The effect of electronic marketing mix on the willingness of customers to buy online
(Case study: Universities of Mashhad)

Simin Saliani1*, Mohammad Lagzian2, Ali Maghool3

1. Business Management, Neyshabur Branch, Islamic Azad University, Neyshabur, Iran.
2. Department of Management, Ferdowsi University of Mashhad, Iran.
3. Department of Business Management, Neyshabur Branch, Islamic Azad University, Neyshabur, Iran

Abstract

Today, E-commerce is one the issues raised in business. E-commerce will lead to improve communication at the national and international levels, change the way business is done, and convert traditional markets to newer forms. A new way of shopping that has great benefits is online shopping. Since the marketing mix is effective the willingness of customers to buy, the aim of this study is to review effect of electronic marketing mix on the willingness of customers to buy online. This study is a descriptive survey with applied goals. The statistical population included internet shoppers in the universities of Mashhad city that have done internet shopping at least once. For this purpose, among university of Applied Science and Technology,Ferdowsi University and Islamic Azad University, Ferdowsi University was selected as the cluster and then 380 persons were selected through random sampling method. A questionnaire was used to collect data and the reliability of the questionnaire was assessed by Cronbach's alpha coefficient. Research hypotheses were examined by using a One-Sample T-Test to investigate the efficiency of each variable and Friedman Test was also used to rank variables. The results showed that factors of communication, information collection, product, distribution, price and brand are effective on willingness of customers to buy online.

Key words: E-marketing, E-marketing mix, willingness to buy, online shopping

Introduction

Marketing as an operational and dynamic science is catching up and keeping pace with the changes developments formed in the informatics revolution channel. The impact of the Internet components in the marketing field emphasizes the need to define its key factors. Creating a new concept of marketing, titled "Internet Marketing", under the marketing philosophy, relation that has put its axis supplying the needs of their clients as individual, creating value for clients and development communications and relationships network between companies and individuals, is from this perspective. Concurrent development of marketing, marketing techniques used in marketing planning and controlling have progressed. Marketing mix is perhaps the most important techniques among all these advances. Internet as a manifestation of face to face exchanges has created a platform for accelerating exchange, product introductions, competitive pricing, and distributing product electronically (BagheriKani & Azar, 2004).

In the Web era, internet retailers and customers’ expectation are taken into consideration to conduct operations in a shorter time period. E-commerce is a new distribution channel competing with traditional channels (Hosseini & Parsaeimanesh, 2012).
Importance of Issue
Electronic commerce has changed the way business activities are done. Ability to conduct business through the Internet and computer networks has led to changes in the job environment and consumer behavior. Marketing managers obtain information via analyzing consumer behavior following their success in the market. Identifying the factors influencing online shopping with increasing the number of Internet users, and the way users use this interactive tool as an effective part of purchasing decisions and actions have attracted the attention of scholars and researchers because nearly 72% of Internet users search for various commodities online at least once a month (Olfat et al., 2012). Hence, positive attitude toward Internet shopping can provide survival and profitability of Internet sellers in a competitive market. Since online shopping is an emerging topic in Iran and large volume of sales and purchases are done in electronic form over the world, our country will be obliged to accept and implementation of it in the near future. Today, online-sales are covering 2% of the total sales. This percentage is rising rapidly in the case of special products for women, and it is also very common about certain categories of goods such as computers and various computer software (25%) and a variety of books (12.5%) (Jaefarpur & Rahman seresht, 2010).

According to Nielsen Media Research, the most popular and most purchased items over the world are book (41%), followed by Clothing/Shoes (36%) and Videos/DVDs/Games (24%). Another report from this company showed that the number of Internet users buying books over the Internet has grown 7% in the last two years (Heydarzadeh & Adelpur, 2011).

Accordingly, today's, slow business growth in many areas of the country has perceived more than ever and one of those areas is the area of electronic transactions.

Research Background
The impact of the Internet on marketing mix was studied by Mirhosseini & Azizi (2009). The results showed that the most important traditional and online marketing activities is marketing mix design. So when Internet-based marketing will be successful that Internet marketing mix has the appropriate design. For this purpose, understanding the impact of Internet on marketing mix will be important.

The effect of shopping orientations, online trust and prior online purchase experience toward customers online purchase Intention was examined by Ling et al. (2010). The results showed that impulse purchase intention, quality orientation, brand orientation, online trust and prior online purchase experience have a significant and positive effect on customer online purchase intention.

The role and impact of e-service quality dimensions, overall quality and customer satisfaction on consumer buying decision process of online shopping was reviewed by Heydarzadeh & Adelpur (2011). The results showed that responsiveness and security/privacy affect overall service quality and customer satisfaction. Site aesthetics has a direct impact on overall service quality, but assurance/trust, reliability and personalization were not significantly related to overall service quality or customer satisfaction. The results also indicate that overall service quality has a direct and positive impact on customer satisfaction and that customer satisfaction has a direct impact on consumers’ purchase intentions.

