, with reference to successful examples from the cultural sector. Emphasis is on the methodology of the model. Subsequently, the model is introduced to the Acropolis Museum, with reference to two tourism advertising spots that present the visit to the Museum as an 'experience'. Aspects of the Museum that have a positive effect on the overall experience of the visitor, as well as those that have a rather negative effect are pointed out.

The presentation of the 'experience model' is based on a review of literature, which mostly derives from the business field. The analysis of the application of the model to the Acropolis Museum is based on field visits and a visitor survey.

#### 'Experience' and the 'experience model'

'Experience', differentiated from 'service', is a personal, particularly strong connection, based on emotions and imprinted in memory, that the company develops with its customers.<sup>10</sup> Thanks to the experience, the loyalty of the customer to the company is enhanced and thus the customer becomes a 'friend' of the company. Experience comprises various services that contain personal, innovative elements in the points of contact of the company with the customer and that are connected to each other in a unified context, with unified objectives.<sup>π</sup> In this way, while designing an experience, it is most important not only to select the individual services but even more to add personal, innovative elements to these individual services and also to connect them to each other.

The key stages in the development of the concept of 'experience' were focused on the following notions: 'experiential industry',<sup>12</sup> 'experiential aspects of consumption',<sup>13</sup> 'dream society',<sup>14</sup> and 'experience society'.<sup>15</sup> Yet, the work that marked a major/most important shift in the development and establishment of

independent travellers) and even by the Museum itself (through billboards, website, publication), as well a comparative analysis between the former and the latter in connection with the 'experience' model, are beyond the scope of the paper; they could be the topic of future research on the subject. <sup>10</sup> Gilmore & Pine 1999; Schmitt 1999, 25; Schmitt 2003.

<sup>&</sup>lt;sup>п</sup> Voss & Zomerdijk 2007.

<sup>&</sup>lt;sup>12</sup> Toffler 1971.

<sup>&</sup>lt;sup>13</sup> Holbrook & Hirschman 1982.

<sup>&</sup>lt;sup>14</sup> Jensen 1999.

<sup>&</sup>lt;sup>15</sup> Schulze 1992.

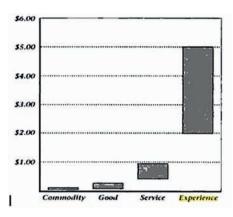


Figure 1. The fundamental principle of the 'experience model':  $good \rightarrow product \rightarrow service \rightarrow expe$ rience; the numbers on the vertical axis indicate the profit generated (by a good, a product, a service,and an experience) (after Gilmore & Pine 1999, 2)

the concept is *The Experience Economy: Work is Theatre & Every Business a Stage* by Gilmore and Pine.<sup>16</sup>

The 'experience model' is based on the following principle: the transition from a 'good' to a 'product', then to a 'service' and eventually to an 'experience' (see Figure 1). An indicative example from the wine industry is: grapes ('good')  $\rightarrow$ bottle of wine from the production factory ('product')  $\rightarrow$  drinking a bottle of wine in a restaurant ('service')  $\rightarrow$  drinking a bottle of wine at a music stage during a live concert ('experience'). In each stage of the process, the production cost increases, but profit multiplies. A company emphasises the last stage of the process, i.e. the transition from the 'service' to the 'experience', for the following reasons: firstly, the profit margin is much larger compared to the other stages (see Figure 1); and secondly, it is much easier for a company to develop and allocate resources to this last stage rather than to the entire process.

The 'experience model' was applied initially to the entertainment and tourism sector and was gradually expanded to the entire business sector, while it has recently been applied to the cultural sector. This has proven successful even within the economic crisis, as demonstrated by the live performances company Cirque du Soleil and the Cerritos Public Library in the State of California, US. Cirque du Soleil does not simply offer 'a spectacular show featuring an international cast of world class acrobats, aerialists, jugglers, high wire and trapeze artists set on

<sup>16</sup> Gilmore & Pine 1999.

a grand stage at ... Resort & Casino' ('service') but mostly 'a visual vortex set in a twisted acrobatic fantasy universe where, little by little, chaos and craziness give way to a true celebration' ('experience').<sup>17</sup> Cerritos Public Library does not simply offer books, book services and programming ('service'), but also 'quiet areas for study and contemplation as well as lively areas where the imagination could run wild' ('experience').<sup>18</sup>

#### Methodology of the 'experience model'

In the 'experience model' a series of tools are used, namely: a) designing the 'experience' as a theatrical play; b) designing the involvement of the customer in the experience; c) designing the 'experience' as a journey; and d) connecting different 'experience' sites in a unified 'destination'.

Each of these tools will be explained in separate subsections.

#### Designing the 'experience' as a theatrical play

The experience is designed as a theatrical play ('staged experience'), consisting of the following elements:<sup>19</sup>

- a) The *stage*: the space that accommodates the experience. The stage comprises both the physical space and the digital space.
- b) The actors: those that present the experience, i.e. mostly the personnel.
- c) The *backstage*: the process of the preparation of the experience. In the design of the experience, it is important to reveal part of the backstage to the customer.
- d) The *audience*: those that attend-receive the experience. It is important that the experience targets as many senses of the audience as possible, especially vision, which is considered the most powerful sense. It is also important that the experience is linked to the ideological background of the audience, leading to the further enhancement of the audience with the company.
- e) The *script*: the process of delivering the experience to the audience, in other words the way the individual services are connected to each other in a unified context.<sup>20</sup>

<sup>&</sup>lt;sup>17</sup> Cirque du Soleil 2015; see also Kim Chan & Mauborgne 2005, 12-18.

<sup>&</sup>lt;sup>18</sup> Waynn Pearson cited in Library Journal 2003; see also Cerritos Library 2015; on the application of the 'experience model' to Cerritos Public Library see Kourgiannidis 2011.

<sup>&</sup>lt;sup>19</sup> Gilmore & Pine 1999.

