

Utilization of Internet Facilities In Botswana An Empirical Investigation

S. K. Massimo, Paul T. Mburu and Kiio Mutua
Department of Marketing, University of Botswana, South Africa

Abstract: The rapid growth of Internet access in Africa has largely been confined to the capital cities of African nations with 16 countries having POPs in about 100 cities and towns. We are living in the information age, the "third" industrial revolution. Information technology is changing the nature of work; providing new opportunities to serve customers even better (Quinn & Humble 1993). However this revolution is slow in coming to the African nations, as the case was with the second industrial revolution. As much as the African countries would like to venture in to e-commerce, the ultimate traders will be the individual entrepreneurs, who will have to seize the opportunities provided by the Internet. For entrepreneurs to seize the opportunities offered by the Internet, they have to be aware of its existence and have knowledge that facilitates its usage. Thus the information technology cannot be divorced from the human element since its advancement will be dictated by cultural and demographic factors of the market (Mosime 2000).

The study aimed at determining the level of Internet awareness in Botswana, determine customer level of satisfaction towards the services and pricing of Internet services and customer expectation of quality in the selection of Internet service providers and Internet cafes, especially in Gaborone (capital city) by using statistically accepted methods of surveying and making recommendations aimed at benefiting the prospective and business community, policy makers and the population as whole. The respondents included office employees, housewives, management, blue color workers and secondary school students. The finding indicates that the frequency of Internet access was done on weekly basis by the biggest percentage rather than on a daily. More than 60% of the respondent was aware of Internet presence although active users were about 33%. The number of telephone lines compared to the population of Botswana indicates a connectivity ratio of 1: 6, which is among the highest in Africa. Given the current level of awareness and sufficient support and motivation, the country could carry out lucrative business activities by utilizing the available facilities.

Keywords: Internet Marketing, Internet Facilities, Cultural and Demographic Factors

Introduction

Information technology is one of the fastest growing industries in the world. Recent developments in this industry have been revolutionary. Information technology in the developed world has invaded every aspect of human life; kids in kindergarten to old grannies in old age homes have access to information at their fingertips. We are living in the third industrial revolution and Information technology is changing the nature of work, providing opportunities to serve customers even better (Quinn & Humble 1996).

Despite the rapid growth of Internet access in Africa usage has been largely confined to the capital cities, although a growing number of countries do have points of presence (POPs) in some of the secondary towns (currently 16 countries - Algeria, Angola, Botswana, DRC, Egypt, Ghana, Kenya, Madagascar, Morocco, Mozambique, Namibia, Nigeria, Tanzania, Tunisia, Zambia and Zimbabwe), and South Africa has POPs in about 100 cities and towns.

Boitner (Boitner 2000) suggests that the modern marketplace interaction is defined as a virtual realm where products and services exist as digital information and can be delivered through information based channels. A similar study conducted in Zimbabwe indicated that, on-line products are needed by large development organizations, international organizations, some companies, universities, and research institutions. Off-line e-mail is sufficient for small development organizations, companies and government institutions. (S Wabeek, 1999).

According to Mathew (Mathew 1999), the advent of information technology and electronic commerce has completely revolutionized the competitive business environment, with sales transactions conducted over the web ranging from US\$ 2 - 10 billion for the year 1997 and anticipated to exceed US\$ 300 billion by the year 2002

What is the "Internet"?

Increasingly, the "Internet" is best understood as a generic term, like the postal system or the telephone system. If one has a postal address anywhere in the world and the local postal service is working, he/she can receive mail, which also applies to a telephone line. Having a computer, a telephone, a device for connecting them (generally a modem), the appropriate software, and a service provider, one can get "on the Internet."

A connection may go through many intermediaries, just as a letter or a phone call and its quality and speed depends largely on the efficiency of the local service. Whichever way one gets connected, the fundamental idea remains the same: i.e. computers in different places exchanging messages with each other. A computer with an internet connection can be used to send a note to a friend and can also serve as the equivalent of an instant printing press or an open-access library.

The "core" Internet is made up of computers (service providers, or host computers) that are "on-line" 24 hours a day (except for maintenance "down-time"), ready to receive or send out messages at any time. Service providers may range from large commercial services (America Online) to universities or government agencies to small commercial companies or non-profit agencies.

The internet has become a powerful feature in the information arena, since its inception in the last quarter of the 20th century. It was initially restricted to government contractors and major universities. In the 1990s the content and use of the internet has expanded to include mundane subjects covered in business, education, government, entertainment and a host of other areas. Opening the internet to common usage literally opened the floodgates to what has come to be known as the 'information super highway'. Currently there is virtually no subject that cannot be found on the internet in one form or another.

