

A Study on The Effectiveness of Search Engines in E-Marketing*

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Abstract

E-marketing plays a major role in the globalised environment, as it contributes to the economic growth and ease of trading. Considering marketing as an economic engine to drive global development, this research seeks to understand the practices and activities of electronic marketing, marketing performance and the effectiveness of search engines. In order to do this a comparative study is made between various search engines. The research also highlights the techniques of measuring e-marketing performance. The main aim of this work is to identify links between the conceptual framework and empirical analysis in the field of e-business, in particular, e-marketing because they appear to be highly integrated, and if reviewed separately may present distorted results. A purposive sampling approach was used. Quantitative data was collected through structured questionnaires for testing hypotheses and address the research objectives.

Keywords/ Phrases: E-marketing, Search Engines, Consumer Perceptions.

1. Introduction

Contemporary business strategies employ E-marketing techniques to promote the product lines by creating websites with blogging software and invoking them from the main sales site. Agencies like Google, Yahoo and affiliate programs such as Amazon, eBay and Commission Junction help business agencies to promote their products through web based technologies. E-marketing (Electronic marketing) is a modern business practice associated with trading of goods and services through internet and other electronic means.

According to Strauss and Frost (2001) E-marketing is defined as: "The use of electronic data and applications for planning and executing the conception, distribution and pricing of ideas, goods and services to create exchanges that satisfy individual and organizational objectives". E-marketing techniques should be efficient in mining the customer and also exchange the information between the customer and the organization taking into consideration the factors such as speed, accuracy, security etc. This paper deals with impact and analysis on marketing performance and effectiveness in the E-business.

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1.1. The problem

Consumers are increasingly using internet for their marketing activities. Marketers use e-marketing as an effective tool to reach potential customers and thereby receive instantaneous results. It is to be noted that consumer behavior is a significant factor in every form of marketing. In this context it is essential to study the relationship between the-marketing performance and e-marketing strategies and also know the effect of e-marketing on all the-marketing activities of the business. Hence the research problem is to find the impact of marketing performance and effectiveness of E-marketing strategies.

1.2. Objectives

The objectives of the study are,

- 1) To analyze the relationship of e-marketing with marketing performance;
- 2) To analyze the consumer perceptions towards various search engines; and
- 3) To suggest strategies to organizations in improving their e-marketing activities.

1.3. Hypotheses

In view of the literature review and the previous discussion on E-marketing strategies, the following hypotheses have been constructed. The study comprises of conceptual and empirical work to test these hypotheses.

Following are the hypotheses statements:

H1: E-marketing could give marketers access to large number of consumers

H2: There are significant differences among users of different search engines towards e-marketing.

1.4. Limitations of Research

A number of constraints served as limitations in this study. These included the sample size, access to computers and homogeneity of subjects. The use of purposive sampling method and homogeneous structure of the sample made the obtained results difficult to generalize to a larger population. The research work is limited to few Internet users.

2. Review of Literature

Philip Kotler, in his early books, defines marketing as an activity to achieve specific goals. In his own words "Marketing is human activity directed at satisfying needs and wants through exchange processes" (Kotler, 2006). This definition is very well respected among the-marketing scholars but it does not make the idea of marketing simpler. A self explanatory and more descriptive definition of marketing has given at cfdccariboo.com; they recognize-marketing as the process of planning and executing the conception, pricing, promotion and distribution of ideas, goods and services to satisfy customers. (cfdccariboo.com/glossary.htm). This definition enlightens marketing in a simple manner and the activities like planning and promotion is brought into the domain of marketing and emphasis on the customer satisfaction. Marketing practitioners and academics have devoted considerable effort in studying Business – to – Business (B2B) e-marketing. Although there are a wide range of researches conducted on B2B [Hoffman et al. (1999), Hoffman and Novak (1996), Porter (2001) ...], but there is a very few number of researches on B2B in Small Business Enterprise's, one of it had been conducted by Ng (2005) to develop a preliminary framework to select B2B e-business models.

