Eliciting Public Preferences For Managing Cultural Heritage Sites: Evidence From A Case Study On The Temples Of Paestum

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Abstract

This paper reports results from a survey using *conjoint choice approach* questions to elicit people's preferences for cultural heritage management strategies for an outstanding world heritage site: the Temples of Paestum, in Italy. The potential of the above-mentioned methodologies' within the current cultural heritage research scenario is also discussed.

Key words: conjoint analysis, cultural sites management

1. Introduction

The museums' sector has been the object of increasing interest in the last ten years, as shown in several publications (Jackson, 1988; Frey and Pommerehnne, 1989; Feldstein, 1991; Frey, 1994). Many research studies (i.e. Silbeberg, 1995; Verbeke

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and van Rekom, 1996; Harrison, 1997; Johnson and Thomas, 1998) have focused on museums' services, acknowledging the importance of the aspects related to public fruition over those mainly targeted to solely fulfil the exhibition purpose. Within this framework, and in tune with the understanding of the social role played by art, museums' management issues have been increasingly linked to market dynamics, showing the need to understand public preferences. In fact, financial investments in the museum sector can be better justified when related to improvements in public fruition and in the understanding of the art piece. Contingent valuation method is a survey based valuation techniques that, because of its nature, has the potential to be very participative. People can express their preferences for non-market commodities stating their willingness to pay for changes in the provision of the good. In this way, the latent demand curve for the good at hand can be traced. Recent literature shows several examples of applications of the contingent valuation method to cultural goods. A more restricted number of studies focus on the use value of museums. Ashworth and Johnson (1996) analyse the monetary value individuals attach to the museum visit, Scarpa et al. (1998) elicit the access value to the Contemporary Art Museum of the Rivoli Castle near Turin, Beltran and Rojas (1996) estimate willingness to pay for the fruition and conservation of some archaeological areas in Mexico, whist Mazzanti (2001) elicits the willingness to pay for the conservation of the Borghese Gallery Museum in Rome and for the introduction of some new services, e.g. increase in opening hours, multimedia service and non-permanent exhibitions.

The research reported in this paper aimed to contribute to the current literature debate on the method, using the conjoint analysis format to elicit the level of desirability of different management policies for the services in support of the Temple of Paestum's archaeological area and its museum. In particular, we analysed alternative policies focusing on different ways of experiencing the good. We considered three different policy packages, a first one mainly concerned with improvements in the fruition aspects, a second one mainly targeted to leisure time, and a final one aimed to enhance educational purposes.

A sample of 732 respondents was gathered at the site in order to elicit individual users' preferences for different management options of the site. Each respondent

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was presented with three different scenarios, each differing from the others in terms of the kind of museum service provided, and the entry fee. Each scenario constituted an alternative management option, corresponding to the following broad categories: a) mainly fruition, intended as accessibility to the different parts of the site and its museum as well as improvement in the understanding of the good; b) entertainment; c) education.

The study was funded by the Regione Campania, the Local Government, within a research devoted to the study of economic models for the management of cultural heritage goods. Some of the most desired attributes considered in the analysis are now being implemented.

The paper is structured as follows. Section 2 describes the main problems in managing cultural sites and the potential of methods such as conjoint analysis in eliciting public preferences; section 3 describes the questionnaire, the survey implementation and the main statistics of the selected sample; in section 4 the theoretical and the econometric model are discussed and the results presented; the last section provides our conclusions.

2. Management of cultural sites and public preferences elicitation

2.1 Managing cultural heritage in the perspective of sustainable development

Cultural sites represent an increasingly important economic resource for the development of a region. Cultural tourism is now spreading in many European regions, also thanks to the new air travel opportunities given by low cost airlines. The development of cities needs to account for the necessity of appropriate management of cultural goods to be sustainable in economic, cultural and social terms. The role of valuation techniques becomes prominent in this context. How to assess management strategies for cultural goods conservation is a matter of research and enhancement of current valuation methods.

This paper discusses one of the possible approaches to cultural heritage management, based on public preferences' elicitation of the economic values of intangible goods, usually considered unpriced. The methodology used here referrers to the economics of outdoors recreation and emphasizes the use of contingent valuation, one of the economic valuation techniques developed during the XX century by environmental economists.