<sup>&</sup>lt;sup>20</sup> See also Voss & Zomerdijk 2007, 107.

In the Cerritos Library, for instance, the 'stage' comprises the external and internal space of the building, and the digital space (the website); the main 'actors' include the book collection, the artworks, the PCs and the plasma screens, while the secondary 'actors' include the library personnel and the digital personnel (those helping with the website); the 'backstage' consists of the personnel for the collection of the books, and the technical personnel; the 'audience' comprises those that physically use the Library and those that visit the website of the Library; 'script' is the entire way the individual services of the Library are connected to each other (e.g. providing information on the Library and its books through the website, offering the collection of the books, providing further information on the plasma screens, the café-restaurant, and the Library shop).

This 'staged experience', as described above, targets all customers. At the same time, however, individual, 'authentic' experiences are designed for different customer segments and, if possible, for each customer, so that the customers develop an even more personal and stronger, an intimate connection with the company.<sup>21</sup> In the Cerritos Library, for instance, the 'Study Room of the Old World', which is decorated with old furniture and a fireplace, targets the older users, while the 'Children's Library', which is equipped with statues of dinosaurs and an aquarium, is for the children.

#### Designing the involvement of the customer in the experience

The involvement of the customer in the experience is defined by the following factors (see Figure 2):

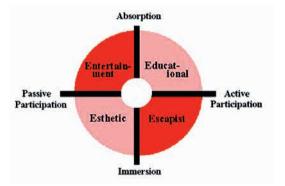


Figure 2. Designing the involvement of the customer in the experience (Gilmore & Pine 1999)

<sup>21</sup> Gilmore & Pine 2007.

- a) The degree of the involvement of the customer in the experience (see Figure 2: horizontal axis). The degree of involvement can be either (i) passive: the customer simply receives the experience; or (ii) active: the customer is involved in the offering of the experience and thus affects the experience; and
- b) The type of connection of the customer with the experience (see Figure 2: vertical axis). The type of connection can take the form of either (i) absorption: the customer pays attention, and is engrossed in the experience; or (ii) immersion: the customer becomes part of the experience, in a physical or digital way.

The character of the experience is defined by the combination of the aforementioned elements, and can take the form of: a) entertainment: e.g. watching a movie at the cinema; b) educational: e.g. visiting a historic place; c) aesthetic: e.g. having a meal at a restaurant; and d) escapist: participating in a safari or scuba-diving.

#### Designing the 'experience' as a journey

The experience is designed as a journey, which expands in a broad chronological period that covers all the points of contact, both physical and sentimental, of the company with the customer.<sup>22</sup> Designing the experience as a journey consists of three phases: before the visit; during the visit (arrival, the main body of the experience and departure) and after the visit.

#### Connecting different 'experience' sites in a unified 'destination'

The connection of different 'experience' sites leads to the creation of a new, holistic experience of a unified, broader 'destination'. In this way, none of these sites operates individually, but they offer comparable experiences that are all linked to each other, leading to the creation of an even stronger connection with the customer. For example, in a shopping mall or in Disneyland the different shops are linked to each other, so that the customer/visitor has a unified experience of the place: e.g. shopping, having a meal, playing, taking photos and buying souvenirs. It is important that these different sites retain a shared, unified service (based on certain common characteristics) towards the customer, so that the customer has a unified – and not conflicting – image of the individual sites.<sup>23</sup>

<sup>&</sup>lt;sup>22</sup> Voss & Zomerdijk, 2007, 102.

<sup>&</sup>lt;sup>23</sup> Voss & Zomerdijk 2007.

In the shopping mall and in Disneyland, the different shops may have a shared marketing campaign, website or entrance fees.

#### The Acropolis Museum

The Acropolis Museum is dedicated to a most significant and symbolic heritage site of Greece and of the (Western) world as a whole, and is built very close to this site. The Museum was inaugurated in the midst of the crisis (in June 2009). The Museum was constructed with funding from EU and state resources and enjoyed from its very opening full political support and tremendous national and international promotion. The Museum had a – for Greek standards – unprecedented two million visitors in the first year of its operation and maintained very high numbers of visitors to the present (see Figure 3).<sup>24</sup> The main objectives of the Museum are:<sup>25</sup> a) to display artefacts from the Acropolis site; b) to establish direct connections with the Acropolis site; and c) to claim the return of the Parthenon Marbles especially from the British Museum.

August 2014				
Museum	Visitors	Archaeological site	Visitors	
Acropolis Museum	167,594	Epidaurus	60,789	
National Archaeological Museum	51,405	Mycenae	51,037	
Ancient Olympia Museum	19,772	Acropolis	192,912	
January 2014				
Museum	Visitors	Archaeological Site	Visitors	
Acropolis Museum	51,580	Epidaurus	5,275	
National Archaeological Museum	19,209	Mycenae	6,157	
Ancient Olympia Museum	1,975	Acropolis	40,398	

Figure 3. Visitor numbers at the Acropolis Museum in comparison to other archaeological sites and museums in Greece (data provided by the National Statistical Service of Greece)

<sup>24</sup> Poulios & Touloupa 2015; see also Liakos 2011.

<sup>25</sup> Acropolis Museum 2015.

## The visit to the Acropolis Museum as an 'experience'

In May 2010, the Ministry of Culture and Tourism of Greece, in an attempt to deal with the consequences of the economic crisis (which started in 2008 in Europe, and became most evident in Greece) on Greek tourism, launched a tourism advertising campaign for the promotion of the country in the foreign and the domestic market.<sup>26</sup> In the context of this campaign, two advertising spots for websites and social media were produced that present the visit to the Acropolis Museum as an 'experience':

a) 'You in Greece – You in Athens', targeting foreign visitors.<sup>27</sup> The spot (see Figure 4) depicts anonymous foreign visitors describing their visit to Greece, with special reference to the Acropolis site and Museum. The visit to Greece is not described simply as a 'service' ('not a one-time visit'), but as a personal 'experience' ('it [Greece] is the centre of the world, the centre of democracy and civilisation, and if it began here, we need to know it'; 'you've seen pictures of the Parthenon in your entire life... and then you actually see it'; 'it's crazy to be here. I studied a lot of ancient art, and seeing it all in person is really amazing').



