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Antecedents of online purchasing behaviour in the tourism sector

Online purchasing

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Abstract

Purpose - The purpose of the paper is twofold. First, it investigates antecedents of online purchasing behaviour, taking into account the relationships between the constructs of service quality, perceived value and loyalty. Second, the study analyses up to what point men's and women's behaviours are similar.

Design/methodology/approach – A survey was sent to the general public in Spain. Respondents were required to be consumers of online travel agencies. In total, 1,201 valid questionnaires were collected. No gender bias was detected in the sample. The data were analysed through Structural Equation Modelling to assess the proposed model. To determine non-invariant parameters across the two groups (men and women), a test for invariance was conducted.

Findings – Both functional quality and hedonic quality are shown as antecedents for perceived value, and, in turn, perceived value impacts loyalty. The impact of loyalty on purchasing behaviour is significant, though weak. Gender differences are also examined and all parameters of the model are found to operate equivalently among men and women, indicating that both groups perform similarly. **Practical implications** – This paper highlights that the hedonic dimension of quality is important in adding value for customers. Accordingly, managers should reinforce this dimension and include it in

Originality/value - Although the link between perceived quality and value-loyalty is well-established, there are still few studies that expand this link upstream or downstream. This paper analyses the next link in this chain.

Keywords E-commerce, Tourism industry, Hedonic quality, E-service quality, Functional quality, Purchasing behavior

Paper type Research paper

1. Introduction

E-commerce is growing worldwide as virtual companies have major economic potential (Guo and Barnes, 2009). In particular, there are a number of forces encouraging firms operating in the tourism industry to adopt e-business models (Wang et al., 2002). In this context, service quality has achieved strategic importance as a way to generate brand awareness and built a solid reputation (Carlson and O'Cass, 2010).

Service quality is defined as a client's subjective comparison between expectations and perceived standard of delivery (Parasuraman et al., 1988). This means that in order to provide an outstanding service, we would need to exceed customers' expectations. Within the e-commerce environment, quality is conceived as customers' perceptions and judgements regarding the excellence and quality of a delivery in an online context (Lee and Lin. 2005).

Measuring service quality is a challenging task, as it has many psychological features that often extend beyond immediate encounters. Previous research on service quality measures have approached this construct in a number of ways, with studies examining website quality (Kuo, 2003), satisfaction with e-commerce channels



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(Devaraj et al., 2002), factors that lead to website success (Liu and Arnett, 2000), dimensions of service quality (Cristobal et al., 2007), and the influence of virtual communities (Zha et al., 2014).

Although it is difficult to agree on how to best proxy service quality, there is consensus among researchers when defending that customers' demands are rapidly evolving. Companies operating online are expected to develop user-friendly interfaces that guide customers throughout the entire purchasing process. They should also implement quality standards, not only in the process but also in the delivery. These strategies may help reduce the uncertainty and risk many users still perceive when purchasing online.

In the tourism sector, when a tourist faces a new purchasing decision quality is one of the most important variables taken into account (Moliner *et al.*, 2007). Demands for high-quality standards are more stringent than in other sectors because of the intangibility component of the service offer. Firms should rapidly respond to these demands in order to retain customers. With the rapid expansion of social networks and Web 2.0, users can easily share their opinions about their experiences, influencing other users' purchasing decisions. Additionally, the internet allows for rapid comparisons among competitors, facilitating movement from one supplier to another with no additional cost.

Consistent with this reasoning, and considering the dynamism of the online world, firms need to continuously update how quality is assessed. Moreover, e-service quality is a relevant driver of increased sales. Therefore, further research should be conducted to analyse its impact on specific constructs that have been linked to e-service quality, such as loyalty and customer purchasing behaviour (Iliachenko, 2006).