Managing cultural heritage sites implies finding optimal ways to combine the conservation instance with the need for site valorisation. In turn, this requires the use of valuation methods to assess more preferable options. Since the Athens Charter (1931), the role of historic building conservation has been highlighted at international level. A number of other international documents, such as the Charter of Venice in 1964 and the Granada Convention in 1985, stressing both the relevance of the attached economic values, and the importance for the development of the city of entire cultural sites followed. Other International agreements have since then highlighted the need for the integrated conservation of cultural heritage both in terms of buildings and of sites (Declaration of Amsterdam 1975, Washington Charter 1987).

The Venice Charter in 1964, for the first time, saw cultural heritage sites as economic goods, therefore a resource, and an asset. More recently, the UNESCO and the World Bank, meeting in Beijing in July 2000 with experts from all over the world, stated the relevance of regulations as prerequisite for the protection of cultural heritage that needs to involve both decision makers and local communities. In this occasion the debate confirmed that the preservation of cultural heritage has been for long perceived as a "public expenditure therefore excluded from cost/benefit analysis" (Luxen, 2000). There is the need to develop a new attitude, where preservation and restoration works may be perceived as real investments. The acknowledgment of the economic values attached to cultural goods is of strategic importance in order to make a negative attitude change at policy level.

2.2 .The potential of conjoint analysis

In the last few decades, environmental economists have developed non-market valuation techniques to elicit public preferences in the form of economic values attached by the relevant population to policy alternatives. These techniques aim to compute the monetary benefits of environmental policies, important when one wants to compare different categories of benefits, or when one wants to compare the benefits of a policy with its costs.

When one wishes to place a monetary value on the unpriced features of a cultural site using stated preference techniques, two approaches are possible: contingent valuation, (see Mitchell and Carson, 1989) and conjoint choice studies (Hanley et al, 1998). In a contingent valuation survey, people are asked directly to report their willingness to pay (WTP) to obtain a specified commodity, such the way a conservation site is managed. The proposed change is generally hypothetical, and no actual transaction takes place. Contingent valuation has been traditionally used to place a monetary value on environmental goods. More recently, programs for the preservation and restoration of specific sites or *buildings* with historical and cultural significance, such as churches, museums, theatres, and marble monuments have been valued using this technique. A survey of some studies can be found in Navrud and Ready (2001). A more extensive review of the main studies is in Noonan (2002).

Conjoint analysis can be considered as a more recent development of the contingent valuation approach, which seems even more suitable for management purposes. In a typical conjoint choice experiment study, respondents are asked to choose between two or more commodities (or "policy packages") each of which is defined by a set of attributes, one of which is usually the cost to the respondent. Attributes are varied across "packages," and the packages are usually matched in such a way that respondents must trade off attributes to make their choice. Conjoint choice analysis, therefore, seems potentially the best valuation technique when aim of the valuation exercise is the assessment of changes in policies or programs.

3. Eliciting preferences for a world heritage site: the temple of Paestum

3.1 The archaeological site

This study focuses on the archaeological area of Paestum and its museum. The temples of Paestum, namely the Basilica, the Temple of Poseidon, the Temple of Ceres, are among the most impressive examples of Archaic Doric Architecture outside Greece. They were built between 530 and 460 BC as part of the city of Paestum, one of the most important Greek colonies in Magna Grecia. They were inscribed in the UNESCO World Heritage List in 1998, within the Cilento and Vallo di Diano National Park, together with the archaeological sites of Velia and the Certosa of Padula. They are among the most important archaeological remains in Italy and are visited by many tourists. A Museum situated next to the archaeological remains contains many Roman and Greek works of art.

The conjoint analysis study presented here responded to the local political agenda of developing new management policies for the conservation and valorisation of this

outstanding site. An increase in the level of fruition and understanding of the Temples of Paestum and the role played by them in the whole region, might encourage tourists to de-route towards other nearby cultural sites. A sensible increase in tourists' number was therefore welcomed, if this meant also redirecting tourist to other nearby archaeological areas and transforming the one-day trip visitors into resident tourists for a day or two. This would bring economic benefits to the development of the entire area. As discussed above, conjoint analysis appeared to be the most flexible and adequate valuation techniques for the purpose at hand. At the time of the questionnaire's development and the first survey's implementation, there were no similar studies available in literature. The techniques had been used for a number of cultural goods (Noonan, 2001; Navrud and Ready, 2002), but the museum sector had been almost ignored. During the research lifetime, other studies were conducted on similar topics and more recently published (Santagatata and Signorello 2000; Mazzanti, 2001).