Growth of Internet in Africa: The Internet has grown rapidly on the continent over the last few years. When considering global connectivity two issues come to the fore; in developing countries the question of universal access and in developed countries the question of content regulation. At the end of 1996 only 11 countries in Africa had internet access, but by September 2000, all 54 countries and territories had achieved permanent connectivity. Liberia, however, currently has no local Internet services (Liberia was connected 1999, but lost its link when the ISP failed to achieve commercial viability).

The total number of computers permanently connected to the internet in Africa (excluding South Africa) finally broke the 10,000 mark at the beginning of 1999 and in Jan 2000 it stood at almost 12,000, an increase of 20% as measured by Network Wizards.

It is difficult to measure actual numbers of internet users, but figures for the number of dialup subscriber accounts to ISPs are more readily available, for which it is estimated that there are now over 1 million subscribers in Africa. Of these, North Africa is responsible for about 200,000 and South Africa for 650,000, leaving about 150,000 for the remaining 50 African countries.

There is also a rapidly growing interest in *kiosks*, cyber cafes and other forms of public internet access, such as adding PCs to community phone-shops, schools, police stations and clinics that can share the cost of equipment and access amongst a larger number of users. Many existing 'phone shops' are now adding internet access to their services, even in remote towns where it is a long-distance call to the nearest dialup access point. In addition a growing number of hotels and business centers provide a PC with Internet access.

There have been few attempts to establish email-to-fax gateways in Africa despite the apparent need, given the low penetration of the internet. Currently the co-operative project known as the "Experiment in Remote Printing only" has two African countries among the 27 in its coverage list viz South Africa and Botswana. Likewise, none of the commercial services have local delivery facilities outside of South Africa.

Evidence gathered by E C A (Economic Commission for Africa) suggests the average level of internet use in Africa is about one incoming and one outgoing e-mail per day, averaging 3 to 4 pages, in communications that are most often with people outside the continent. Surveys indicated that about 25 percent of the e-mail is replacing faxes, while 10 percent are replacing phone calls and the other 65 percent are communications that would not have been made in the absence of an e-mail system.

Botswana - A General Overview of the Country: The population of Botswana is around 1.6 million people.

About 80% of the population live at subsistence or near subsistence level by either raising cattle, growing crops such as maize, sorghum, or by hunting. The country's population growth rate is currently at 3.4% per annum which is an increase compared to 1971 when was growing at 3.1% per annum.

The overall population density is about 2 persons per square kilometer. Population distribution is skewed, whereby the western part of the country is very thinly populated with an average of 0.14 persons per square kilometer while the eastern part of the country, east of the railway line, has high population concentration.

The capital city Gaborone has a population of approximately 133,468 thousand people according to the (Central Statistics Office 1997) 1991 census figures.

At independence 30 years ago, Botswana was rated as one of the poorest countries in Africa. Most of the rural population depended on agriculture for their livelihood. Beef production was the mainstay of the economy in terms of output and export earnings (NDP 6 1985). After the discovery and development of diamond mining, the country has progressed to its present status of being one of the richest in Africa. Botswana became one of the largest diamond producers in the world after opening the Jwaneng mines in 1980 with three of its urban centers being mining towns. (Barclays Bank of Botswana Limited 1985)

Internet Market in Botswana: The first Internet companies to be established in Botswana were in early 1997. Abacus in association with Global Internet Access and Information Botswana Internet Services (IBIS) were the first Internet companies. Abacus had servers in Gaborone and Selebi Phikwe with plans to include Francistown at a later stage.

The Global Group Company had access points through out South Africa and is one of the larger companies in this field with ultimate shareholding company Bayobab listed on the Johannesburg Stock Exchange. (JSE)

IBIS had a server in Gaborone. It entered into a business partnership with Northern computers to establish a Point of Presence (POP) in Francis town. It enabled clients in that town to have local Internet access.

IBIS are currently operating with a 64k access via the Botswana Telecommunication Corporation (BTC).

When it was started in Botswana IBIS (Information Botswana Internet Services) planned to establish POPs throughout the country specifically Maun and Selebi Phikwe. It offered its clients its own email at Info.bw. Towards the end of 1999 Global access and IBIS merged to form another company known as USKO Botswana. Usko Botswana has opened Points of Presence in Kasane, Serowe, Mahalapye and other major towns in Botswana. In addition there are several other internet companies.

Almost all the internet service providers in Botswana offer internet services such as dial in internet and e-mail access, corporate access, domain registration, web design, hosting and advertising.