To fill this gap, this paper uses the service quality scale developed by Bernardo *et al.* (2012) validated in the context of online travel agencies, which in turn is based on an in-depth literature review which takes the paper of Ho and Lee (2007) as a basis. Anchored in this prior research, this study aims to expand the model tested by these authors by adding a new construct: consumer purchasing behaviour.

Literature on consumer behaviour embraces two main research streams: studies considering consumers' intentions (San Martín and Herrero, 2012; Sparks and Browning, 2011) and studies using real consumer behaviour. Both approaches are valid. For the purpose of this paper, however, we adopt this latter approach, as there are several voices that claim that implications for practice are much more relevant if real consumer behaviour is captured (De Cannière *et al.*, 2009). Accordingly, consumer purchasing behaviour is introduced as the last link in the chain of "quality, perceived value, loyalty, and behaviour".

Taken as a whole, this study contributes to the existing literature in different ways. First, it provides new empirical evidence on the antecedents of purchasing behaviour and their relationships. Second, real consumer behaviour is captured responding to the call for further studies based on real actions instead of intentions. In addition, the study examines gender differences on consumers' purchasing behaviour, as previous studies reported inconclusive results (Kim *et al.*, 2012). The empirical application considers online travel agencies operating in Spain.

The main implications for practice include the indication that managers should devote careful attention to website design, as it is precisely through this interface that customers and the company interact. Service quality is therefore needed from the very beginning of the customers' journey. It is no longer sufficient to just deliver an excellent service in the consumption stage, but from the first moment of truth, that is, the point at which the potential customer shows interest in a company's offer.

Online

purchasing

behaviour

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The structure of the paper is as follows. Section 2 sets the theoretical underpinnings that support the hypotheses. Section 3 follows with the methodology. Next, Section 4 displays the results. The discussion of the results is presented in Section 5. Lastly, Section 6 comprises the conclusions along with the limitations and indications for future research.

2. Literature review and hypotheses

2.1 Measuring service quality in online travel agencies

Petnji Yaya *et al.* (2012) conducted a review of the applications and adaptations of the E-S-QUAL scale since its publication in 2005 (Parasuraman *et al.*, 2005). This scale quickly became very popular, with an even faster diffusion than Servqual, which was published in the mid-1980s (Parasuraman *et al.*, 1988).

In the particular setting of e-travel agencies, there have been several attempts to establish a scale to assess service quality. Two years after the publication of the E-S-QUAL, Ho and Lee (2007) proposed a scale. A second-order construct was developed, including five dimensions: information quality, security, website functionality, customer relationships, and responsiveness. The scale was proved to be very consistent, although the recent findings of Parasuraman *et al.* (2005) had not yet been considered in its design. Aiming to fill this gap, five years later Bernardo *et al.* (2012) updated the scale and proposed an expansion, testing it in the same context. They included four functional dimensions of the E-S-QUAL scale: efficiency, system availability, fulfilment, and privacy. Next, using their new scale they assessed the chain that links service quality with perceived value and perceived value with loyalty. Although the empirical analysis was sound and reported reliable measures, we propose that a final step is missing in this chain, one linking loyalty with purchasing behaviour.

In a similar vein, Mouakket and Al-hawari (2012) validate the relationships among e-service quality, hedonic and utilitarian values, satisfaction, and e-loyalty intention. Results indicate that e-service quality significantly impacts hedonic and utilitarian values, which in turn affect buyers' satisfaction. Likewise, Alonso-Almeida *et al.* (2014) proposed an e-quality model for touristic packages purchased online. This study also identified a partial mediation of perceived value between e-quality (functional and hedonic) and loyalty.

More recently, in an integrated model examining which factors affect intentions to purchase travel services online, Amaro and Duarte (2015) found that intentions were determined by attitude, compatibility, and perceived risk. Similarly, Sirakaya-turk *et al.* (2015) corroborate the efficacy of tourists' hedonic and utilitarian shopping values in predicting overall shopping satisfaction and destination loyalty.