3.2 The questionnaire and the survey implementation

A crucial aspect of any conjoint analysis is the development of an appropriate questionnaire. For our study, we followed the usual steps envisaged by the literature. First, two focus groups were held in June 1999 aiming to understand which sort of services were particularly preferred by the local population. Then two pretests took place, one at the end of June 1999 and the other in mid July 1999. The final version of the survey was implemented in August 2002.

The pretests and the final survey were all carried out on site. The first pretest consisted of 50 interviews collected by 5 interviewers. The second pretest consisted of 245 interviews gathered on site by the same 5 interviewers. Major changes were made in the questionnaire wording and structure between the first and the second pretest, while only minor changes were envisaged after the data analysis of the second pretest. The final survey was carried out on site by 7 interviewers in August 2002 who gathered 732 interviews.

The final questionnaire consisted of 4 major sections to be administrated to the respondent, plus 2 sections to be filled in by the interviewer. The first section included questions eliciting respondent's attitude with respect to the category of goods being valued, namely cultural goods. The second one presented the description of the good, the archaeological area of Paestum, and some questions aimed to elicit

the level of good's knowledge. The site description was as usual strengthened by photographic images and maps collated in a brochure prepared in collaboration with the Sovrintendenza, the local agency in charge of the site's conservation. The third section consisted of the valuation question, in this case conjoint choice format. The forth section included questions eliciting the major socio-economic characteristics of the respondents (age, sex, income, level of education etc). The two final sections were filled in by the interviewer and included comments on the respondent's attitude throughout the interview, plus other relevant information.

Great care was devoted in developing the valuation question part that is obviously the crucial one to elicit monetary expressions of respondents' preferences. Each alternative was given by the combination of different levels of the attributes defining the scenario. In our choice experiment, we had nine attributes plus the cost of the "package". We randomly derived a combination of alternatives, to be shown in pairs to the respondent, taking care of eliminating the dominated ones and checking for the appropriateness of the level of the attribute cost (in order to avoid that packages with more expensive services might be "sold" at cheaper prices). We generated 24 cards each showing three options, one of which corresponded to the minimum number of services representing the site conservation option (scenario A). Each respondent was required to express his/her preference among the three options, where the scenario A did not assume any extra cost to the current ticket price. The choice experiment was repeated 4 times per each individual. The cards order was regularly rotated in the sample administration in order to avoid ordering bias.

The attributes composing each of the scenarios fell into three main categories: a) fruition services, improving the accessibility and understanding of the site, b) leisure services, c) educational services. Table 1 shows an example of card.

TABLE 1 APPROX HERE

Among the services targeted to improve accessibility we have: an increase in opening time (from 9am to 10 pm, instead of sunset), audio guides with recorded description of the museum and the archaeological site, hourly guided tours. The services targeted to educational purposes are: a children lab and a multimedia reconstruction of the archaeological remains, and an IT documentation centre on the other archaeological sites of interest present in the region. The leisure services include a café within the archaeological remains, the organization of weekly

concerts/performances and of non-permanent exhibitions. The cost to the respondent varies between 6,20 € and 12,91€

3.3 The data

Table 2 presents the socio economic statistics of the sample of respondents used un the econometric analysis. The sample consists of 552 observations, once eliminated from the samples the observations with missing information in one or more of the crucial variables.

TABLE 2 APPROX HERE

The information reported in table 2 indicates that the sample is mainly composed by people resident outside the Campania region, (76%),with a good level of education, since 54.12 % of the individuals completed secondary school, and 39.61% were graduated or more. The majority of individuals reported a household gross income between 20 and 30 thousand euros, while 42.82 % of the respondents indicated an income higher than 40,000 euros. Most individuals were aged between 24 and 48, while the percentage of people between 18 and 23 years of ages is quite low (about 7%).

As described in section 2, individuals in the sample were required to express their preference among three scenarios, where the scenario A did not assume any extra cost to the current ticket price, corresponding to the minimum number of services needed for the site conservation. As shown in the last row of table 2, a relatively small portion of respondents people (8.69 %) selected the scenario A, involving no extra cost.

