



Impact of Mobile Internet among Nau Students

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Abstract: Growth in mobile internet penetration globally has aroused the need to do further research in this area to find out the impact that this emerging technology is having on students. This paper presents the findings from a survey that was carried out to ascertain the growth in the number of mobile internet users among the students of Nnamdi Azikiwe University (NAU), Awka and the various activities that these users use their mobile internet devices to achieve. Questionnaires were administered to collect the required data which were further analyzed to generate useful information. With the result derived from the surveys, students are encouraged to annex this increase and uses to improve their academic objectives.

Keywords: mobile internet, mobile portal, mobile internet enabling technologies, social networking, chatting, instant messaging.

I.

II. INTRODUCTION

Since 2005 mobile Internet has become widely useful for a number of reasons: availability of mobile and wireless networks with greater data transfer rates; improvements in Internet browsing and email on mobiles; advanced multimedia handsets (especially the vogue for —smartphones since the launch of the iPhone); the renaissance of mobile computing and software evident in the popularity of —apps; the rise of mobile broadband; the takeup of social networking and social media platforms on mobile devices; the emergence of the tablet computer; and the emergence of locative, mobile media. At best, mobile Internet is a portmanteau term—what we are really experiencing is a plurality of mobile Internets [1]. Nonetheless as mobile Internet becomes pervasive, ubiquitous, and central to social belonging and cultural participation, there are widening expectation of its availability at all times.

‘Mobile Internet’ (MI) can be defined as the part of the current stationary Internet that can be accessed from a mobile device - a mobile phone, or another portable wireless device[2],[3],[4]. This definition focuses on user mobility and Internet connectivity provisioned not only ‘anytime’ but also ‘anyplace’[5]. Kaikkonen also posited that the ‘Mobile Internet’ or ‘mobile web’ refers to any access to the internet via a mobile device [6].

Mobile internet with its attendant euphoria has impacted so many aspect of the society as we know it today. Among the numerous industries that have been most affected by its revolution is the academic community. This has become obvious owing to the theory that most of the users of this technology are students in the various institutions of learning. “Internet-on-the-go” another phrase for mobile internet has been made possible by a number of technologies that we wish to describe as Mobile Internet Enabling Technologies. Examples are General Packet Radio Service (GPRS),

Enhanced Data rates for GSM Evolution (EDGE) and 3rd Generation (3G).

GPRS (General Packet Radio Service) is a packet-based data bearer service for wireless communication services that is delivered as a network overlay for Global System for Mobile (GSM), CDMA and TDMA networks. GPRS applies a packet radio principle to transfer user data packets in an efficient way between GSM mobile stations and external packet data networks. GPRS is a step towards 3G and is often referred to as 2.5G. GPRS offers a permanently available connection, with a transfer rate up to 85kbps (upload and download). The GPRS systems are built for applications where reliability, availability, and easy integration and configuration are essential [7].

EDGE (Enhanced Data rates for GSM Evolution) [also known as Enhanced GPRS (EGPRS), or International Mobile Telecommunications - Single Carrier (IMT-SC), or Enhanced Data rates for Global Evolution] is a further evolutionary step of GSM packet data. EDGE can handle about three times more data subscribers than GPRS, or triple the data rate for one end-user [8].

Third generation (3G) mobile telephony protocols support higher data rates, measured in kbps (kilobits per second) or Mbps (megabits per second), intended for applications other than voice-centric [9]. Services include wide-area wireless voice telephone, video calls, and wireless data, all in a mobile environment. Compared to 2G and 2.5G services, 3G allows simultaneous use of speech and data services and higher data rates [up to 14.0 Mbit/s on the downlink and 5.8 Mbit/s on the uplink with HSPA+]. Thus, 3G networks enable operators to offer users a wider range of more advanced services while achieving greater capacity through improved spectral efficiency. In actual fact, 3G provides higher transmission rates: a minimum data rate of 2 Mbit/s for stationary or walking user and 384 kbit/s in a moving vehicle.

