

Web Usability in the Irish Airline Industry

Low-cost carrier Ryanair are expanding rapidly and have been tipped to become Europe's biggest airline, following the order of 100 new aircraft in a deal with Boeing worth around 5 billion Euro (Canniffe, 2002). Ryanair boast that 92 per cent of bookings are now being conducted online (www.mii.ie 2001) and that their profits are up by 35 per cent in the last three months of 2001 (www.ryanair.com 2002). In comparison Aer Lingus, a more traditional full service airline has 20 per cent of the company's customers booking via the web (Carey, 2002). They are currently carrying out a survival plan, and have been described as 'haemorrhaging cash' (www.washingtonpost.com, 2002) and are facing losses of up to £170 million in 2002 (McManus, 2001). At the Dublin Institute of Technology, we are conducting research into the online services of the two major Irish players Ryanair and Aer Lingus, drawing on the various methodologies and web usability guidelines in the literature. From this we may establish whether the usability of both sites reflect their business success or failure.

Amarach Consulting (2000) have found travel services to be the most popular e-commerce purchases in Ireland. It has been pointed out that the travel industry is well suited to the e-commerce paradigm (Law & Leung, 2000:202). In 2001 the Irish online travel spending was at 38 million Euros, and is expected to reach 45 million Euros by 2005 (McCaughren, 2001). It is claimed that the Internet has made life much easier for consumers who search for travel information and organise their travel arrangements via the web (Miller, 1999). But there is considerable variability in how well different sites perform for companies and for consumers. The literature highlights many web site related issues that need to be examined in the context of the airline industry.

The full potential of interactive media will not be realised unless more complete research is undertaken on consumers' information acquisition processes on the Internet (Klein, 1998: 195). The search habits of consumers in the interactive web environment play an integral role in influencing information acquisition processes and buying decisions (Rowley, 2000). The skill of predicting and evaluating various

approaches that consumers employ during the search process is therefore a key success factor for any business on the web (Gretzel et al 2000:150).

In the literature, web usability is highlighted as a key factor likely to affect web search and subsequent buying behaviour. In fact it has been claimed that "usability is a prerequisite for e-commerce success" (Nielsen et al, 2001). The main elements of usability may be categorised as primarily personal factors and primarily stimulus factors. The main personal factors are constructs such as consumer attitudes, expectations, satisfaction and consumer commitment. The main stimulus factors are encapsulated in web design, which incorporates elements such as web content, web structure and web accessibility. These personal and stimulus factors interact to form the total web experience for consumers.

In relation to personal factors, it has been claimed that in order to develop, evaluate and improve the usability of virtual environments, a comprehension and appraisal of human performance and satisfaction is necessary (Gabbard & Hix 1997). A large number of web sites are poorly designed, because user requirements are often not incorporated into the web design process (Vora, 1998; Nielsen 1999; 1996; 2001).

Online purchasers' attitudes and behaviours towards the site is affected by a mixture of web design evaluation, brand loyalty (Supphellen & Nysveen 2001), and the outcome of their first online purchase experience (The Boston Consulting Group, 2000). If a consumer encounters a positive experience on a web site, it is likely that it will increase their time spent at the site (Hoffman & Novak 1995). Furthermore, if consumers are satisfied with the site it is plausible that they may revisit.

In regard to stimulus factors, taking the content aspect of design first, Nielsen (1999) suggests three main guidelines that he feels should be obeyed when writing content for any web site. These include creating a web site that is concise, scannable, and objective. In addition, many sites lack fundamental up-to-date information, and appear more interested in content quantity than content quality (Lamas, 2000).