Justification of the Study: Given the importance of high-tech industries in the contemporary societies it is natural for marketing scholars and practitioners to seek to understand how the market served by these industries are different in terms of being technology intensive (Buzzell, 1999). Marketing in the 21st century goes beyond just selling to customers, to the networking between various organizations within and outside the

company (Kotler 1999).

Assumptions and Hypotheses: The following are some of the implicit and explicit assumptions of the report;

- Internet in Botswana is mostly used for e-mail and news and not for business purposes.
- There is under utilization of available facilities and capacity in the country.
- The awareness and connectivity of the above is very limited thus the value invested in the people's perception is very low.
- That the awareness of internet can be measured using various factors such as usage of internet, perceived value of internet and frequency of use

We endeavor to prove or disapprove the following hypothesis:

- The level of Internet awareness is very low as compared to other sub-Saharan countries in Africa. This has been as a result of ineffective marketing of the services by the ISPs and ICs, lack of general educational on internet usage and functions, lack of motivation and availability of role models of successful businesspeople by use of internet.
- E-commerce is very much underdeveloped in Botswana as compared to other African countries despite the development and advancement of communication in the country. Given the available infrastructures, education and awareness, Botswana can do business successfully and competitively with other country in the region and the world.
- The marketing of Internet services and companies is very poor, which has led to the low utilization of facilities especially by the business sector but with needed exposure and the motivation the country could do competitive Internet business.
- Botswana has adequate infrastructures to facilitate constructive and profitable business but these are currently being underutilized.

Materials and Methods

A survey is a way of obtaining self reported information about the attitudes, beliefs, opinions, behaviors or other characteristics of a population (Buddie 1973, Rosenfield, Edwards and Thomas 1995). Explorative research was carried out covering both citizen and non-citizens in Gaborone city since its population represents the overall internet usage picture in the country having the highest density of internet service providers and cafes and the highest connectivity rate.

To get the best representation the researchers decided to take a trans walk across the city testing the awareness of the internet. They interviewed 300 persons of which 50% were front office employees. Of this figure a third did not have any idea about internet. The other 150 were from various walks of life such as housewives, management, blue color workers and secondary school students.

Those who cited awareness were given the questionnaires to complete and the respondent were as shown in Table 1.

A total of 120 questionnaires were issued over a one and half month period. The intended sample size was as indicated below which included students from the University of Botswana and secondary schools, clerical staff in the market, management and others from various professions, as access to Internet is not limited

to a given segment of the population.

Table 1: Percentage of Awareness

Occupation	Target number	Respondents	%
Student	40	47	117.5
Clerical	15	7	46.6
Management	25	18	60
Professional	40	36	90
Blank	0	0	
Total	120	109	(9.16)

Instrument of Data Collection: The principal data collection instrument was the questionnaire. The design and the structure of the questionnaire was made in such a manner as to elicit as much information as possible. It was a two- paged questionnaire entitled 'Internet Survey Questionnaire'. While subjects were encouraged to complete the questionnaire they had the option not to. A pre-test of the questionnaire was done on a few individuals and the final draft drawn.

Data Analysis Procedures: The data was analyzed using a number of data analysis methods relevant to a multi-variate nature of this study. Histograms, Pie charts, Tables and Graphs were used in the analysis of data. In addition correlation and regression was used.

Objectives

The objectives of the study were as follows;

The Primary objective of the study was to determine the level of Internet awareness in Botswana especially in Gaborone and the extent of usage for business purposes, by using statistically accepted methods of surveying and making recommendations aimed at benefiting the prospective and business community, policy makers and the population as whole.

The Secondary objectives of the study were three fold;

- a) To determine the main uses and the frequency of usage of internet in the country in a bid to confirm the extent to which it was being used as a business tool and/or leisure.
- b) To determine customer level of satisfaction towards the services and pricing of internet services. This enabled us to determine the number of service providers their marketing effectiveness and the effect on the usage of the internet for the business.
- c) To determine customers expectation of quality in the selection of internet service providers and internet cafes thus enabling the internet providers with the insight on how they could improve the awareness of the internet, educate the customers; thereby enhancing the business opportunities in the continent.

Findings and Analyses

Frequency of Use: The research findings indicated that 35. 8% of the respondents used the Internet on a daily basis while the biggest percentage 43.0 % used the Internet weekly. This shows that most of the respondents were using it for the purposes of e-mail and news (all Botswana newspapers are weekly apart from the free daily government publication). The fact that the people use the internet weekly could also infer the low level of internet awareness, the low usage and the limited facilities available at their disposal.(Fig. 1).