Emotional aspects associated with the online brand were reviewed by Morgan-Thomas & Veloutsou (2011). The results showed that existence emotions towards a brand mean a positive evaluation of the quality, satisfaction and loyalty. Moreover, brand reputation is effective on reliability and perceived usefulness. According to this study, online brand relationships depend on emotional experiences which are created through satisfaction and loyalty.

Literature Review
Electronic Marketing
In general, internet marketing is to use internet to advertising and selling goods and services. Creating a new concept of marketing as the "Internet Marketing" is derived from concept of relationship marketing
which is focused on meeting the needs of customers, creating value for customers and developing a communication and interaction network between firms and individuals (Atafar & Mahmoudi, 2009). Universal and instant access in real-time, infinite environment and interactive and multimedia capabilities are benefits of e-marketing. Website is located in the heart of e-marketing. Website is an online environment where customers can get information about the company and its products, compare products and make transactions (Haghighinasab & Tabeein, 2009).

**E-Marketing Mix**

Many changes in marketing have been created as a result of using the internet; hence, the necessity of using a mixture that is consistent with these changes is essential because the marketing mix is a combination of necessary elements to plan and execute the marketing operations and choosing the right components significantly contributes to the success of the company. With the arrival of electronic communication technologies and doing business electronically, marketing mix design has changed more or less, so that the basic elements of the marketing mix have changed.

**Product:** Report & sviola (1994) have noted that in the age of the Internet, product information is more important than the product itself; indeed, transactions are carried out according to product information. Existence of many new products is just because of the Internet. One of the major benefits of electronic markets is to create value through diversification of products and production of commodities in different versions. For instance, Music can be offered in various types, different size, different quality and price or a Customer can buy only one page of an article which is published in a magazine without needing to buy the whole magazine.

**Price:** Reduction in market prices is caused by internet. Moreover, the ability to compare the various prices on the Internet will increase competition over price reduction and according to economic theory, the price of goods or services approaches to marginal cost.

**Distribution:** The major impact of the Internet on the location is increasing its size, and also it reduces costs of distribution for digital products that is sometimes close to zero.

**Promotion:** Internet is a communication technology and promotion element in the marketing mix related to communication activities. It is obvious that Internet will have a profound impact on promotional activities (Atafar & Mahmoudi, 2009).

**E-business and conflicts with 4Ps**

E-commerce features, such as globalization of trade, removing the locational restrictions, increasing the percentage of sales, No time limit for transactions, easy access to the needed information and dramatic reduction in cost of trading, have caused dramatic changes in traditional marketing mix (4p) (Atafar & Mahmoudi, 2009).

- basis of the World Wide Web is mutual transaction while 4Ps do not consider any option for the customer and environmental conditions are ignored.
- There are no strategic elements in 4Ps.
- Unlike a real environment, P segregation in a virtual environment is not possible.

**Advantages of 4Ps alternatives:**
The main strength of these alternatives is to consider the requirements of the virtual world. In most of these models have not focused on the bilateral relationship and strategic elements are taken into consideration.

In the current situation, markets can not be analyzed only on the basis of the traditional framework, sodiscovery and followof new marketing mix has become more important (BagheriKani & Azar, 2004).

**Research Methodology**

This research is in terms of practical and Survey – Analytical approach. Statistical population of this study includes Students and professors of applied science and Technology University, Islamic Azad
University and Ferdowsi University in Mashhad city which each of these universities were considered as cluster sampling and then Ferdowsi University of Mashhad was selected randomly. A questionnaire was used to collect data. To assess validity of the questionnaire, the content validity has been used. Cronbach's alpha test was used for reliability of questionnaire. The Cronbach's alpha coefficient was equal to 0.873 which indicates that the questionnaire has a high reliability. Then, Questionnaires were randomly distributed among people who have done online shopping at least once. Finally, 380 questionnaires were analyzed.

Research model
Research Hypotheses
The main hypothesis: E-Marketing Mix affects the willingness of customers to buy online positively.
The first sub-hypothesis: Communication affects the willingness of customers to buy online positively.
The second sub-hypothesis: Information collection affects the willingness of customers to buy online positively.
The third sub-hypothesis: Product affects the willingness of customers to buy online positively.
The fourth sub-hypothesis: Distribution affects the willingness of customers to buy online positively.
The fifth sub-hypothesis: Price affects the willingness of customers to buy online positively.
The sixth sub-hypothesis: Brand affects the willingness of customers to buy online positively.