Day (1990) argues that the firms' survival depends on its capacity and that value is defined by customers. The value should be measured to understand the-marketing performance and success factors. Kokkinaki & Ambler (1999) outline six categories for marketing performance and success measures. They are

- Financial measures
- Competitive market measures
- Consumer Behavior measures
- Consumer Intermediate measures
- Direct Customer measures and
- Innovative measures

3. Methodology

Primary and secondary data are collected for the purpose of the study. Primary data is collected through questionnaire and interviews to address the various

levels of study. The questions were appropriate and easy for the respondent to answer based on the general principle of having a structured methodology, strategy and techniques employed. A descriptive design was adopted to describe the attitudes, opinions and views of internet users.

3.1. Sampling design

The target population was identified as all the internet users of Bangalore city. Unit of investigation was identified as all the internet users who visit browsing centers in Bangalore city. As no comprehensive sampling frame of the population was available, samples for the study were chosen by using systematic random sampling due to time and cost feasibility. Every fifth customer entering or leaving browsing centers was selected as

a sample respondent. The data was collected from 100 internet users across browsing centers.

4. Analysis and Interpretations

4.1. Most Widely Used Search Engine

The findings point out that the most widely used search engine is Google (53%), followed by Yahoo (28%), MSN (16%) and others (3%). The study further crystallized the demographic groups to identify the most widely used search engines by different groups. The chi-square results show no significant differences among the age, gender and income groups' which goes to show across all the groups the preference for search engine remains uniform. Google is the most widely used search engine across all the demographic groups.

Preferences	AGE					Total
	Less than 18	18-25 years	25 to 35 years	35 to 45 years	45+	
Google	12	22	12	5	2	53
Yahoo	4	13	7	4	0	28
MSN	6	7	3	0	0	16
Others	1	2	0	0	0	3
Total	23	44	22	9	2	100

Table 1 Preference of Search Engines Across Age Groups

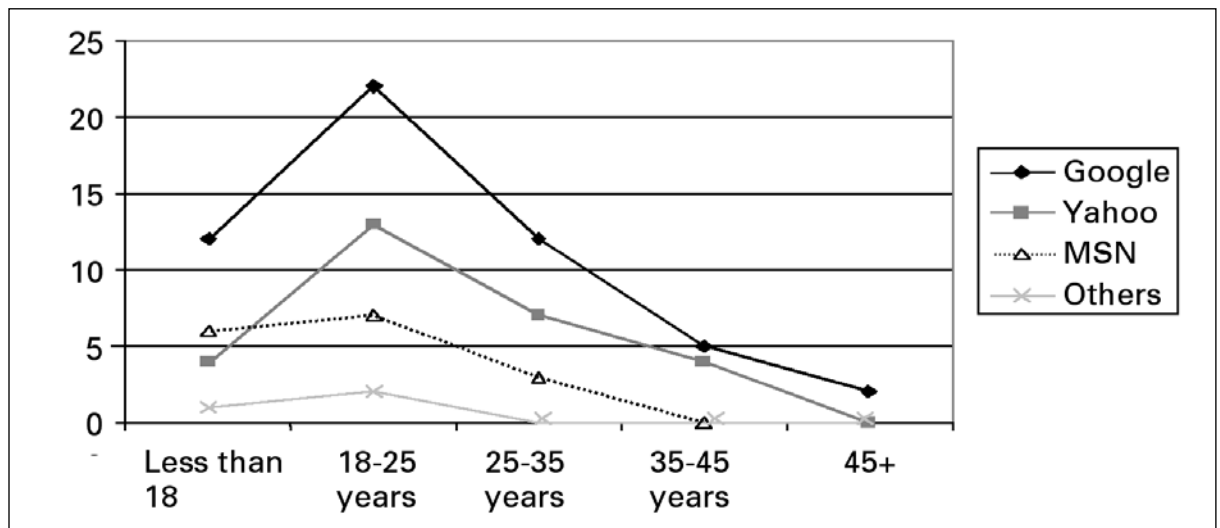


Figure 1 Preference of Search Engines Across Age Groups

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	8.217(a)	12	.768
Likelihood Ratio	11.064	12	.523
Linear-by-Linear Association	2.847	1	.092

Table 2 Chi-Square Tests

Preferences	GENDER		Total
	Male	Female	
Google	31	22	53
Yahoo	15	13	28
MSN	5	11	16
Others	0	3	3
Total	51	49	100