4. The Model And The Results

4.1 The theoretical and econometric model

The attractiveness or utility of scenario s to individual i is specified as

(1)
$$U_i(s) = \sum_{k=1}^9 \gamma_k x_k(s) + \mu p(s) + \varepsilon_i(s)$$

where $x_1(s), x_2(s), ..., x_9(s)$ are the values of the 9 characteristics in scenario s, p(s) e' is the ticket price in scenario s and $\varepsilon_i(s)$ is a stochastic component that accounts for unobserved variables that affects the attractiveness of the scenario.

Each interviewed individual s asked to choose among three scenarios indexed by 0 (the actual one), 1 and 2. In fact this choice is repeated 4 times, with variations of the alternative scenarios 1 and 2, but for simplicity we illustrate here the model as if only one choice is done (the extention to more than one choice is trivial). By assuming that $\varepsilon_i(s)$ is i.i.d. Type I Extreme Value we get the well-known Conditional Logit expression for the probability that individual *i* chooses scenario *s*:

(2)
$$P_{i}(s) = \frac{\exp(\sum_{k=1}^{9} \gamma_{k} x_{k}(s) + \mu p(s))}{\sum_{j=0}^{2} \exp(\sum_{k=1}^{9} \gamma_{k} x_{k}(j) + \mu p(j))}$$

If s_i denotes the scenario chosen by individual i, the parameters γ and μ can be estimated by Maximum Likelihood by maximizing $\ell = \sum_{i=1}^{N} \ln(P_i(s_i))$, where

N is the sample size.

The marginal willingness to pay for the k-th characteristics is computed as $\frac{\gamma_k}{-\mu}$. For instance, $\frac{\gamma_1}{-\mu}$ is the marginal WTP for an increase in the opening

hours.

If we consider the possible increase in revenue related to the ticket price increase and the possible increased number of tourists related to a new scenario, we can determine to what extent a certain policy can cover maintenance costs. In order to forecast the number of visitors when the scenario changes, the following procedure can be adopted. Let P represent the size of a reference population of which the visitors Q are a subset. Then the current proportion of visitors is

(3)
$$\frac{Q(0)}{P} \cong \frac{\exp\{V(0)\}}{\exp\{V(0)\} + \exp\{V(R)\}}$$

where V(R) is the maximum utility attainable among all other possible alternatives and V(0) is the utility attached to a visit to the site with its current scenario. Given an alternative scenario, say 1, we would have:

(4)
$$\frac{Q(1)}{P} \cong \frac{\exp\{V(1)\}}{\exp\{V(1)\} + \exp\{V(R)\}}$$

Therefore:

(5)
$$\frac{Q(1)}{Q(0)} = \frac{\exp\{V(1)\}}{\exp\{V(0)\}} \frac{\exp\{V(0)V(R)\}}{\exp\{V(1)V(R)\}}$$

If V(R) is large with respect to V(0) and V(1) the following holds as an approximation:

$$\frac{Q(1)}{Q(0)} \cong \frac{\exp\{V(1)\}}{\exp\{V(0)\}}.$$

Alternatively, one could use the observed proportion of visitors $\frac{Q(0)}{P}$ for

some reference population to retrieve an average value of V(R) and then

compute
$$\frac{Q(1)}{Q(0)} = \frac{\exp\{V(1)\}}{\exp\{V(0)\}} \frac{\exp\{V(0)V(R)\}}{\exp\{V(1)V(R)\}}.$$

4.2 The results

Table 3 presents the parameters estimates, asymptotic standard deviations, and "t" values.

TABLE 3 and 4 APPROX HERE

The results show that respondents attach a significant positive value to all characteristics presented in the choice set, but the café (at the interior of the site), which seems to be perceived negatively. The most preferred services are guided tours, an increase in opening hours and a children lab. Less interest is shown for performances, concerts, and non-permanent exhibitions. Among the educational services, the smaller willingness to pay is attached to the documentation centre on the archaeological sites present in the region..