2.2 Service quality as an antecedent of perceived value

Prior studies on e-service quality mainly concentrate on linking this construct with customer satisfaction (Mouakket and Al-hawari, 2012) and loyalty intention (Sadeh *et al.*, 2011). However, very few of them investigate the effect that e-service quality has on perceived value, and those that do so do not differentiate between the functional and hedonic dimensions of service quality, leaving room for new advances.

Ravald and Grönroos (1996) analysed the value concept as the ability to provide superior value to customers and observed that the underlying construct of customer satisfaction was more than a perception of the quality received. This suggests that not only the hedonic dimension needs to be considered but also the customer's real

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necessity of consumption and their willingness to pay for it. Five years later, Sweeney and Soutar (2001) conducted a literature review on perceived value, and found that the first attempts to conceptualise this construct were only based on achieving satisfaction. Nevertheless, perceived value is different from satisfaction. While the former is built during the purchasing process, satisfaction is a post-purchase evaluation. Perceived value is related to the trade-off between benefits and sacrifices (Chang *et al.*, 2009), while satisfaction refers to how a product or service meets or surpasses customer expectations. At the end of the last decade, perceived value was linked with lead time service alongside quality attributes.

Consistent with theoretical insights from diverse disciplines (Okada, 2005; Voss et al., 2003), we argue that the conceptual distinction between functional and hedonic attribute subsets of service quality is essential, as both of them capture different consumption needs. Under the functional (or utilitarian) perspective, consumers are concerned with purchasing products and services in an efficient and timely manner to accomplish their purposes with minimal irritation and error (Childers et al., 2001). Because of this goal-driven motivation, customers are envisaged as thoughtfully comparing and evaluating information regarding the product/service offer prior to making a decision (Babin et al., 1994). In contrast, in the hedonic view, the "adventure" of shopping and the potential entertainment it might entail transforms the attainment of a specific objective into an amusing experience (Hirschman and Holbrook, 1982). This way, we argue that whereas functional components of the service provide the instrumental and practical benefits, the hedonic attributes provide aesthetic, experiential, and enjoyment-related benefits (Chitturi et al., 2008).

Examples of functional service attributes in the e-commerce context that might be valued by customers include fast-loading web pages, security issues, or a friendly interface (Dhar and Wertenbroch, 2000). On the other hand, the hedonic dimension can be represented by the fun aspect of using information systems (Van der Heijden, 2004).

Drawing on Maslow's hierarchy of needs framework, there is the intuition of a sequential importance of these dimensions of service quality (Falk *et al.*, 2010; Valacich *et al.*, 2007). In the e-commerce sphere this translates into saying that the online platform first needs to satisfy the customers' basic needs (structural firmness and functional convenience) before it diverts customers' attention to pursuing higher-level needs (hedonic attributes). Notwithstanding, in our approach we consider the two dimensions as independent antecedents of perceived value. We argue that e-commerce is mainly a self-service technology (Alonso-Almeida *et al.*, 2014); therefore, customer co-creation is high (Lin and Lu, 2011; Mohd-Any *et al.*, 2015), which in turn increases the importance of hedonic pursuits. Further, because each customer behaves differently and has different motivations for shopping and therefore might pursue different objectives (instrumentally oriented goals vs fun and enjoyment), we pose that both dimensions need to be considered separately. Accordingly, we formulate:

- *H1.* High levels of functional quality in a website are positively related to high levels of perceived value.
- *H2.* High levels of hedonic quality in a website are positively related to high levels of perceived value.

2.3 Perceived value as an antecedent of loyalty

Loyalty can be related to a positive attitude that may lead to a repeat purchase, in terms of acquiring the same product/service or being loyal to a particular firm (buying new

products/services, but from the same supplier). In the online context, many definitions can be found. Anderson and Srinivasan (2003, p. 125) define loyalty as a "customer's favourable attitude toward an electronic business which leads buying behaviour". Similarly, Luarn and Lin (2003, p. 157) refer to this construct as "the intention of a consumer to repurchase products/services through a particular e-service vendor", while Cyr et al. (2005) consider loyalty as perceived loyalty towards a website, with the intention of revisiting the site or buying from it in the future. More recently, Solano-Lorente et al. (2013, p. 107) stated that loyalty is "the favourable attitude of the end user towards an online service that results in repeat use behaviour".