Table 3 Preferences of Search Engines Across Gender

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	6.884(a)	3	.076
Likelihood Ratio	8.104	3	.044
Linear-by-Linear Association	5.762	1	.016

Table 4 Chi-Square Tests

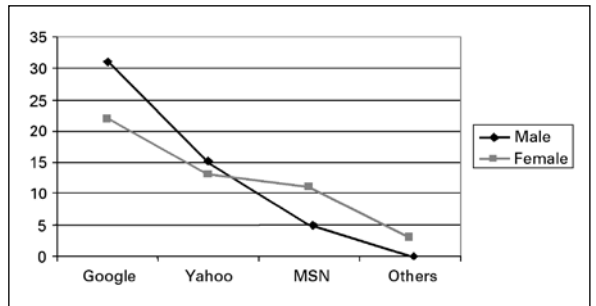


Figure 2 Preferences of Search Engines Across Gender

Preferences	INCOME				Total
	Less than 10000/month	10000-15000/month	15000 to 20000/month	Above 20000/month	
Google	8	20	8	17	53
Yahoo	7	6	3	12	28
MSN	3	6	1	6	16
Others	1	1	1	0	3
Total	19	33	13	35	100

Table 5 Preferences of Search Engines Across Income Groups

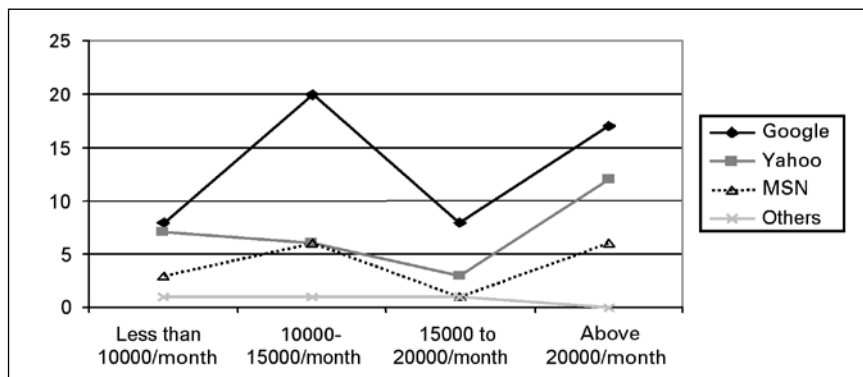


Figure 3 Preferences of Search Engines Across Income Groups

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	6.384(a)	9	.701
Likelihood Ratio	7.312	9	.605
Linear-by-Linear Association	.183	1	.669

Table 6 Chi-Square Tests

4.2. Reach across different brands

The table-7 shows the users perception towards e-marketing. 78% of the respondents feel that e-marketing is effective in reaching many people. Again the chi-square results show that there is no significant difference among different search engine users and there is uniformity in their opinion towards reach of e-marketing business.

	Google	Yahoo	MSN	Others	Total
Reaches Many	41	21	14	2	78
Reaches few	12	7	2	1	22
Total	53	28	16	3	100

Table 7 Reach Across Different Brands

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	1.226(a)	3	.747
Likelihood Ratio	1.315	3	.726
Linear-by-Linear Association	.113	1	.737

Table 8 Chi-Square Tests

4.3. Awareness of e-marketing business among consumers

64% of the respondents claim that they understand the e-marketing business, while 27% of them admit that they do not understand the process of e-marketing business while 9% of them are not clear. The chi-square results show that there is no significant difference among different search engine users and there is uniformity in their opinion towards awareness of e-marketing business.

	Google	Yahoo	MSN	Others	Total
Understand the business	39	16	8	1	64
Doesn't understand	9	10	7	1	27
Can't say	5	2	1	1	9
Total	53	28	16	3	100

Table 9 Awareness Across Different Brands

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	8.589(a)	6	.198
Likelihood Ratio	7.866	6	.248
Linear-by-Linear Association	3.211	1	.073

Table 10 Chi-Square Tests

4.4. E-marketing as a tool to build relationship with the consumers

74% of the respondents claim that e-marketing is a tool which helps build relationship with the customers, while 12% opined otherwise and 14% of them are not clear. The chi-square results show significant differences among different search engine users with regards to their opinion towards e-marketing as a tool to build relationship with the customers. From table 11 it is clear that users of Google strongly feel that e-marketing is an important tool to build relationship with customers whilst users of Yahoo hold different opinion and opine that e-marketing doesn't help build relationship with customers.