Previous studies have elicited individual preferences for museums, though with different approaches (e.g. Ashworth and Johnson, 1996; Beltran and Rojas, 1996; Mazzanti, 2001; Santagata and Signorello, 2002), and have found that the interest for cultural goods is linked to individual characteristics as income, education, sex, and age. Table 4 presents the results of a variant of the basic model where the marginal utility of income (- μ) is depend upon the level of income. The table shows the marginal WTPs evaluated at two different levels of income. Note that the marginal utility of income turns out to decreasing with respect to income. Willingness to pay increases with household income consistently with our expectations and with the results reported by Beltran and Rojas (1996), Santagata and Signorello (2000), Mazzanti (2001). However, some authors (Smith et al., 1983; Ashworth and Johnson, 1996) also mention the possibility of a negative correlation with income, when considering leisure activities, such the visit to a museum, because those who have higher labour income face also higher opportunity costs to visit the site.

TABLE 5 APPROX HERE

Table 5 shows the estimates obtained splitting the whole sample into subsets according to the different levels of education. It is interesting to note that respondents with a level of education inferior to college degree do not feel the presence of a café in the archaeological area as a negative feature, as shown by a no longer significant coefficient.

At the same time, the preferences' weight for the different services changes, since for people holding a degree the lab is the most attractive service (at the margin), while the respondents with no college degree give a higher preference weight to longer opening hours and guided tours. In general, in our sample the WTP increases with the level of education as reported also in other studies, e.g. Beltran and Rojas (1996) and Mazzanti (2001).

Table 6 shows the estimates obtained dividing the sample into two subsets corresponding to two levels of age: less or more than 33 years. In both cases, guided tours represent the most valued service; however, we see that people falling into the older group are more willing to pay for an increase in opening hours, whilst the younger ones value more a lab and audiovisuals.

TABLE 6 APPROX HERE

The latter group also shows a coefficient for the variable BAR no longer significant, whilst the WTP is higher for the older group, probably because older people are more

likely to be earner. Our estimates confirms the results reported by Mazzanti (2001) and Morey and Rossman (2002), whilst an opposite result can be found in Santagata and Signorello (2000).

TABLE 7 and 8 APPROX HERE

Table 7 shows that no significant differences can be found between the preferences expressed by residents in the Campania Region and residents elsewhere, but for the café within the archaeological area, which is perceived negatively only by residents. A stronger preference for concerts and performances is found among residents, probably because of their facility in accessing the site throughout the year.

Finally, table 8 shows estimates for two groups of male and female respondents, reported arguing that the two genders may have different preferences. Results show a higher WTP for performances and other events among women, whilst the most valued service among men is given by guided tours.

5. Concluding remarks

One of the first issues to be solved in order to find optimal policies for the management of museums and, in general, of cultural goods, is the definition of the main and most desirable output, the final goal of the policy, whether it is conservation, education or something else. Different "stakeholders" would probably have different perceptions of what the most desirable output is. An "intellectual" might perceive art as belonging to an elite whose principal objective and purpose is to preserve the work of art for future generation, or even for its own sake. Someone more linked to a social vision of art and cultural heritage, might be more interested in promoting the knowledge of this archaeological site, maybe envisaging free access. A local administrator might prefer a policy aimed to attract more tourism, hence encouraging all the services that may complement tourism, such as the more leisure oriented ones. An optimal policy should account for all the different positions, including that of the general public.

This study analyses visitors' preferences for alternative museum services. Results seem interesting for the development of new management policies for the Temples of Paestum, and appear to confirm the potential that stated preference valuation techniques, such as the conjoint analysis approach used in our study, have for these purposes. In particular, we find that the most preferred services are those improving the accessibility and the understanding of the site, including its museum, (longer opening hours, guided tours), followed by educational service such as a children lab. Our results confirm that the main reason moving people to visit cultural sites is the desire of "learning something", as also argued by Verbeke and Van Rekom (1996). The WTP to gain access to the site increases with age, education, and income, confirming previous results. The majority of respondents show no interest towards the transformation of this cultural site in a sort of entertaining place, with the organization of performances or special events, and the creation of a café within the archaeological remains is perceived negatively. In sum, we can say that our results show a preference for a management policy oriented towards the improvement in the accessibility and linked with educational and pedagogical purposes. This confirms a trend shown in many European museums where the principal focus is on the exhibited good, more than on the other services that are considered ancillary, and sometimes separated from the museum. Further research is needed to test the potential of stated preferences techniques for management purposes of cultural sites and their services.