Method of data analysis

Kolmogorov – Smirnov was used in order to investigate normality of the data

As we can see from the above table, the significant values of all the variables are more than 0.05; therefore, assumption of normality of the data is accepted.

According to table 2, results of T test show that the means of variables are more than 3. Therefore, we can say with the confidence of 95 percent that all hypotheses are acceptable.

In order to rank the importance of the three variables, Friedman test was used. The mean rank of variables is shown in table 3.

Table 2: Results of one-sample T test

<table>
<thead>
<tr>
<th>variable</th>
<th>Sig</th>
<th>maximum</th>
<th>minimum</th>
<th>Mean</th>
<th>Result</th>
</tr>
</thead>
<tbody>
<tr>
<td>Communication</td>
<td>0.000</td>
<td>4.2602</td>
<td>4.1961</td>
<td>4.2281</td>
<td>H0 Rejected</td>
</tr>
<tr>
<td>Data collection</td>
<td>0.000</td>
<td>3.8906</td>
<td>3.8453</td>
<td>3.8001</td>
<td>H0 Rejected</td>
</tr>
<tr>
<td>product</td>
<td>0.000</td>
<td>4.3012</td>
<td>4.2436</td>
<td>4.2723</td>
<td>H0 Rejected</td>
</tr>
<tr>
<td>Distribution</td>
<td>0.000</td>
<td>4.3727</td>
<td>4.2987</td>
<td>4.3357</td>
<td>H0 Rejected</td>
</tr>
<tr>
<td>Price</td>
<td>0.000</td>
<td>4.2390</td>
<td>4.1538</td>
<td>4.1964</td>
<td>H0 Rejected</td>
</tr>
<tr>
<td>Brand</td>
<td>0.000</td>
<td>3.9739</td>
<td>3.8755</td>
<td>3.9247</td>
<td>H0 Rejected</td>
</tr>
</tbody>
</table>

Table 3: Results of the Friedman test

<table>
<thead>
<tr>
<th>The question</th>
<th>Mean Rank</th>
<th>Rank</th>
</tr>
</thead>
<tbody>
<tr>
<td>Is there significant relationship between distribution and willingness of customers to buy online?</td>
<td>4.38</td>
<td>1</td>
</tr>
<tr>
<td>Is there significant relationship between product and willingness of customers to buy online?</td>
<td>4.08</td>
<td>2</td>
</tr>
</tbody>
</table>
Is there significant relationship between communication and willingness of customers to buy online? | 3.82 | 3
Is there significant relationship between price and willingness of customers to buy online? | 3.80 | 4
Is there significant relationship between brand and willingness of customers to buy online? | 2.48 | 5
Is there significant relationship between data collection and willingness of customers to buy online? | 2.43 | 6

So according to table 2, we conclude that distribution have the highest priority on willingness of customers to buy online, followed by product, communication, price, brand and data collection.

Conclusion
The results of testing the first hypothesis showed that variable of communication which consists of site design, easy access, entertaining and attractiveness, awareness and easy buying has a significant impact on willingness of customers to buy online.

The results of testing the second hypothesis showed that variable of information collection which consists of previous experience of customer, privacy rules and access to the required information has a significant impact on willingness of customers to buy online.

The results of testing the third hypothesis showed that variable of product which consists of product customization, brand, appearance features, quality assurance, after sales service and satisfactory of product delivery has a significant impact on willingness of customers to buy online.

The results of testing the fourth hypothesis showed that variable of distribution which consists of transportation, physical interface and electronic interface has a significant impact on willingness of customers to buy online.

The results of testing the fifth hypothesis showed that variable of price which consists of availability of prices, ability to compare prices and price discounts has a significant impact on willingness of customers to buy online.

The results of testing the sixth hypothesis showed that variable of brand which consists of Loyalty and Commitment, Geometrical shape, harmonic colors and being Significant has a significant impact on willingness of customers to buy online.

Suggestions
- Considering that distribution element has the highest priority among other electronic marketing mix elements to create a desire to online shopping in the customer's mind, it is suggested that necessary measures are conducted to speed up transportation, such as rapid response system for sending online products or establishing representative offices in various cities.
- Making product customization possible, employing experienced staff to support, providing after-sales services, designing quality product and creating confidence in the minds of customers will be other effective measures.
- Putting play facilities, and any other factors to entertain visitors in the site and creating features to facilitate the process of buying via internet.
- Comparison prices feature is one of the factors affecting the willingness of customers to buy online; hence, making this possible and providing timely update prices are effective factors creating a desire to purchase in the customer's mind.
- Quality of products can be increased by employing professional staff and qualified suppliers in order to cement brand loyalty and commitment.
Since previous experience of online shopping has a dramatic effect on encouraging customers to return to the site, customer's reliability can be increased through existence of privacy and personal information laws.

Reference