Previous works have suggested that perceived value has a direct and significant influence on loyalty and e-shopping (Chiou and Shen, 2006; Fuentes-Blasco *et al.*, 2010; Ribbink *et al.*, 2004). Going a step further, Boshoff (2007) studied loyalty as an antecedent of perceived value, and showed that the E-S-QUAL tool is a valid and reliable scale for measuring quality in the electronic service shopping context.

This relationship is also valid in the tourism sector (Gallarza and Gil Saura, 2006). Chang *et al.* (2009) confirms this hypothesis, observing significant moderating effects of customers' perceived value on the relationship between satisfaction and loyalty. These authors conclude that perceived value leads to loyalty in a website by decreasing an individual's need to look for different service providers. If the perceived value is high, customers will be less likely to switch to competing sites.

According to Moliner *et al.* (2007), perceived value and quality are two of the main aspects for a travel agency that allow it to capture a customer's loyalty. Based on the above arguments, we hypothesise as follows:

H3. High levels of perceived value in a website are positively related to high levels of loyalty.

2.4 Loyalty as an antecedent of purchasing behaviour

Consumers tend to buy familiar or well-known products, as they feel more confident with what they are actually purchasing (Chi et al., 2009). Likewise, a positive image through word of mouth is essential for boosting brand awareness (Kim et al., 2004). In this setting, loyalty refers to the psychological commitment that a consumer makes in the act of purchasing (Nam et al., 2011). This commitment may translate into the intention to purchase or to recommend. Certainly, previous studies evidence that loyalty has a strong impact on purchasing intention (Hawes and Lumpkin, 1984; Sproles and Kendall, 1986).

Research in online travel agencies has examined consumer purchasing behaviour. One example is the work of Lang (2000), who suggests that while travel consumers are increasingly turning to the internet, many of them are still reluctant to book online, preferring more conventional distribution channels. In such cases, the internet is used as a way to obtain information, while very few users that access a website regularly book online. These findings highlight the existence of different behavioural pathways between purchasers and non-purchasers. As a result, the literature is inconclusive on how to best proxy the purchasing behaviour of consumers. While some authors use purchasing intention (regardless of whether they purchase or not), others use actual purchases.

A first group of studies includes those that postulate that consumer purchase intentions provide an acceptable proxy for actual online purchasing behaviour. According to Venkatesh and Davis (2000), intention does not represent a serious shortcoming, because there is substantial evidence supporting the existence of a causal

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link between intention and behaviour. Examples using this approach include the work of Jeong *et al.* (2003), who use a two-item seven-point Likert scale to proxy customer's likelihood of buying. These items are: "If I purchase books in the next 30 days, I will use the online bookstore" and "I strongly recommend that others use the online bookstore". Lee and Lin (2005) also make use of the same scale to examine the relationship between e-service quality dimensions and overall service quality, customer satisfaction, and purchase intentions.

However, a second group of authors suggests that purchasers and non-purchasers behave differently (Yang and Jun, 2002) with regard to the evaluation of service quality. Therefore, it is argued that if the main objective is to analyse purchasing behaviour, an actual purchase should be much more precise than the willingness to purchase. In the same vein, Bowen and Shoemaker (1998) developed a conceptual model for an online virtual community that linked loyalty with travel product purchases, where the last construct operationalised used the number of travel products purchased. Exploring the same relationship, Huang (2008) found that loyalty to a web-based travel agency resulted in an increased intention to purchase from that agency. In the online supermarket setting, Marimon *et al.* (2010) tested the link between quality and purchasing behaviour through perceived value and loyalty. In this case, purchasing behaviour was captured using the value (total amount) and the frequency (number of orders) of purchases made.