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Table 1. An example of card			
Attributes	Scenario A	Scenario B	Scenario C
Opening hours	From 9am till	From 9am to	From 9am till
	one hour before	10pm	one hour before
	sunset		sunset
Audio - guides for the archaeological remains and the	NO	YES	YES
Museum			
(Not included in the entrance fee)			
Experts guided tours	NO	NO	YES
(Not included in the entrance fee)			
Café with view on archaeological remains	NO	YES	NO
(Purchase not included in the entrance fee)			
Thematic non permanent exhibition (access not	NO	YES	YES
included in the entrance fee)			
Weekly cultural Events (classical/pop music concerts	NO	YES	NO
and theatrical performances) from June to September			
(access not included in the entrance fee)			
Children Lab (access not included in the entrance fee)	NO	NO	NO
Audiovisual projections along the musum and site	NO	YES	YES
itinerary (use included in the entrance fee)			
IT documentation centre	NO	NO	NO
(use included in the entrance fee)			
PRICE	Euro 6,20	Euro 7,75	Euro 12,91

Table 2 Descriptive statistics (N=552)						
	Variable	%				
SEX	Female	46.67				
	male	53.33				
RESIDENCE	Paestum	1.97				
	Campania	22.05				
AGE	18-23	7.53				
	24-28	14.34				
	29-33	13.80				
	34-38	18.64				
	39-43	15.59				
	44-48	13.98				
	49-53	6.63				
	54-58	5.02				
	59-63	1.97				
	>63	2.51				
EDUCATION	Compulsory level or less	6.27				
	High school	54.12				
	University	39.61				
HOUSEHOLD	<10	4.12				
INCOME	10-20	18.64				
	20-30	34.40				
	30-40	21.86				
	40-60	13.08				
	>=60	7.88				
RESPONDENTS W	HO SELECTED	8.79				
SCENARIO A						

Variables	Coefficients	Std.Dev	t-stat	γ⁄μ*
IOURS	0.6580	0.0747	8.812	5.22
UDIO	0.4594	0.0634	7.240	3.64
OURS	0.8018	0.0675	11.881	6.36
AR	-0.1937	0.0734	-2.639	-1.54
XHIBIT	0.2936	0.0733	4.007	2.33
VENT	0.4561	0.0764	5.972	3.62
AB	0.7025	0.0805	8.723	5.57
UDIOV	0.4880	0.0738	6.608	3.87
CUM	0.3979	0.0622	6.401	3.16
RICE (µ)	-0.1260	0.0069	-9.444	

Variables	Coefficients	Std.Dev	t-stat	*	**
HOURS	0.6614	0.0748	8.842	4.17	6.93
AUDIO	0.4607	0.0635	7.253	2.91	5.14
TOURS	0.8181	0.0678	2.070	5.16	8.57
BAR	-0.2118	0.0737	2.875	1.34	-2.22
EXHIBIT	0.2835	0.0734	3.860	1.79	2.97
EVENT	0.4700	0.0767	6.128	2.97	4.92
LAB	0.7181	0.0809	8.879	4.53	7.52
AUDIOV	0.4906	0.0740	6.631	3.01	5.14
DOCUM	0.4082	0.0623	6.549	2.58	4.29
Marginal utility of income (-1	l)			0.158	0.095

Table 5 WTP depending on education										
	Subsample	e with level	of education	1	Subsample with level of education					
	>= College degree				< College of	legree				
	(282 observations)				(270 observ	vations)				
Variables	Coeff.	Std.Dev	t-stat	*	Coeff.	Std.Dev	t-stat	*		
HOURS	0.8229	0.1075	7.654	5.00	0.5668	0.1056	5.368	3.97		
AUDIO	0.5878	0.0882	6.667	3.57	0.3687	0.1075	3.429	2.58		
TOURS	0.9299	0.0947	9.817	5.65	0.7198	0.0968	7.438	5.04		
BAR	-0.3883	0.1023	-3.794	-2.36	-0.0330	0.1010	-0.327	-0.23		
EXHIBIT	0.2445	0.1133	2.158	1.48	0.3404	0.1187	2.867	2.38		
EVENT	0.5601	0.1093	5.126	3.40	0.3943	0.1083	3.640	2.76		
LAB	1.0180	0.1293	7.870	6.18	0.4520	0.1105	4.092	3.17		
AUDIOV	0.5460	0.1006	5.428	3.32	0.3867	0.1246	3.103	2.71		
DOCUM	0.4974	0.0971	5.089	3.02	0.2994	0.0926	3.232	2.09		
Marginal uti	lity of incor	ne	<u> </u>	0.164	<u> </u>			0.143		
* * marginal wtp in euro per each service when income = 20,658 euro										