The biggest number of respondents who accessed the Internet daily was the professional followed by the student's management and the clerical staff.

On the other hand students were the biggest users of the Internet on a weekly basis. Clerical staff had the lowest rate of Internet access.

University graduates topped the list of respondents in the internet use on daily and weekly basis followed by the technical/trade school graduates. The other notable users on the same basis were the high school graduates.

The Frequency of Use Demographically: Discounting the missing variables, which was 0.9 % of all respondents, 43.8% of the male and 40% of the female respondents, indicated that they use the internet on a daily and weekly basis respectively. 10.9% of male and 26.6% female respondents indicated that they rarely use the internet. (Fig. 2)

Greatest Advantage of the Internet: Information was cited as the greatest advantage of the internet, followed by communication via the e-mail. News, web advertising had lower ratings. None of the respondents noted banking, web shopping and selling as the greatest advantage, which indicates the low value of e-business in the country.

Information Tailoring to Suit the Local Needs: Most of the information available about companies and products in the various websites in Botswana is basically for the purposes of web advertising. Many of the websites have not been tailored to allow any online transactions to take place, apart from online banking.

Level of Internet Knowledge to the Population of Gaborone: Botswana has a population of approximately 1.6 million people, with a population of 133,468 living in Gaborone the capital city according to the 1991 census (Central Statistics Office 1997). The estimates for the year 2000 were 221,317 of which the ratio between men and women being 1.046 and 54.1% of the population in Gaborone below 19 years, while 7% are above 65 years. We took a random sample of 300 people at the trans walk stage comprising of 150 of the front office employees. A total number of 150 were from various walks of life such as housewives, management, blue color workers, university and high school students. Of the total sample about third of this figure (approx100) did not have any idea about the internet and therefore could not respond to the questionnaire. Of the remaining 200, 45% of the respondents were not willing to answer the questionnaire but the remaining 55% responded. The usage of e-mail was employed as an indicator of basic internet knowledge.

General Awareness by Gender and Demographics: The research findings indicated that male were more internet aware than the female.

While most men used the internet for news, e-mail and news, e-mail, news and research, women generally used the internet for purposes of e-mail. (Fig. 3)

General Awareness as Compared to the Use: The most commonly cited usage of internet was the combination of "email and news" followed by "email, news and research" with the citizens being less aware than the non-citizens.

On the other hand the university graduates had the highest awareness rate. This could be attributed to the fact that facilities are available within the university campus and also due to the fact that it is compulsory to attend computer classes for most of the programs.

The reasons cited for the lack of internet awareness among the clerical and junior staff members include lack of facilities and restrictions imposed by the management.

In most companies, the computers connected with internet were in the bosses' offices, which hindered other staff members from gaining access and utilizing the facilities.

General Awareness of the ISP and IC in Gaborone by Gender and Demographics: Total 56% of the respondents were between the ages of 20-29 years and they were the most frequent visitors to the ISP/ICs. 35% of these were aware of Interswana as an internet service provider and/or as an internet café. Interswana received the highest awareness rate followed by the University of Botswana.

The age group that followed was between 30-39 years who were 25 % of the total respondents, 50% of them were aware of Interswana. The age group 40-49 years had the least awareness while there were no respondents in the age group of 50 years and above.

Based on one's educational level the groups most aware of ISP/ICs in Gaborone were the university graduates. The most known provider among university graduates was Interswana followed by Bosnet and Romela (being an IC). The same trend was prevalent even among the technical/ training graduates and the high school graduates. This can lead us to safely conclude that Interswana has the most effective marketing programs both as a service provider and as an internet cafe in Gaborone.

37.2% of total the respondents were not aware of any other alternative internet service providers and cafes other than where they get the services.

General Awareness of the ISP and IC in Gaborone Awareness as Compared to the Usage: Of the number that completed the questionnaire 99.9% used the internet for e-mail while 46.5% used it for news and other purposes (only 2 persons used it for news only). The most common use of the internet was for e-mail and the least was for shopping followed by banking and selling.

Relationship Between the Purpose of Use and the Country of Origin: The partial correlation analysis between the purpose of use and nationality indicated 0.883, which indicates that there is a significant relationship between the purpose for which they use the internet and the country of origin.