For the purpose of this study, we use the latter approach, and employ the number of orders made by the customer during the previous year to represent real consumer purchasing behaviour. Accordingly, we hypothesise:

H4. High levels of loyalty to a website are positively related to high levels of purchasing behaviour.

Figure 1 graphically illustrates the resulting model, showing the expected relationships between the different constructs.

2.5 Gender

According to Kumar and Varshney (2012) and Palan (2001), there is a need for further studies that address gendered perspectives in the literature on consumer behaviour. Following this suggestion, the potential differences between women and men in online purchasing behaviour are also explored.

Previous research in this field indicates that dissimilar behavioural paths are observed between men and women. For instance, Weiser (2000) showed that males mainly use the Internet for entertainment and leisure, while women mainly use it for interpersonal communication and educational purposes. In the context of e-commerce, Sheehan (1999) found gender differences, being women more cautious in online

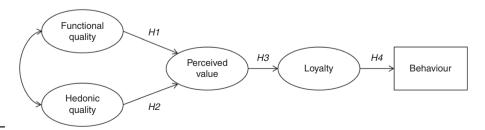


Figure 1.
Research model

shopping, and Rodgers and Harris (2003) found that women tend to be less satisfied than men with online shopping. These differences are due to diverse behaviours in terms of perceived emotional benefits, trust, and convenience.

There is, however, another bulk of studies supporting the hypothesis of similar behaviours. Kolsaker and Payne (2002) and Lian and Yen (2014) demonstrate that gender differences in perceptions of e-commerce are marginal and insignificant. As e-commerce is currently growing exponentially, consumers (female and male) use and perceive e-service quality in a very similar manner. In this respect, Davis *et al.* (2014) suggest that there is no online gender effect on hedonic shopping motivation and purchase intentions.

Aiming to test for potential gender differences, we hypothesise as follows:

H5. There are no significant gender differences in the hypothesised relationships expressed in the model.

3. Methodology

A survey was designed consisting of six main sections. Section 1 comprises the demographical data of the respondents. Sections 2-5 use the same items as those validated by Bernardo *et al.* (2012). For each dimension, items are based on a five-point Likert scale, ranging from strongly disagree (1) to strongly agree (5) – see Table I for the detailed questionnaire. Finally, Section 6 measures consumer behaviour using one observed variable. Respondents were asked "How many times have you purchased from this site over the last year?".

A specialised marketing research company was in charge of conducting the fieldwork in 2010 and 2011. The survey was administered by telephone to the general public in Spain, so that the final sample was in accordance with the target audience. Products bought by respondents include hotel reservations, aeroplane tickets, vacation packages, cruises, and leisure activities. For inclusion, respondents should have purchased one of the listed products through an online travel agency and consumed it within the past year. Because respondents might have used online travel agencies more than once, we asked them to concentrate on their last experience. In total, 1,201 valid questionnaires were collected. No gender bias was detected in the sample (598 surveys were completed by men and 603 by women). The majority (55.8 per cent) of the respondents were under 35 years old. The educational level of the sample was high, with two-thirds of the respondents having a university degree. The average number of purchases made by each respondent in the preceding year was 3.090 (standard deviation = 3.874).

The full model was estimated using structural equations modelling (SEM) using the maximum likelihood method from the asymptotic variance-covariance matrix. Calculations were made using EQS software (version 6.1).

4. Results

The figures reported in Table I support the validity of the scales suggested by Bernardo *et al.* (2012). The four constructs are reliable in terms of the classic thresholds of Cronbach's α (> 0.7), composite reliability (> 0.7), and average variance extracted (> 0.5) (Hair *et al.*, 1998).