Table 6 WTP depending on age										
	Subsample w	ith age<= 3	33 years		Subsample with age >33 years					
	(126 observations)				(426 observations)					
Variables	Coefficients	Std.Dev	t-stat	*	Coeff.	Std.Dev	t-stat	*		
HOURS	0.1792	0.2221	0.807	0.93	0.7633	0.0802	9.514	5.36		
AUDIO	0.4344	0.1491	2.914	2.26	0.4687	0.0754	6.219	3.29		
TOURS	1.0598	0.1510	7.018	5.50	0.7764	0.0741	10.479	4.45		
BAR	-0.2436	0.1561	-1.560	-1.26	-0.1940	0.0802	-2.419	-1.36		
EXHIBIT	0.2827	0.1620	1.745	1.47	0.3006	0.0916	3.283	2.11		
EVENT	0.4313	0.1508	2.860	2.26	0.4861	0.0857	5.669	3.41		
LAB	0.7446	0.1801	3.886	3.84	0.7198	0.0938	7.673	5.05		
AUDIOV	0.6873	0.1740	3.713	3.55	0.4600	0.0874	5.266	3.23		
DOCUM.	0.3314	0.1564	2.118	1.82	0.4339	0.0737	5.887	3.04		
Marginal utilit	y of income			0.192				0.143		
* marginal wtp	* marginal wtp in euro per each service when income = 20,658 euro									

Table 7 WTP depending on residence									
	Subsample of	Subsample of non residents							
(190 observations)					(362 observations)				
Variables	Coefficients	Std.Dev	t-stat	*	Coeff.	Std.Dev	t-stat	*	
HOURS	0.7241	0.1658	4.368	3.98	0.6481	0.0843	7.688	4.29	
AUDIO	0.5040	0.1082	4.658	2.77	0.4396	0.0861	5.107	2.91	
TOURS	0.9313	0.1259	7.398	5.12	0.7887	0.0799	9.872	5.22	
BAR	-0.3453	0.1203	-2.871	-1.90	-0.1265	0.0879	-1.439	0.84	
EXHIBIT	0.3640	0.1343	2.710	2.00	0.2817	0.1035	2.721	1.86	
EVENT	0.6623	0.1274	5.200	3.64	0.3791	0.0966	3.925	2.56	
LAB	0.7188	0.1575	4.564	3.95	0.6701	0.0983	6.815	4.44	
AUDIOV	0.6940	0.1469	4.723	3.81	0.3902	0.0931	4.190	2.58	
DOCUM	0.5664	0.1170	4.480	3.11	0.3230	0.0812	3.978	2.14	
Marginal utilit	y of income			0.182	1			0.151	
* marginal wtp in euro per each service when income = 20,658 euro									

Table 8 WTP depending on gender										
Subsample of women						Subsample of men				
(190 observations)						(362 observations)				
Variables	Coefficients	Std.Dev	t-stat	*	Coeff.	Std.Dev	t-stat	*		
HOURS	0.6575	0.1090	6.034	4.26	0.6471	0.1025	6.310	3.71		
AUDIO	0.4334	0.1020	4.247	2.81	0.4928	0.0915	5.385	2.83		
TOURS	0.9333	0.1031	9.050	6.05	0.7843	0.0893	8.781	4.50		
BAR	-0.2383	0.1003	-2.376	-1.54	-0.2039	0.0995	-2.049	1.17		
EXHIBIT	0.2092	0.1171	1.787	1.36	0.3808	0.1138	3.345	2.19		
EVENT	0.8147	0.1119	7.283	5.28	0.2206	0.1091	2.023	2.47		
LAB	0.6066	0.1301	4.661	3.93	0.7782	0.1147	6.784	4.47		
AUDIOV	0.7180	0.1341	5.356	4.65	0.3862	0.0983	3.928	2.22		
DOCUM	0.4272	0.0910	4.696	2.77	0.3815	0.0975	3.913	2.19		
Marginal utility	of income			0.154	•			0.174		
* marginal wtp in euro per each service when income = 20658 euro										