Figure 4. The advertising spot You in Greece – You in Athens: a foreign visitor, inside the Acropolis Museum and with the Caryatids in the background, describes her experience of visiting Greece and the Museum (Greek National Tourism Organisation 2010b, 0.44: http://www.youtube.com/ watch?v=znn3LmP-7Bw)

- <sup>26</sup> Greek National Tourism Organisation 2010a; see also Poulios & Senteri in this volume.
- <sup>27</sup> Greek National Tourism Organisation 2010b.

b) 'Greece part of our soul – the Acropolis Museum', targeting Greek visitors.<sup>28</sup> The spot depicts an employee of the Acropolis Museum talking about the Museum and its visitors. The visit to the Museum is presented not simply as a group of high-quality services ('the Museum is perfect'; 'the most important monuments of our history'), but as an experience that is direct and particularly strong ('the visitors are usually overreacting, they tend to touch them [the exhibits], and they are overwhelmed while admiring them'; 'visitors leave [from the Museum] always with a smile on their face') and is also being repeated ('*every single day* my aim is to ensure that visitors leave [from the Museum] always with a smile on their face'). Furthermore, the visitors are portrayed not only as those receiving the experience, but also as themselves being an active and inseparable part of the experience offered (with their physical presence being outlined through the transparent glass surfaces of the museum building, and also being implied by the shadow cast on the exhibits).

## Visitor survey on the application of the 'experience model' to the Acropolis Museum: methodology and findings

The aim of the survey was to define whether and to what extent the Acropolis Museum has applied the 'experience model' as formulated in the business field, by examining and measuring visitors' connection with the Museum. To this end, the survey included questions on a series of aspects related to the visit to the Museum, such as the organisation and interpretation of the exhibition, the orientation of the Museum, the information provided, and favourite parts of the exhibition. In addition, a number of questions were raised on issues such as the type of experience offered, the learning outcomes gained, and the values represented.

The technique of exit interviews was employed (i.e. interviewing visitors after the completion of their visit). Both foreign and Greek visitors participated in the survey. The period during which the survey was conducted was eight days. One hundred and eighteen interviews were collected altogether, the majority of whom were given by foreign visitors travelling mostly from Europe (61.1%)

Exit interviews have as a basic tool facilitated questionnaires, in which the interviewer fills in the respondent's answers. In this case, summative evaluation was used (evaluation used after an exhibition has opened) to measure the success of the exhibition, the experience gained, and whether the Museum delivered the messages that it intended. This method was particularly appropriate in this case in order to get responses from a satisfying number of visitors in a relatively short time. Visitors were interviewed while leaving the Museum, about their level of

<sup>&</sup>lt;sup>28</sup> Alliance for Greece 2010.

motivation before their visit, their experience during their visit and their connection with the Museum (or other cultural activities) after their visit, yet probed for a range of outcomes and comments.

The exit interviews carried out followed a specific concept. The practice adopted was to obtain the required information through a direct approach, in an attempt to make those interviewed feel more comfortable with the process. A firm planning was chosen, based on a structure of general open questions and multiple-choice questions, in order to obtain as much information that would serve to bring forth new findings to the discussion. This structure proved of great value for the development of the research, since it helped to narrow down the results and analyse the answers regarding the application of the 'experience model'. The questions were focused and kept to a number of 20, in order to collect the maximum of responses in the time provided. Also, it was important to avoid leading questions, so as to get the unbiased answers of the visitors. For that reason, careful phrasing was used, avoiding incomprehensible language and preferring the less time-consuming and well-structured questions which would also be easier to classify at the analysis stage later on. For the classification of the values ascribed by the visitors to the Museum, in particular, a number of different statements/phrases were produced on the basis of the 'designing the involvement of the visitor in the experience' tool and were presented to those interviewed, who were given the opportunity to select more than one statement/phrase.

The survey was not limited to a selected group of people, but to the broadest possible audience. This proved most important to the findings of the survey, since different perceptions of the same issue were put together and analysed. This rapidassessment method proved, however, rather lacking in terms of evaluating groups (groups of adults or school groups) since it was difficult to separate and interview visitors belonging to a certain group.

The majority of the visitors who chose to participate in the interview were adults (alone or in a group of adults/couple, 45.4%), aged 25-34, holding a bachelor degree, working mostly in business-finance and education, while others were students or retired. The majority of the visitors were foreigners travelling from Europe (61.1%) and in particular women (59.3%). The average duration of their visit to the Museum was one to two hours.

The findings of the visitor survey could be linked to the following issues:

#### Pre-awareness of the Museum

One hundred and eleven of 118 visitors were pre-aware of the Museum. Word of mouth, websites and advertisements (41 answers) and other means including hotels and passing through (38 answers) were cited as the main sources of information before the visit, while very few (six answers) referred to the Museum's website

(see also below) and even fewer (two answers) were informed about the Museum during their visit to the Acropolis site.

### Use of the Museum website

Very few visitors (six answers) were informed about the Museum before their visit through the Museum website. This data of the survey is enhanced by data provided by the Museum itself: in the period June 2013 – May 2014 only 534,561 users visited the website, and the total number of Facebook friends was 414,527.<sup>29</sup>

Those very few who used the website (six answers) found very little or even no information on a number of services offered by the Museum such as the gallery talks and the reading room (Wi-Fi room). Also, the website provides no information on the connection of the Museum with the site e.g. in terms of location and content. Additionally, no unified ticket for the Museum and the site is available.