Table 2: Correlations Between Purpose of Use and the Country of Origin

		Purpose	Nationality
Purpose	Pearson correlation	1.000	.015
	Sig. (2-tailed) N	.109	.883
Nationality	Pearson correlation	.015	1.000
	Sig. (2-tailed) N	.883	.102
		102	

35% of the total respondents were citizens and the remaining 65% were non-citizens, which indicated that, the non-citizens make more use of the internet than the citizens. The above was done with a 95% confidence level allowing a 5% margin of error.

Quality of Service Provided Compared With the Pricing Satisfaction Rate: Out of the 109 respondents 87 of them rated pricing as important/very important and could determine the quality of service provided and dictate where the services were bought. The variables were ranked from 1-4, w "1" indicating the most satisfied

Massimo et al.: Utilization of Internet Facilities in Botswana

and "4" indicating the least satisfied. The total satisfaction average mean was calculated using statistical analysis tools found to be 1.92-satisfaction level, which falls more on "some what satisfied." than "very satisfied".

Downloading Speed: Most of the customers rated down loading speed as very important as depicted in Pie Chart. (Fig. 4)

Among the factors that consumers considered important in an ISP/ IC, downloading speed was mentioned as the most important factor followed by training and installation. Reputation was least important of the factors listed. Knowledgeable personnel was rated as very important by about 70% of the respondents. This may indicate the level of internet awareness in the country.(Table 3)

Satisfaction of Service / Assistance Compared to the Purpose: Customers visiting the ISPs and ICs had some expectation on the customer services that they were to receive. However this varied from customer to customer. Our assumption was that, most customers who are not familiar with the working of internet would value customer service more importantly than the ones who can maneuver their way through the internet. The research findings indicated that 76 out of the 95 respondents stated that they valued customer service as very important, 18 as important while only 1 did not consider customer service as important. Thus it can be inferred that most customers who visited the ICs were not very familiar with the working of internet.

Satisfaction as Compared With the Problems Encountered: The number of visits and the popularity of the ISPs and the ICs are subject to the problems encountered on the process of getting a service and the satisfaction one derives from the services rendered. But from our analyses it indicated otherwise. We checked the relationship between the problems encountered and the satisfaction rate using correlation and the results were as shown in Table 4. From the correlation bellow there was an insignificant relationship between the problems encountered and the usage of internet cafés and Internet service providers.

Cost of Internet Services in Botswana as Compared to Other Countries: The cost of accessing internet in Botswana is far much higher in comparison to other countries. Internet access in most of the ICs in Gaborone

is charged at the rate of P10.00 per hour (app. \$2 per hour). The average monthly cost of internet subscription from the various ISPs is P 105.00 per month. (\$21.6) excluding the telephone charges. Hence the monthly subscription fee for internet services in Botswana is equivalent to a one-year's subscriptions in the USA. This is not taking into account the prohibitive price of buying a good computer in Botswana (P8, 000 eq.\$1,650.00). However Botswana has a lower cost of monthly internet service provision compared to Kenya (\$71.4 per month) and other African countries apart from South Africa.

Internet Costs as Compared to Other Communication Means: The cost of internet connection through a phone line is P 4.00 per hour, while that of a lease line is approximately P1, 700 per month. A telephone call within the city is charged at P 0.50 per three-minutes. Therefore a telephone call will be charged at P10.00 per hour in comparison to the P 4.00 per hour for an internet connection.

On the other hand the cost of sending a Telex is P 0.37 per word while that of sending a fax message is P 0.25 per minute. In comparison the per minute cost of internet connection through a phone line is P 0.066. From the above costing analysis, the internet is the cheapest means of communicating with anyone in the world.

Costs in Relation to the Purpose of Use: We analyzed the satisfaction rate as to compared to the cost and found that most of the internet users were satisfied with the pricing of internet services. The table below indicates there is a strong relationship between the purpose of use and pricing.

Table 5: Comparison of Cost Satisfaction Rate in Relation to the Purpose of Use

		Pricing satisfaction Rate	Purpose
Pricing satisfaction rate	Pearson correlation	1.000	.042
	Sig. (2-tailed)N	.89	.695
Purpose			89
	Pearson correlation	.042	1.000
	Sig. (2-tailed) N	.695	.
		89	109

Internet As An Information Resource: Total 41% of the students considered internet as very informative, as against 35.8% of the professionals. Among the management and clerical staff 14.1 % and 8.9% respectively considered the internet as very informative.