University students use the Internet for three main reasons which can be listed as academic/learning purposes, communication, and entertainment. Communication and entertainment can be considered as attractive activities that cause intensive and long usage of the Internet [10]. But in the cause of the survey that we carried out among the students of NAU, the following activities were observed as some of the common activities that they use their mobile internet devices for. They are social networking, chatting, instant messaging and academic activities.

a. Social Networking: Social networking is an act of interacting/ sharing fun and some information popularly called profiles with known or unknown people (called friends) freely online. A social network service is an online interface, service, that enables users exchange information and relate socially. This consists of a representation of each user (often through a profile), his/her social links, photos, fun and a variety of additional services [11]. Social network sites are used for social networking among other things. They are by definition described as web services that allow individuals to; construct a public or semi-public profile within a bounded system; articulate a list of other users with whom they share a connection, and view and traverse their list of connections and those made by others within the system. The nature and nomenclature of these connections may vary from site to site. Examples of social network sites are Facebook, 2go, Naijapals, etc.

b. Chatting: The use of online chat-rooms as a means for language learning is not new. Chat has been of interest to language teachers since it appeared in the 1990s. It would be hard to find a general book on call that does not treat chat-rooms. However, while the existing research introduces the idea that students can “type-talk” to others over the world-wide-web, it does not give many suggestions on how to integrate that communicative activity into enhancing academic activities, in a way that will lead to a richer academic experience [12], [13]. That is the goal of this report.

c. Instant Messaging: Instant messaging enables “the almost instantaneous exchange of short, private, individualized text messages over the Internet between two users who are online simultaneously”. IM is a tool that allows users to detect the presence of their online “buddies.” This is made possible by the provider’s directory of user names and presences, or so-called “NPD.” The NPD enables users to determine when others are online or available [14].

d. Academic Activities: In the context of this our survey report, academic activities include but is not restricted to researching, checking of results, payment of fees, etc.

III. MATERIALS AND METHOD

The figures used were obtained from the questionnaire that was administered to a cross-section of students of Nnamdi Azikiwe University, Awka. A total of 300 copies of the questionnaire were administered but only 286 were duly returned and met basic research standard tool.

Table 1 highlights the responses we got to ascertain the level of mobile internet penetration among the students.

Table 1: Level of Penetration of Mobile Internet Devices Ownership

Question	Variable	Respondents	Percentage (%)
How many of the students from the study own a mobile internet device?	Number that owned at least one.		
	Male	140	48.95
	Female	119	41.61
	Number that don't own any		
	Male	15	5.24
	Female	12	4.20

Table 2 showcases the various activities that students of NAU mostly engage themselves with via their internet-enabled mobile devices.

Table 2: Major Activities Table.

Question	Activity	Respondents	%
What are the major activities that students carry out with their mobile devices?	Only Social networking	66	25.78
	Only Chatting	30	11.72
	Only Instant messaging	7	2.73
	Only Academic activities	49	19.14
	Only Social networking plus chatting	5	1.95
	All minus Academic activities	4	1.56
	Academic activities plus any other activity	65	25.39
	All activities	33	12.89

IV. RESULTS AND DISCUSSION

From the data gathered which were visibly represented in table 1 and table 2 above, it is gathered that of the entire sample population of 286 that passed research standards, a total of 259 representing 90.56% of the sample student population owned at least one or more internet enabled mobile devices as against the 27 representing 9.44% who do not have any internet enabled mobile device. This has ascertained the global trend and it is also obvious from further oral interaction with these students and in answer to one of the question that was asked in the questionnaire that this penetration is on the increase.

A closer look at the findings as tabulated on table 2 shows that from the total sample students of 259 who owned at least one or more mobile internet enabled device 49 of them representing 19.14% strictly use their devices for academic activities alone. A sub-total of 112 students representing 43.24% of the sample size indicated that they use their mobile internet devices for one or more of the various activities less academic activities.

A total of 65 students representing 25.39% agreed that they use their mobile internet devices for academic activities and at least one other activity. 33 students representing 12.89% were of the opinion that they use their mobile devices for all the activities under review including academic activities.

V. CONCLUSION AND RECOMMENDATIONS

In this work, out of the 286 NAU students that responded to the questionnaire that we distributed, a colossal number of 259 representing 90.56% indicated that they owned at least one or more mobile internet device. This indicated that the level of mobile internet penetration is very high. It was also gathered from this work that only 33 students representing 12.89% use their mobile devices for all the activities under review including academic activities.

Though 12.89% is still very low, we are recommending creation of greater awareness to enlighten the majority of the students on the need to use their mobile devices for all the activities that were reviewed in this work. Reduction in the cost of mobile internet by service providers will also achieve this goal. The creation of an active mobile portal for the school that incorporates all the activities outlined in this work will also encourage a greater number of NAU students to use their mobile internet devices for all the activities discussed.

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