#### Reasons for visiting the Museum

The majority (54.3%) of the visitors, both Greeks and foreign visitors, emphasised the importance of heritage and the Museum itself, rather separating it from a connection with a national identity (the Museum's connection with the national identity is discussed below). To this end, they named their curiosity, the Museum architecture, the ancient Greek culture, and an interest in culture and history in general. Other visitors, Greeks in their majority, seemed to connect their visit to a national identity: they visited the Museum to 'feel the vibrations of the ancient but timeless Greek culture' or because it is a museum 'about their origins'.

### Use of Museum facilities and services

Most visitors, besides visiting the exhibition, make use of the café-restaurant, but do not benefit from the study room and the guiding tours on offer. Some of the visitors make use of the Museum shop. Some of the visitors are not happy with the fact that they are not allowed to take photos in certain parts of the Museum.

The majority of the visitors are not aware of the opportunity offered to them at the Athens airport to vote for the return of the Parthenon Marbles.

Visitors' overall experience at the Museum and personal connection with it Overall, the majority of the visitors felt 'awe and wonder', and 'happiness/fulfilment', while a large number also felt 'excited/impressiveness' or 'proud' (see Figure 5).

<sup>29</sup> There is no available data on the use of the Museum website.

#### HERITAGE CONSERVATION AND BUSINESS MANAGEMENT

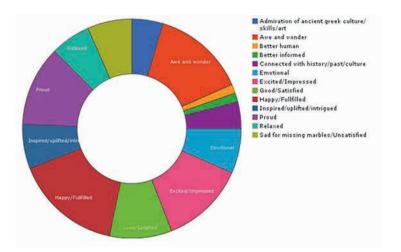


Figure 5. Visitor responses to the question 'How did your visit to the Museum today make you feel?' (data collected from the questionnaire designed for the present study)

To the question 'which of these experiences were especially satisfying to you in the Acropolis Museum today?', 18.1% of the visitors answered 'appreciating arts and culture', 14.4% 'feeling wonder and awe', 11.7% 'seeing rare, valuable or uncommon things', 11% 'being moved by the beauty' and 11% 'gaining information'.

To the question 'does the Museum have personal importance to you?', the Greek visitors replied 65% yes, and 35% no. For those who gave a positive reply, the Museum was a kind of celebration of their (Greek) identity. More specifically, they claimed they did not visit the Museum 'as tourists' but perceived it as 'their own cultural place', felt a sense of belonging, saw it as 'an extension of themselves as Greeks' and as 'part of Greek heritage' and expressed their satisfaction for the exhibition; some of them further suggested that more museums like this one should be built. Some of them even noted that they felt as 'descendants of wise men and of artists' and that the British Museum should 'bring the marbles back' and that 'the missing marbles make the experience deficient and fragmentary' (see also below).

Regarding the foreign visitors, a large number of them (54.3%) claimed they felt personally attached to the Museum. Their personal attachment to the Museum was based on the argument that the Museum stood as a knowledge extension or on their prior personal interest in history/archaeology or on their view of the Museum as a complimentary visit to the Acropolis site ('adds to the Parthenon experience'). Furthermore, the Museum inspired them by promoting

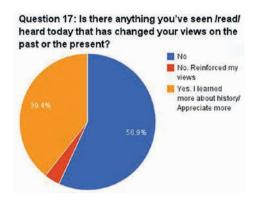


Figure 6. Visitor responses to the question 'Is there anything you have seen/read/heard today that has changed your views on the past or the present?' (data collected from the questionnaire designed for the present study)

strong ideas about the importance of the ancient Greek culture and artefacts, and promoted deeper understanding of the Greek history and culture and of ancient Greek skills and knowledge (39.4%). Yet, the majority of the visitors argued that the Museum did not change their views on the past or the present (56.9%), neither on the Museum itself compared with their pre-visiting expectations (42.2%) (see Figure 6).

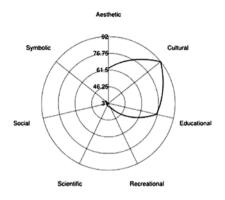
#### Types of visitor values/experience

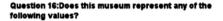
Through our research in the participation-engagement of the visitors with the Museum based on the 'experience model', we have identified seven key visitor values (see Figure 7). The visitors focused on the cultural value (25.2%), the educational value (20.8%), and the aesthetic value (17.3%). The Museum was considered highly successful in delivering learning to the visitors, and also enhancing the pride of the Greek visitors in their heritage and identity.

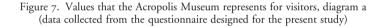
41% of the visitors considered the visit to the Museum a both cultural and aesthetic experience, 33.8% a cultural, aesthetic yet educational experience, and 24.5% educational and recreational (see Figure 8).

Visitors' view on the return of the Parthenon marbles in connection to the museum experience

To the question 'Do you believe that if the Parthenon Marbles were all here are [i.e. in the Acropolis Museum], this visit could be a more holistic experience?', 88% of the visitors gave a positive answer. Yet, only 11% admitted that they learned more on the issue of the return of the Marbles.







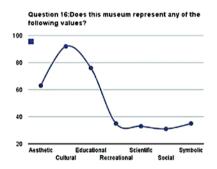


Figure 8. Values that the Acropolis Museum represents for visitors, diagram b (data collected from the questionnaire designed for the present study)

Similarity to the experience of other entertainment places

25% of the visitors answered that they could not compare the visit to the Museum with any other experience because 'it is unique', 25% compared it to the Acropolis site, 21.1% to an art gallery, andonly10% to school (see Figure 9). Much fewer visitors compared the Museum to entertainment activities like Disneyland and a basketball game.

III

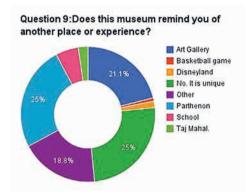


Figure 9. Visitor responses to the question 'Does this museum remind you of another place or experience?' (data collected from the questionnaire designed for the present study)

The most engaging elements of the Museum

The most engaging elements of the Museum were the Parthenon Gallery (20.1%), the view the Museum offers (16%), the statues/sculptures (15.3%), its organisation/ aids (9%), and its architecture (6.9%). More specifically, the educational programme on the original colours of the sculptures was greeted with enthusiasm by the visitors, and the diverse reconstructions of details on marble copies, on cast copies and with digital modelling helped visitors obtain a more complete picture of the original sculptures and also stimulated their interest in a creative way.