Discriminant validation is also acceptable (Table II). The only issue to consider is the high correlation between perceived value and loyalty, suggesting that these two concepts may be indistinguishable.

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IMDS 116,1	Item			Load	t-Statistic	Mean	SD	
110,1	F1: Functional quality (Cronbach's $\alpha = 0.937$; $CR = 0.940$; $AVE = 0.636$)							
0.4	This site makes it easy to find what I need It is easy to navigate on this site This site enables me to complete a transaction quickly Information on this site is well presented			0.811 0.815 0.824 0.782	- 29.405* 30.820* 28.198*	4.098 4.048	0.959 0.959 0.951 0.987	
94	5 The pages load quickly on this site			0.785	25.592*	3.928	0.948	
	 6 It is easy to get onto this site quickly 7 This site is always available for business 8 This site makes items available for delivery within a suitable time frame 9 This site delivers the items ordered 			0.802 0.762	22.851* 23.199*		0.921 0.960	
				0.791 0.806	21.809* 26.375*		0.907 0.962	
	F2: Hedonic quality (Cronbac 1 I enjoy the multimedia	information, sugge	estions, and			0.505	1110	
	recommendations prov I think it is great fun to When interacting with	o browse this site		0.750 0.862	- 27.916*		1.146 1.093	
	time has elapsed 4 I enjoy sharing comme 5 I really enjoy shopping	nts and experience	s from other travellers	0.799 0.656 0.805	26.403* 21.596* 25.511*	3.020	1.180 1.314 1.051	
	 F3: Perceived value (Cronbach's α = 0.868; CR = 0.877; AVE = 0.591) The prices of the products and services available at this site are economical Overall, using this site is convenient This site gives me a feeling of being in control Overall, this site gives me value for my money and effort The experience of this site has satisfied my needs and wants 			0.651 0.807 0.754 0.777 0.840	- 19.671* 17.414* 22.636* 20.865*	4.068 4.034 4.006	0.934 0.840 0.878 0.910 0.883	
Table I.	F4: Loyalty (Cronbach's $\alpha = 0.777$; $CR = 0.777$; $AVE = 0.538$) I encourage friends and relatives to do business with this site I say positive things about this site to other people I will do more business with this site in the next few years				- 24.655* 20.169*	3.782 3.798 4.196	1.124 1.107 0.869	
Reliability of the scales	Notes: CR, composite reliability; AVE, average variance extracted. *Significant at 5 per cent level Source: Based on Bernardo <i>et al.</i> (2012)							
		1 2		3		4		
Table II. Bivariate correlations between main constructs and the square root	Functional quality Hedonic quality Perceived value Loyalty	0.797 0.443 0.611 0.568	0.777 0.530 0.516		<i>769</i> 798		0.733	
of average variance extracted	Note: The square roots of AVE are in <i>Italic font style</i> on the main diagonal and the correlations between latent variables follow below							

The next step consisted of conducting the structural analysis using SEM. The behaviour variable was controlled for age and gender. None of the controlling variables turned out to be significant. The fit indices obtained in the measurement model estimation showed good general fitness. χ^2 was 791.6986 with 226 degrees of freedom

and a p-value of 0.000. χ^2/df was 3.50, which was under the acceptable limit of 5. RMSEA was 0.053, and the CFI was 0.924. All hypotheses were confirmed at a confidence level of 95 per cent (Table III).

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Multigroup CFA was used to test gender invariance. This method is appropriate for testing whether both the factor structure and the factor loadings are invariant across gender. Moreover, it has the advantage of replicating the CFA across groups, demonstrating the reliability of the factor structure. In the first step, separate CFAs were performed for each group (men and women). The one-factor model provided a good fit for both men ($\chi^2 = 517.9242$ with 226 degrees of freedom, $\chi^2/df = 2.29$, RMSEA = 0.053, CFI = 0.914) and women (χ^2 = 469.9100 with 226 degrees of freedom, $\chi^2/df = 2.08$, RMSEA = 0.049, CFI = 0.938). Factor loadings are presented in Table IV. A visual comparison of the loadings shows considerable similarities for both men and women.