	Google	Yahoo	MSN	Others	Total
Helps marketers build relationship	50	10	12	2	74
Doesn't	3	15	3	0	21
Can't say	0	3	1	1	5
Total	53	28	16	3	100

Table 11 E-marketing as a Tool to Build Relationship with the Consumers

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	6.199(a)	6	.045
Likelihood Ratio	6.539	6	.366
Linear-by-Linear Association	.043	1	.837

Table 12 Chi-Square Tests

4.5. Conversion of search visits to sales

One more important aspect of the study was to find the impact of sales. 54 % of the respondents say that search visits actually convert to sales. 46% of the respondents say that search visits don't convert to sales. Most of the Google users say that search visits are converted to sales (42 out of 53). Users of yahoo and MSN say their search visits are not converted to sales. These differences are confirmed by chi-square results which show significant differences at .05 levels of confidence.

	Google	Yahoo	MSN	Others	Total
Search visits convert to sales	42	10	2	0	54
Search visits not convert to sales	11	18	14	3	46
Total	53	28	16	3	100

Table 13 Conversion of Search Visits to Sales

	Value	df	Asymp. Sig. (2-sided)
Pearson Chi-Square	15.350(a)	3	.002
Likelihood Ratio	17.457	3	.001
Linear-by-Linear Association	15.063	1	.000

Table 14 Chi-Square Tests

5.0. Conclusions and Recommendations

This research strongly supports the value of e-marketing. The findings of research prove that e-marketing is effective and fast method to access large number of

potential consumers. The fast based progress brings in great scope of opportunities of marketers to increase the audience through wider market access. The constantly changing market conditions which are based on technology helps us in discovering interesting facts about consumer behavior as well as approach of the marketers. It could be found that the customer activity as listed below would enable the marketer to formulate his strategies.

The findings point out that the most widely used search engine is Google (53%) followed by Yahoo (28%). The study further crystallized the demographic groups to identify the most widely used search engines by different groups. The chi-square results do not show significant differences among the age, gender and income groups' which goes to show across all the groups the preference for search engine remains uniform.

Majority of the respondents (78%) feel that e-marketing is effective in reaching many people. The chi-square results show that there is no significant difference among different search engine users and there is uniformity in their opinion towards reach of e-marketing business.

Majority of the respondents (64%) claim that they understand the e-marketing business; the chi-square results show that there is no significant difference among different search engine users and there is uniformity in their opinion towards awareness of e-marketing business.

Majority of the respondents (74%) claim that e-marketing is a tool which helps build relationship with the customers. The chi-square results show significant differences among different search engine users with regards to their opinion towards e-marketing as a tool to build relationship with the customers. The study revealed that users of Google strongly feel that e-marketing is an important tool to build relationship with customers whilst users of Yahoo hold different opinion and opine that e-marketing doesn't help build relationship with customers.

One more important aspect of the study was to find the impact of sales. Good number of respondents (54%) agreed that the search visits actually convert to sales.

However, the following steps could be taken by marketers to improve the-marketing strategies thereby creating impact and enhancing the-marketing performance:

- 1) Converting browsers to prospective "buyers"
- 2) Strategies have to be formulated so as to catch the eyes of the beholder.
- 3) When a browser is online it is very essential for the organization to see that he is converted as a regular visitor of the website and thereby converting him as a prospective buyer.
- 4) Quality of Service is one of the attributes and that plays a significant role in positioning in consumers mind. There should be a strong human resource and software assistant, for answering the queries of the customers, dispatching goods and follow-up.
- 5) Online catalogues to fully transactional sites from the basic brochures and all other necessary information must be extended offering full support to the customers from acquisition, retention, and all other stages of the buying process. The mechanism should be very sophisticated in offering online services to both prospects and customers.

- 6) The users of Internet are skeptical in using e-marketing services, basically due to fraud by unauthorized group. To eliminate such fraud the industries should provide a strong security network with firewall and password protection.

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