It is worth noting that the aforementioned ratings for each individual element are rather poor, with the highest being 20.1%. This means that the majority of the visitors would find an element to engage with, but would not engage with the majority of the elements.

### The least engaging elements of the Museum

The majority of the visitors, though having an overall very good opinion on the Museum, recommended that a change could be made, on the basis of individual elements and primarily (see Figure 10): the layout or orientation, the access to information before the visit and during the visit, the addition of a variety of artefacts and exhibitions, and the addition of interactive experiences. More specifically, the visitors suggested a more efficient reading lounge, an opportunity to discuss archaeological-historic information relating to the exhibits with Museum archaeologists and hosts (so far, only practical information relating to the visit itself can be discussed with Museum hosts), a more efficient information-material desk, as well as the opportunity to have access to audio-visual material stored on their portable digital tablets.

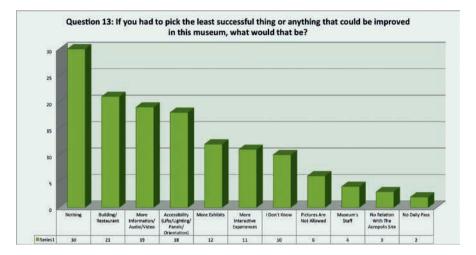


Figure 10. Visitor responses to the question 'If you had to pick the least successful thing or anything that could be improved in this museum, what would that be?' (data collected from the questionnaire designed for the present study)

Acropolis	4
Ancient Agora	5
Benaki Museum	
Byzantine and Christian Museum	
Cycladic Art Museum	
Delphi	
Epidavros	1.00
Evgenidio Foundation	
Fillopappos Hill	
I don't know yet	
Kerameikos	
Knosos	1
Meteora	
National Archaeological Museum	20
National Observatory of Athens	
No	33
Olympia	1
Temple of Apollo	6
Temple of Olympian Zeus	

Figure 11. The Acropolis Museum visitors and other cultural sites in Greece: past or intended visits (the numbers provided are absolute out of a total of 118 visitors) (data collected from the questionnaire designed for the present study)

Connection of the Museum with other cultural sites and museums in Athens The majority of the visitors of the Museum had not visited, and did not plan to visit either, many other cultural sites and museums in Athens (see Figure 11).

## Introducing the methodology of the 'experience model' to the Acropolis Museum

The tools of the 'experience model' will be applied to the Acropolis Museum, namely: a) designing the 'experience' as a theatrical play<sup>30</sup>; b) designing the involvement of the customer in the experience; c) designing the 'experience' as a journey; and d) connecting different 'experience' sites in a unified 'destination'<sup>31</sup>.

## Designing the 'experience' as a theatrical play

a) The 'stage' of the Museum comprises the internal space (i.e. the building) and the external, surrounding space (i.e. the underground-excavation area of the Museum and the Acropolis site). The internal space (the building), thanks to its location, its transparent surfaces made of glass and the unobstructed view, 'opens' towards the external-surrounding space, resulting in the visual connection between the internal and the external space. As to this, the survey showed how important the visitors considered the view offered by the Museum.

The 'stage' of the Museum includes the digital space (i.e. the website) as well, which is yet of limited use, as shown by the survey.

b) The exhibits could be considered the main 'actors' of the Museum. The exhibits comprise those of the internal space (the exhibition) and those of the externalsurrounding space (the remains in the underground-excavation area of the Museum and even the monuments of the Acropolis site as viewed from the Museum). As noted above, the exhibits of the internal space are visually connected with those of the external-surrounding space, with an emphasis on the connection between the Parthenon sculptures (at the upper level of the Museum) with the Parthenon.

Another group of 'main' actors could be the absent, the 'departed' exhibits (i.e. the Acropolis sculptures in the British Museum) with an implied-signified 'presence' that is accompanied by a clear claim for their return, as in the case of the Caryatids and the Parthenon sculptures. As the survey showed, the majority of the visitors believed that the return of the Parthenon Marbles would contribute to the creation of a more holistic experience.

The 'stage' (the building) of the Museum, through the simplicity of its architectural design and its transparent glass surfaces, focalises the attention of the visitor on the main 'actors' (the exhibits), as in the case of the archaic sculptures

<sup>&</sup>lt;sup>30</sup> On an earlier study see Poulios 2015b.

<sup>&</sup>lt;sup>31</sup> On an earlier study see Poulios 2015b.

(on the first level of the Museum). This results in the visual connection between the 'stage' and the 'actors'. The survey confirmed the emphasis on the part of the visitors on the connection between the 'stage' and the 'actors'.

The Museum personnel could be regarded as the secondary 'actors' of the Museum, since the personnel place themselves in the service of the museum building, the exhibits and the visitor (as indicated by the words of the employee of the Museum in the second spot: 'I feel very lucky [that I work here]'; 'every single day my aim is to ensure that visitors leave [from the Museum] always with a smile on their face'). Yet, the survey showed that the secondary 'actors' of the Museum were rather invisible to the visitors, in contrast to their presence and role in the spot.

c) In the context of the revelation of part of the 'backstage' to the 'audience', the visitor is given the opportunity to see – from a distance, since it remains closed to the visitors – the excavation area and activity on the underground of the Museum. The future plan is to open this area to the visitors, hosting an exhibition on the history of the excavation activity and the opening of the Museum, as an inseparable part of the main exhibition of the Museum. This would result in the functional connection of the 'backstage' with the 'stage'. Despite this attempt on the part of the Museum, the survey showed that the visitors did not get involved with the 'backstage' (the underground-excavation area) of the Museum.

d) The 'audience'/visitor experiences the visit to the Museum through their vision (see the first spot: 'you've seen pictures of the Parthenon in your entire life... and then you actually see it'; 'I studied a lot of ancient art, and seeing it all in person is really amazing') – and almost through their touch as well, thanks to their physical proximity to the exhibits (see the second spot: 'the visitors are usually overreacting, they tend to touch them [the exhibits]'). At the same time, the visitor becomes, through their physical presence and move among the exhibits, themselves part of the experience (see the second spot).