In the second step, the constrained model was run, where factor loadings were constrained to be equal in the models for men and women. To locate parameters that are non-invariant across groups, we looked for probability values associated with the incremental univariate χ^2 values that are < 0.05. The results displayed in Table IV reveal that all parameters operate equivalently across men and women. Therefore, we conclude that both groups perform similarly.

5. Discussion

Considering our data set, H1 and H2 are confirmed, as both functional quality and hedonic quality have a positive influence on perceived value, although they behave differently. Compared with the hedonic dimension, the functional quality dimension greatly impacts perceived value. In the context of e-commerce these results underline several useful managerial implications.

Hypotheses		Path coefficient (standardised solution)	t-value*	Hypothesis
H1 H2 H3 H4	Functional quality→perceived value Hedonic quality→perceived value Perceived value→loyalty Loyalty→behaviour Covariance between functional quality and hedonic quality	0.496 0.368 0.958 0.088 0.483	7.814 7.977 16.615 2.235 9.728	Accepted Accepted Accepted Accepted
Note	: *Significant at 5 per cent level			

Table III. Hypothesis results for the structural model

	Paths (men subsample)	Paths (women subsample)	Univari χ^2	ate increment Probability	
Functional quality—perceived value Hedonic quality—perceived value Perceived value—loyalty Loyalty—behaviour Note: *Significant at 5 per cent level	0.477* 0.343* 0.940* 0.029*	0.511* 0.388* 0.968* 0.088*	0.321 1.115 0.656 0.410	0.571 0.291 0.418 0.522	Table IV. Paths for each group and univariate increment analysis

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Specifically, the findings highlight the need for e-service providers to invest in quality, revealing that having an appealing and friendly user website is not sufficient. Websites should be as clear as possible, providing the correct information in the right place. As the service will be contracted by employing an online transaction, the functional quality of the website will be highly tied to its perceived value. In order to increase service quality delivery, online travel agencies should pay attention to factors such as security, ease of use, graphic style, reliability, and responsiveness (Sousa and Voss, 2012). Other factors in which website designers should focus include privacy issues, time savings, order fulfilment, error-free systems, and simplicity vs complexity. Managers should also be aware that current and potential customers are learning and changing their needs. Consequently, websites have to be ready to incorporate changes at any time and at a very fast speed.

The hedonic dimension is also relevant and might help in reformulating e-strategies that assist competitive advantage in the long term. Customers want to enjoy the experience of buying a service travel pack. This means that the hedonic dimension of quality gains prominence once the utilitarian dimension is achieved. The hedonic dimension is therefore paramount in adding value for buyers and acts as a catalyst, increasing sales. Accordingly the reinforcement of this service quality dimension must be included in the business strategy. Online travel agencies need to consider that their clients are not only willing to purchase an excellent and exciting touristic package, but that they are also seeking to enjoy the experience of purchasing (e.g. having an original web design, presenting information in a fresh and attractive way, etc.). This implies marketing managers knowing the profile of their customers and trying to predict their behaviour. Because the online platform is the place through which interaction and the purchasing act takes place, efforts should be directed towards its conceptualisation and design. The website must create an emotional bond between the customer and the company. This objective can be achieved using different innovative strategies (Couture et al., 2015). Examples include the use of online communities, offering customers the possibility to share their unforgettable memories, experiences, and opinions (Alonso-Almeida et al., 2014), as well as the use of promotional actions that are only accessible for those actively involved in providing feedback and participating in the online community.

All in all, and despite the hedonic dimension having a greater impact on perceived value, it is important to highlight that this dimension should be enhanced not in isolation but alongside the functional dimension, otherwise the service provided will not fulfil the basic requirements users expect.