Table 3: Factors Considered Important Among Users

	Rating for fast down loading speed %	Rating for friendly personnel %	Rating for knowledgeable personnel %	Rating for pricing %	Rating for location when selecting ISP/IC %	Rating for training and installation %	Rating for reputation %
Very Important	81.4	68.6	70.3	59.8	71.3	71.6	53.0
Important	15.7	28.4	23.8	34.3	19.8	26.5	41.0
Unimportant	2.9	2.9	5.9	5.9	8.9	2.0	6.0

Table 4: Correlation is significant at the 0.05 level (2 tailed)

		Encountered Problems when using internet	Rating of used ISP/IC
Encountered Problems when using internet	Pearson correlation	1.000	-.226*
	Sig. (2-tailed)	.	.024
	N	107	100
Rating of used ISP/IC	Pearson correlation	-.226*	1.000
	Sig. (2-tailed)	.024	.
	N	100	101

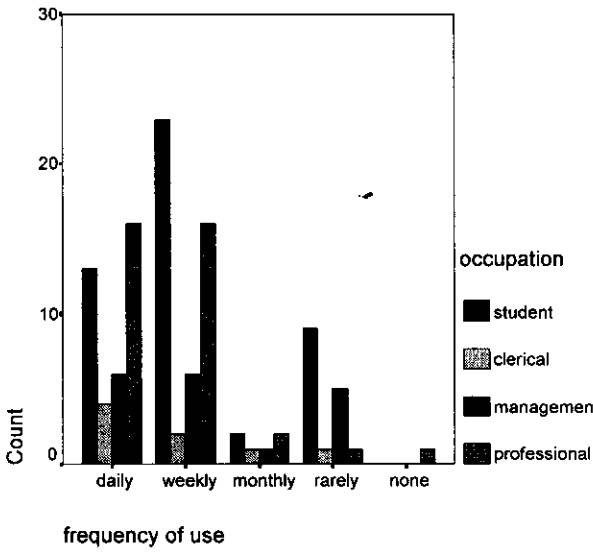


Fig. 1: Frequency of Use Based on Occupation and Educational Level

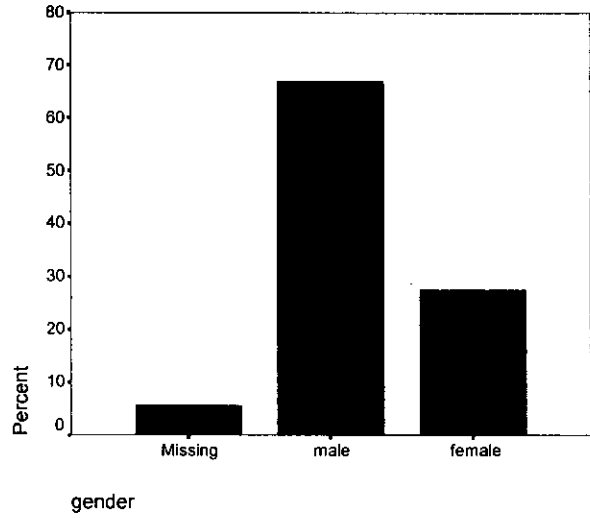


Fig. 3: General Awareness by Gender and Demographics

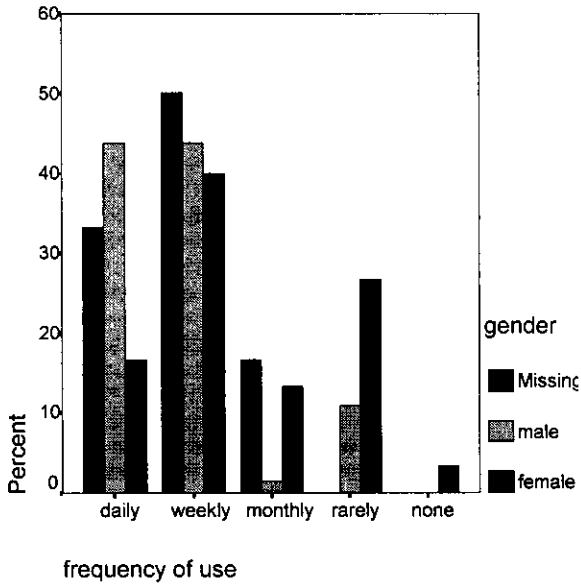


Fig. 2: The Frequency of Use Demographically

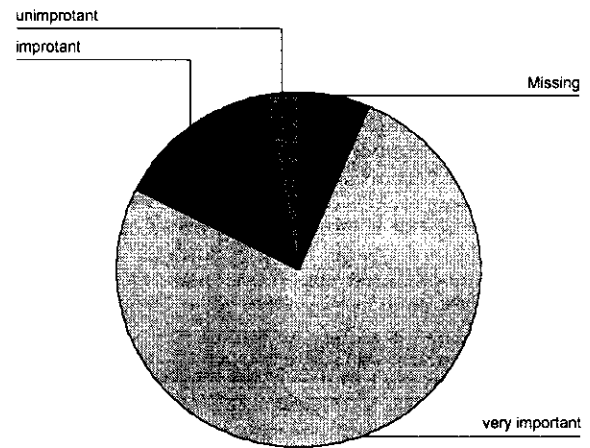


Fig. 4: Percentage of Downloading Speed

Discussion and conclusion

Botswana entrepreneurs ranked themselves and were ranked by the experts lowest in innovations and creativity. (Chinyoka 1998). This was evident in our research that the entrepreneurs have been slow in adopting the internet as a way of trading. The awareness, measured in terms of usage was limited to e-mail and news. An insignificant percentage ventured into shopping, banking and selling in the internet, which indicates the tendency of laggard behavior in the adoption.

In terms of perceived value of internet usage a big percentage indicated that they valued knowledgeable personnel, training and assistance. Thus it can be inferred that the ISP and IC users need assistance while accessing the internet which tended to diminish the level of awareness.

The frequency of use also indicated that internet access was done on weekly basis by the biggest percentage rather than on a daily. This could mean low awareness, resulting in a reduction of computer literacy bearing in mind that the level of knowledge in any other subject increases with the frequency of usage. Citizens used the internet less than the non citizens, this may have been due to the fact that most of the non citizens in the country are professionals and high flying executives who use the internet more for research, and communication than for business.

From the trans walk about a third of the sample size did not have any idea about internet while approximately 45% of the remaining respondents had an idea but had not utilised it either for e-mail or any other purposes. Their knowledge was limited to the existence of e-mail. The age group that had the highest awareness was between 20-29 years. In this age group most of the respondents are in colleges and at the university and they tend to use the internet more research than for business purposes.

This could be supported by the high number of users of internet for research compared to the low number of internet users for business purposes or related activities. The usage of the internet for the other age groups also indicated more usage for the purpose of e-mail and presumably personal mail more than business mail.