The way the Greek and the foreign visitors experience the visit to the Museum is significantly enhanced by the ideological element, i.e. the Classical ideals that continue to be strong in Greece and in the (Western) world as a whole<sup>32</sup> (see the first spot: 'it [Greece] is the centre of the world, the centre of democracy and civilisation, and if it began here, we need to know it'; 'you've seen pictures of the Parthenon in your entire life... and then you actually see it'; and 'I studied a lot of ancient art, and seeing it all in person is really amazing'). This ideological element

<sup>&</sup>lt;sup>32</sup> On the continuing power of the Classical ideals in connection to the Acropolis site and Museum, see Yalouri 2001.

is further stressed by the focus of the Museum on the absent, the 'departed' exhibits and the claim for their return, as well as by the exclusive reference to the Classical phase of the history of the Acropolis and the concealment of the subsequent (e.g. the Byzantine, and the Ottoman) phases of its history. From this respective, the survey confirmed the firm ideological-symbolic connection of especially the Greek visitors, but also foreign visitors as well, to the Classical past.

e) With regards to the 'script', the majority of the visitors, as the survey showed, participates in certain activities of the Museum such as the café-restaurant, but does not benefit from other activities and is not even aware of these activities in the first place – such as the study room and the guiding tours – while only a restricted number of the visitors makes use of the Museum shop. This means that the different services are not well-connected to each other in a unified context, resulting in a rather weak 'script'.

Furthermore, the different visitor categories, as a result of not benefiting from services such as the study room and the guiding tours and also of not being allowed to take photos in several parts of the Museum, do not seem to acquire individual, 'authentic' experiences. Also, the survey showed that the majority of the visitors would find an element to engage with, but would not engage with the majority of the elements, which can imply that the design and implementation of the individual elements of the exhibition could be far more effective.

#### Designing the involvement of the customer in the experience

In the Museum, the involvement of the visitor in the experience could be described on the basis of the survey and also of visitor observation as follows:

- a) The degree of the involvement of the visitor in the experience tends to be mostly passive. As the survey indicated, the majority of the visitors greeted with enthusiasm the few educational and interactive elements (e.g. the educational programme on the original colours of the sculptures was greeted with enthusiasm by the visitors, as well as the diverse reconstructions of details on marble copies, on cast copies and with digital modelling), and sought for many more such elements (e.g. layout, access to information before and during the visit, addition of a variety of artefacts and exhibitions, and addition of interactive experiences, a more efficient reading lounge, opportunity to discuss archaeological-historic information, more efficient information-material desk, and audio-visual material).
- b) The type of experience by the visitor takes the form not simply of absorption but rather of immersion. This is due to the increased visual emphasis

on the 'actors' / the exhibits and the visual connection of the 'stage' with the 'actors'. This was confirmed by the findings of the survey, e.g. that the most engaging elements are the Parthenon Gallery, the view that the Museum offers, and the statues/sculptures.

On the basis of the above remarks, the visitor tends to have an overall positive but passive experience based on the aesthetic part of the exhibition. Education is accomplished for some visitors, through the few educational programmes on offer.

#### Designing the 'experience' as a journey

The pre-visit phase does not seem to operate efficiently. As the visitor survey showed, the majority of the visitors, though already aware of the Museum, do not visit the website of the Museum.

The post-visit phase does not seem to operate either. The Museum keeps no data of its visitors which would have allowed it to maintain communication with them (e.g. through newsletters, and special offers). Also, as the visitor survey showed, the majority of the visitors are not aware of the fact that at the airport they are given the opportunity to vote for the return of the Parthenon Marbles.

Therefore, the tool of designing the 'experience' as a journey does not seem to have been applied to the Museum.

## Connecting different 'experience' sites in a unified 'destination'

The visit to the Museum and the visit to the Acropolis site do not seem to be regarded as one unified experience by most visitors (in contrast to what is shown in the first spot).<sup>33</sup> The connection of the visit to the Museum with the visit to the other cultural places of Athens is even weaker (in contrast to what is shown in the second spot): as the visitor survey showed, the rest of the cultural places in Athens were almost invisible to the visitors of the Museum. The absence of a connection between the Museum and the Acropolis site in particular could be related to a number of reasons: the absence of even the basic information on the operation of the archaeological site from the Museum website and also from the Museum exhibition, the absence of a unified ticket for both the site and Museum, and in general the absence of unified customer service.

<sup>&</sup>lt;sup>33</sup> On a future survey on visitors at the Acropolis Museum and also at the Acropolis site, it would be interesting to examine whether and how it matters to, and affects, their experience if visitors first visited the site and then the Museum, or vice versa.

This inability of the Museum to connect with the Acropolis site and with the other cultural places of Athens is also demonstrated by the almost steady visitor numbers at the Acropolis site and at the other cultural places of Athens in the last years (according to the data provided by the National Statistical Service of Greece) despite the huge dynamics of the visitor numbers of the Museum.

This absence of a connection of the Museum with the Acropolis site and with the other cultural places in Athens indicates an inability to create a holistic experience of a broader 'destination', in contrast to what is depicted in the two spots. This remark may raise serious questions on the efficiency of the marketing and the operation of tourism in Athens and also on the power of the overall experience of the visitor in Athens.