As for *H3*, the results confirm that higher levels of perceived value have a positive and significant effect on loyalty. This finding is in line with the works of Gallarza and Gil Saura (2006) and Bernardo *et al.* (2012), revealing that e-quality is an important driver for achieving higher levels of loyalty. In terms of managerial implications, this finding confirms that the relationship between perceived value and loyalty is significant in the context of B2C in the tourism industry. During the purchasing process, this perceived value will help in converting sporadic customers into loyal ones, preventing customers from changing service provider when purchasing travelling packages. Again, managers can also improve the quality of the service offer by making the purchasing process more enjoyable, which in turn will help retain the customer and convert them into a loyal one (Drengner *et al.*, 2012). Having loyal customers is of great importance. According to Mouakket and Al-hawari (2012), e-customers undoubtedly influence third parties such as relatives or friends. Moreover, with the rise of social media, opinions can now be easily spread, and the exchange of information between consumers and prospective consumers has increased exponentially.

Concerning the connection between loyalty and behaviour, results reveal that despite the path and its associated t-statistic being low, there is a weak but statistically significant relationship. Similar results were observed in Marimon et al. (2010) in the e-retailer setting. In this study, the authors found that loyalty influenced actual purchases. The authors provided empirical confirmation of the final link in the chain between the dimensions of e-quality and financial turnover, which had not been investigated in previous studies. Similar to our results, the R^2 for actual purchases was quite low, suggesting that other factors might play a role and need to be included in a more comprehensive model. The practical implications of this last step of the chain are that, although at a low level, loyal customers are a relevant driver for the success of online travel agencies. Recent literature suggests that the information collected by the e-shopper might also be an antecedent of real purchasing (Lin and Lekhawipat, 2014). Some websites such as Tripadvisor are becoming more and more popular with a strong brand affecting loyalty and the online buyer behaviour. Indeed, new trends should be considered as e-commerce has a very dvnamic lifecvcle.

Finally, gender differences are also examined; nevertheless, results suggest that men and women have similar behaviour. From a managerial perspective, these results indicate that there is no need to conduct different marketing strategies across gender in online websites. These results support the argument that online gender is a performance that is hidden by the technological veil (Davis et al., 2014).

6. Concluding remarks

This study complements previous works in the e-commerce and consumer behaviour literature. In particular, this study expands the model developed by Bernardo et al. (2012) by adding a final step in the value chain from service quality to loyalty: customer behaviour. The empirical application considers the e-commerce context, particularly online travel agencies. As for the key findings, the results validate the inclusion of this last step in the value chain, corroborating that loyalty is positively related to actual purchase behaviour. Contrary to expectations, gender differences are not found in any of the relationships tested.

This research presents some limitations that should be considered. One limitation relates to the size and breadth of the sample, which is similar to that of other empirical studies. Second, the geographical origin of the sample (Spanish consumers of online travel agencies) prevents us from generalising the results. Future studies may focus on comparisons between different countries, examining potentially different approaches among travel agencies, depending on their geographical locations. Additionally, this study can be replicated and complemented in other service industries. Both cross-sectional and longitudinal studies could also extend the validity of the results. Third, considering that the sample used in this study was collected in 2010, an update of this analysis is required in the forthcoming years.

The extant literature is in need of antecedents of actual behaviour and future research is needed in this area. Further studies might also include additional variables to explain consumer behaviour to better understand the relationship between quality (in its multiple dimensions) and consumer behaviour, and improve the explanation power of the model. More research is required to further investigate these factors. Analogously, it would be interesting to examine the use of alternative methods for measuring and capturing real behaviour.

It is also suggested that the emphasis on consumer behaviour is increased depending on the type of product, brand, or travel destination. Other future research

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avenues might consider analysing the impact of the recovery action of the provider in the case of failure or complaint. Indeed, both scholars and managers are increasingly paying attention to this relationship (e.g. Sousa and Voss, 2012).

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Further reading

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