ISPs and ICs vend consumable services into the market. Comparing to the other marketers who compete for the same 'Pula' in the consumers' pockets, the promotion (in comparison to the cellular phone promotion) done by the internet providers and cafes has been insufficient taking into account that the product is relatively new in the country and in the market.

It is assumed from the consumer behaviour point of view, that customers will shop at the point where they are fully satisfied and where they are likely to have the least cognitive dissonance. With the limited number of internet services providers in Botswana, a single telecommunications corporation (a government subsidiary) that dictates the running of ISPs this could not apply much. However Interswana had the majority of the customers compared to other ISPs. This could be due to the superior marketing strategies utilized which includes free internet access services to the students' and non-governmental organisations dealing with community services and social works. The lack of publicity, education on the usage and the benefits

derived from the internet, lack of effective and rigorous advertising campaigns by the internet service providers could have contributed to the low usage in the country. There are several advantages that could be accrued from the use of the internet. The respondents were requested to indicate only one of the uses that they thought was the biggest advantage, of having the internet. The highest number of respondents indicated that information was the greatest advantage followed by the email.

Shopping, banking and selling had the lowest rating or no respondents. This could be attributed to some factor like:

- Either the persons did not have any knowledge of the above.
- They did not find it practical to do E- business in the country due to some factors like security of the credit/debit cards, logistics etc.
- The culture that is prevalent in most African countries of doing business the 'best way you know best' and that has served you well in the past thus not willing to adopt to the changing environment.
- The lack of trading points in the internet within the country other than the one outside the continent. For instance, most of the business web sites in the country are limited to window-shopping.

Our assumption that the internet was being utilized for the purposes of e-mail and news rather than for e-commerce was proved correct. What we did not anticipate was that the internet was being used more for research purposes than for accessing news.

The high level of internet usage for non income generating purposes such as e-mail and news means that the business entrepreneurs will take longer to recoup their returns on investments.

The awareness level of about 60% was more than our assumption for the low level internet awareness. However when we take the active awareness indicated by the number of users, which was about 33%, then our assumption is justified.

The number of dialup subscriber accounts to ISPs are more readily available, for which it is estimated that there are now over 1 million subscribers in Africa. Of these, North Africa is responsible for about 200,000 and South Africa for 650,000, leaving about 150,000 for the remaining 50 African countries. This indicates that our hypothesis that the level of internet usage is very low in Botswana as compared to other sub-Saharan countries in Africa. It has also proven that the low level of internet usage was due to the ineffective marketing strategies of ISPs and ICs and the lack of general education on usage and functioning of internet.