#### Concluding remarks

The present study shows that the methodology of the 'experience model', as formulated in the business sector, can be introduced to heritage organisations. This methodology can help heritage organisations in their attempt to acquire an advantage in the competitive entertainment and tourism industry and also become vehicles for the sustainable economic and social development of the broader areas. Heritage can be seen as a customer 'experience' – in accordance with the embracement of a much broader spectrum of heritage places and practices including the commercial uses of heritage, as noted in Nara+20.

While introducing the model to heritage organisations, it is important not simply to copy it from the business sector but to adjust it to the values and the authenticity of heritage places in question, for instance in the connection of the Acropolis Museum to the Acropolis site. The process of the introduction of the model to heritage organisations should be undertaken by experts from the heritage sector rather than from the business sector,<sup>34</sup> and emphasis should be on the educational rather than the entertainment aspect of the experience.

With regards to the introduction of the methodology of the model to the Acropolis Museum, the strongest experiential element of the Museum seems to be the emphasis on the exhibits (i.e. those exhibited in the Museum, those on the external-surrounding area, and those that have been 'departed' and wait for their return), which could be considered the main 'actors' of the experience. Around the exhibits the following elements of the Museum are centred: the internal and the external-surrounding space (the 'stage'), the excavation area and activity (the 'backstage') and the personnel (which could be regarded as the secondary 'actors'). This emphasis on the exhibits targets the most powerful sense of the visitors

<sup>34</sup> Kourgiannidis 2011, 48.

(vision) calls out to the ideological background (the Classical ideals) of the visitors, mostly those from Greece and also those from the Western world.

The weakest experiential elements of the Museum are the following: a) the absence of connection between the individual services in a unified service delivery process (the 'script'), which indicates that the visitor finds it rather difficult to functionally (and not only visually) associate themselves with the experience; b) the absence of the connection of the visit to the Museum with the visit to the Acropolis site and to other cultural places in Athens (despite the visual connection between the Museum and the site) – consequently, the visitor remains restricted to the specific experience (the visit to the Museum) and is not encouraged to open towards further comparable experiences; c) the absence of individual, 'authentic' experiences to each visitor group; and d) the absence of pre-and post-visit experiences.

Therefore, due to the extreme emphasis on the exhibits, the experience of the visit to the Museum becomes a rather introverted, mostly visual-aesthetic one, which yet seems to hinder the visitor from engaging actively with the experience itself. Overall, the Museum does not seem to fully apply the methodology of the 'experience model' as it has been formulated in the business sector; yet certain elements of this methodology do exist in the Museum.

The conclusions of the present study may raise broader issues on the relationship between the methodology of the 'experience model' and the concept of 'authenticity' (as defined in heritage conservation), i.e. whether and how authenticity can be incorporated into the methodology of the model. On the one hand, the 'experience model', as introduced to the Acropolis Museum, does not only adjust to the authenticity of the place but is centred on the authenticity of the place mostly on the basis of the Museum's connection with the Acropolis site: the Museum is located on the site, offers the visitor an explicit view to the other monuments of the site (the Parthenon), exhibits to the visitor the original artefacts from the site, and provides information on these artefacts to the visitor.

On the other hand, the experience of the visit to the Museum is to a large extent disconnected from the experience of the visit to the site, and also the visit to the Museum tends to replace to some extent the visit to the site. Specifically, statistics demonstrate that the visitor numbers of the site have not been affected/ increased by the highest visitor numbers of the Museum. Additionally, the survey showed that the majority of the visitors to the Museum do not visit the site. In practice, the schedule of a (average) visit to the Museum seems to comprise the following elements of experience: seeing and admiring the authentic artefacts from the site, acquiring information about them, benefiting from the modern and convenient structures and services of the Museum, taking a coffee or a meal, enjoying an explicit view to the site, and taking a photo of themselves with the site on the background. This 'from a distance' experience of the site seems to be sufficient for the visitor, without them feeling the need for a closer look at the site. Moving further, if the Museum better succeeded in offering each visitor segment individual, 'authentic' (as defined in the 'experience model') – and thus stronger and more fulfilling – experiences, then the visit to the site would possibly become even less relevant to them. Last, if the schedule of the visitors' stay in Athens could accommodate for practical reasons (e.g. because of the limited time allowed to them by the cruise schedule) only one of the two visits – i.e. to the Museum or to the site –, then the visit to the Museum might possibly be the chosen one.

On a more theoretical level, Nara+20 recognises 'emerging modes and technologies for accessing and experiencing heritage' and embraces a much broader spectrum of heritage places and practices including the commercial uses of heritage.35 Developments such as the increasing development of the internet and virtual reality<sup>36</sup> tend to create – on the basis of the power of the image of a heritage place and of the information concerning this heritage place - a sense of authenticity of a heritage place that is disconnected from the place itself; the visitor can experience the place from a distance without physically interacting with it. In this way, it is tempting to argue that the concept of authenticity - along with the concept of sustainable development<sup>37</sup> – tends to be gradually disconnected from the local / place level. Furthermore, this 'from a distance' and not through physical contact sense of the authenticity of a heritage place seems to fit well with the conventional approach towards heritage conservation that focuses on the preservation of the fabric of heritage, based on the concept of 'discontinuity' between the monuments considered to belong to the past, and the people of the present38 - and further enhances this 'discontinuity'.

A suggestion could be that the methodology of the 'experience model' could be centred on the authenticity of the heritage place, while at the same time encouraging the physical connection of the visitor with the place.

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<sup>35</sup> ICOMOS Japan 2014.

<sup>36</sup> ICOMOS Japan 2014.

<sup>37</sup> See Poulios 2015a.

<sup>38</sup> See Poulios 2014b.

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#### References

ACROPOLIS MUSEUM 2015. www.theacropolismuseum.gr, accessed 5 July 2015.