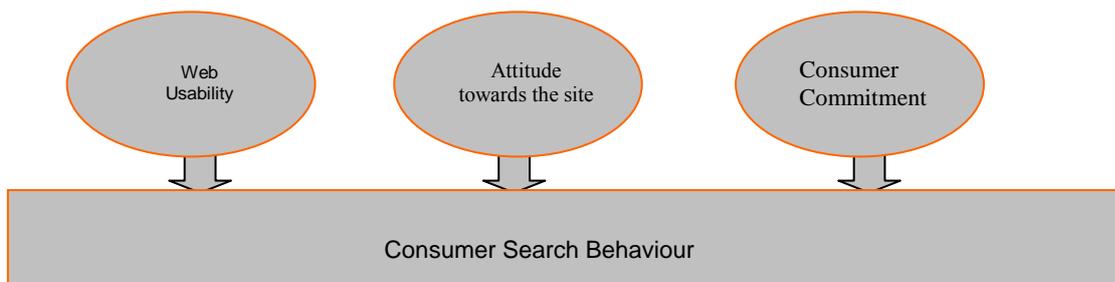
As regards the structural aspect of design, web content should be presented and structured in a scannable format that supports navigation (McGovern, 2000:56). Many users express frustration at getting lost within sites (Badii & Murphy, 2000).

Modjeska & Marsh (1997) found that site structure significantly affects user navigation. Therefore, web structure needs to be carefully considered in web design guidelines to assist in user navigation, and to deter users feeling disorientation and getting “lost in hyperspace”(Modjeska & Marsh, 1997).

Accessibility is the other key stimulus factor involved in web design. GVVU's 10th User Survey reports that one of the top pressing issues facing the Internet is speed of downloading a page to access content on particular web sites (www.cc.gatech.edu 1998). Long-download times and large graphics have been the basis of many complaints (Lamas, 2000). Consumers expect to be able to download a homepage in less than six seconds; if this does not occur it is likely that the consumer will not revisit. Research conducted on this problem has indicated that if web designers indicate a downloading time to consumers', it may reduce consumers' negative evaluations of the website (Dellaert & Kahn 1997). “It doesn't matter how cheap the products are if people can't find them or if they get stuck on a step in the checkout process” (Nielsen et al, 2001). A major concern, therefore, for any e-commerce site, is how easily users can find the information they need and how accessible it is.

The issues discussed above represent the core of the research being conducted in The Dublin Institute of Technology. The aim of the research is to examine the search behaviours of consumers in the Irish airline industry within the specific context of e-business and to make recommendations as to how knowledge of the factors may be integrated in the overall marketing strategy of both Ryanair and Aer Lingus. In light of the importance of these factors to the success of e-commerce the extent to which e-commerce company executives are familiar with the perceptions of consumers in the above regards will also be assessed, with a view to establishing what changes, if any, are needed in order that Irish Airline companies can bring their E-marketing practice as close as possible to that which will facilitate consumer acceptance of and commitment to their products and services.

The model below, adapted from the work of Supphellen & Nysveen (2001) on the airline SAS is followed. The model suggests that attitudes towards the site are formed on the basis of evaluations of specific web usability factors. In turn, attitude toward the site influences the intentions to revisit the site. Each of these factors in some way affects consumer search behaviour.



Accordingly, the following research objectives have been set:

To determine the attitudinal reactions, search behaviour and levels of commitment of Irish consumers towards Irish airline web sites on the following usability dimensions:

- searching and navigating mechanisms
- sequencing, and linking mechanisms
- ease and speed of accessing information
- quantity, quality, and presentation of information content
- overall usability

To establish whether and to what extent the following factors are associated with variations in consumer attitudes, search behaviour and commitment:

- web expertise of consumers
- age
- social class
- gender
- education level

To ascertain company executives' perceptions of the impacts of the following web design elements on consumer attitude, search behaviour and commitment:

- accessibility
- usability
- searching and navigating mechanisms
- content

These objectives will be researched using both qualitative and quantitative techniques.

For the qualitative part of the study, 12 consumers will be recruited using the following selection criteria: web expertise, age, social class and gender. Interviews will be held in the homes of the chosen respondents on a one to one basis. The consumers will be asked to carry out specific tasks on both the Ryanair and Air Lingus websites using their own computer equipment. Behavioural, affective and cognitive responses will be assessed in depth.

Based on the analysis of this in-depth research, a quantitative online survey will be designed and administered to a sample of 200 consumers using the same selection criteria (web expertise, age, social class and gender).

Personal interviews will also be held with marketing executives in the Irish airline industry to assess the extent to which their perceptions of web usability tally with those of consumers.

Finally, based on these findings, recommendations will be drawn up for better e-marketing practice.