The number of telephone lines compared to the population of Botswana indicates a connectivity ratio of 1: 6, which is among the highest in Africa. Given the current level of awareness and sufficient support and motivation, the country could carry out lucrative business activities by utilizing the available facilities, which proves our hypotheses.

The marketing of the internet services is not as intensive as it should be, which is reflected by the low level of usage. The number of companies that advertise on the web in Botswana indicates that business could be profitably done on the internet with more of our business

culture being modified to suit the current trend of globalization.

Recommendations

- We suggest that there should be more public education on the uses and facilities available in the Internet either by the stakeholders (internet service providers and cafés, and Botswana Telecommunications Corporation) or other institutions like the university and the non-government social organizations that deal with social economic welfare or the government.
- That the government through the Ministry of Education should encourage usage of internet by introducing and connecting internet facilities in secondary schools for students' usage. Computers courses and e-commerce should be included in the curriculum (which is being done by some schools in South Africa). Social halls in the villages too need to have Internet facilities.
- That more private cable companies should be licensed and allowed to operate in the country. In developed countries, a businessperson can connect to the Internet via a cell phone while doing so in Botswana would be economic suicidal. The encouragement of more investors in the country would force provision of more quality services at lower prices thus enabling upcoming entrepreneurs to venture in more lucrative business.
- That the ISPs and ICs should increase the intensity of their marketing effectiveness within the target market segments thus increasing more awareness coupled with more business usage.
- That the business education programmes in the university should incorporate internet business which should make it compulsory for projects in such areas as web selling, buying and creation of web pages and showing strong understanding of commerce as a requirement for graduation (the same is being done for Johannesburg Stock Exchange course, in South Africa)
- That more internet businesses should be started especially the internet service providers and "semausu"(Kiosk) cafes to tap the market opportunities. It would also bring more competition thus provision of better services at a lower cost for the customers.
- In most developed countries subscribers do not pay for the connection and download time while using the Internet. We strongly recommend that the same should be applied in Botswana. This will lower of Internet subscription hence the boosting the usage.

Future research

There is evidence that suggests a need for advanced

research to find out the extent and the category of the e-business being carried out in Botswana. It is also imperative that the reasons, motivation and problems being encountered while doing e- business is investigated so that suggestions and recommendations could be provided on how to overcome and enhance the e-commerce in the country

References

- Craig A Martin & Alan J Buh, 2000. Do Role Models Influence Teenagers Purchase Intentions And Behaviour; J. Consumer Behaviour.
- Chinyoka S.V, Ndaba J. and Mudariki T, 1998. "Do They Have What It Takes" A Case Study of Botswana's Small Scale Entrepreneurial Skill; Univ. Botswana.
- Ian Gordon, 1998. Relationship Marketing; New Strategies, Techniques and Technologies to Win the Customers You Want To Keep Them Forever; John Willey & Son Canada Ltd.
- Julita Nawe, 2000. Information Development; International J. Information Technology.
- Mike Jensen, 2000. African Internet Status African ICT Development Policies And Strategy: www3.sn.apc.org/africa/afsts.htm
- Michael Quinn and J humble, 1996. Using Service to Gain a Competitive Edge- The Prompt Approach; The Management of Sales & Customer Relations: Thomson Business press.
- Michael Levy and Barton Weitz, 1998. Retailing Management (3rd Edition) Irwin McGraw – Hill
- Philip Kotler, 1999. Marketing Management Prentice Hall Upper Saddle River New .(Millennium Edition)
- Shaoy Liao, Yuan Pu Shao, Hualquin Way, Ada Chen, 1999. The Adoption of Virtual Banking: An Empirical Study: J. Information Management.
- S De Boer M M Walbeek, 1999. Information Technology In Developing Countries A Study To Guide Policy Formulations: Int. J. Information Management.
- Robber d Buzzel, 1999. How do markets functions and evolve. J. Marketing.
- Ravis S Achrol And Philip Kotler (1999) Marketing In The Networking Economy: J. Marketing.
- Rahul De, Biju Mathew, 1999. Issues In The Management Of Web Technology: A Conceptual Framework: Int. J. Information Management.
- Washington Akumu, 2000. E Trade Firms Seals Sh.17m Venture www.Nationaudio.Com/News/Dailynation.Today/Futures/Business_Week1.Html.
- www.africatelescom.com/botsproof .htm ; Africa Telescom report, 1999. Gateway Publishing Ltd.
- www.africapolicy.org/bp/inet2html, 1996 ; Africa on the internet starting points for policy information; Africa Policy Information Center.