- ALLIANCE FOR GREECE [ΣΥΜΑΧΙΑ ΓΙΑ ΤΗΝ ΕΛΛΑΔΑ] 2010. 'Greece, a part of our soul – the Acropolis Museum'[«Ελλάδα, κομμάτι της ψυχής μας – Μουσείο Ακρόπολης»] (advertising spot), http://www.youtube.com/watch?v=3vdtTVeV5O4 (with English subtitles), accessed 2 December 2012.
- CERRITOS LIBRARY 2015. *About the Library Today*, http://menu.ci.cerritos.ca.us/cl\_about. htm, accessed 19 April 2012.
- CIRQUE DU SOLEIL 2015. Zarkana, https://www.cirquedusoleil.com/en/press/kits/shows/ zarkana/sets-and-video-content.aspx, accessed 10 July 2015.
- GILMORE, J. & J. PINE 1999. The Experience Economy: Work is Theatre & Every Business a Stage, Boston.

GILMORE, J. & J. PINE 2007. Authenticity: What Consumers Really Want, Boston.

GREEK NATIONAL TOURISM ORGANISATION 2010A. Ενημερωτικό Σημείωμα, Ειδική Επιτροπή για τη Διαχείριση της Κρίσης στον Τουρισμό, Αθήνα, 13 Μαΐου 2010 [Information Note, Special Committee on Managing Crisis in Tourism, Athens, 13 May 2010], http://www.apopseis-gr.blogspot.com/2010/05/13-2010\_13. html, accessed 15 February 2012.

I2I

- GREEK NATIONAL TOURISM ORGANISATION 2010B. *Visit Greece: You in* Athens (advertising spot), http://www.visitgreece.gr/en/video/you\_in\_athens and http://www.youtube. com/watch?v=znn3LmP-7Bw, accessed 28 October 2011.
- HOLBROOK, M.B. & E.C. HIRSCHMAN 1982. The experiential aspects of consumption: consumer fantasies, feelings, and fun, *Journal of Consumer Research* 9, 132-140.
- HOLTORF, C. & T. SCHADLA-HALL 1999. Age as artefact: on archaeological authenticity, *European Journal of Archaeology* 2/2, 229-247.
- ICOMOS JAPAN 2014. Nara+20: on Heritage Practices, Cultural Values, and the Concept of Authenticity, Proceedings of the Meeting on the 20th Anniversary of the Nara Document on Authenticity, held at Nara, Japan, from 22-24 October 2014, on the invitation of the Agency for Cultural Affairs (Government of Japan), Nara Prefecture and Nara City, http://www.japan-icomos.org/pdf/nara20\_final\_eng.pdf, accessed 1 September 2015.
- JENSEN, R. 1999. The Dream Society: How the Coming Shift from Information to Imagination Will Transform Your Business, New York.
- KIM CHAN, W. & R. MAUBORGNE 2005. Blue Ocean Strategy: How to Create Uncontested Market Space and Make the Competition Irrelevant, Boston.
- KOURGIANNIDIS, L. 2011. Σχεδιάζοντας «εμπειρίες» στις βιβλιοθήκες: το παράδειγμα της Δημόσιας Βιβλιοθήκης Cerritos, Η.Π.Α., Diss. Hellenic Open University, Patra.
- LARSEN, K.E. (ed.) 1995. Proceedings of the Nara Conference on Authenticity in Relation to the World Heritage Convention, Nara, Japan, 1-6 November 1994, Paris.
- LIAKOS, A. 2011. Το Νέο Μουσείο της Αχρόπολης στο τρίγωνο ιδεολογίας, ιστορίας και απόλαυσης, http://antonisliakos.files.wordpress.com/2011/04/acropolis-newmuseum1.pdf, accessed 5 April 2013.
- LIBRARY JOURNAL 2003. Selling the learning experience, http://lj.libraryjournal.com/ 2003/03/people/movers-shakers-2003/waynn-pearson-movers-shakers-2003/, accessed 20 April 2012.
- POULIOS, I. 2014a. Discussing strategy in heritage conservation: a living heritage approach as an example of strategic innovation, *Journal of Cultural Heritage Management and Sustainable Development* 4/1, 16-34.
- POULIOS, I. 2014b. The Past in the Present: A Living Heritage Approach Meteora, Greece, London. Also available at http://dx.doi.org/10.5334/bak (open access).
- POULIOS, I. 2015a. Gazing at the 'Blue Ocean', and tapping into the mental models of conservation: reflections on the Nara+20 Document, *Heritage and Society* 8/2, 158-177.
- POULIOS, I. 2015b. Εμπειρίες ως απάντηση στην κρίση: Στοχασμοί για την εφαρμογή του μοντέλου εμπειριών στο Μουσείο Ακρόπολης. In: S. Antoniadou, E. Mavragani & I. Poulios (eds), Προοπτική και Πολιτισμός: Η σημασία της στρατηγικής σε τρεις τομείς του πολιτισμού, Athens, 108-121.
- POULIOS, I. & S. TOULOUPA 2015. Greek museums within and beyond crisis: the imperative to achieve strategic agility in the current instability. In: P. Veleni & C. Gatzolis (eds), *Museology: New Trends*, Thessaloniki.
- SCHMITT, B.H. 1999. Experimental Marketing: How to Get Customers to Sense, Feel, Think, Act, and Relate to Your Company and Brands, New York.
- SCHMITT, B.H. 2003. Customer Experience Management: A Revolutionary Approach to Connecting With Your Customers, New Jersey.
- SCHULZE, G. 1992. *Die Erlebnisgesellschaft: Kultursoziologie Der Gegenwart*, Frankfurt/ New York.

TOFFLER, A. 1971. Future Shock, New York.

- UCKO, P.J. 2000. Enlivening a 'dead' past, *Conservation and Management of Archaeological Sites* 4, 67-92.
- VOSS, C. & L. ZOMERDIJK 2007. Innovation in experiential services an empirical view. In: DTI (ed.), *Innovation in Services*, London, 97-134. Also available at http://www. dti.gov.uk/files/file39965.pdf, accessed 10 June 2012.
- YALOURI, E. 2001. The Acropolis: Global Fame, Local Claim, Oxford.

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