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INTERNET USAGE AMONG POST-GRADUATE STUDENTS

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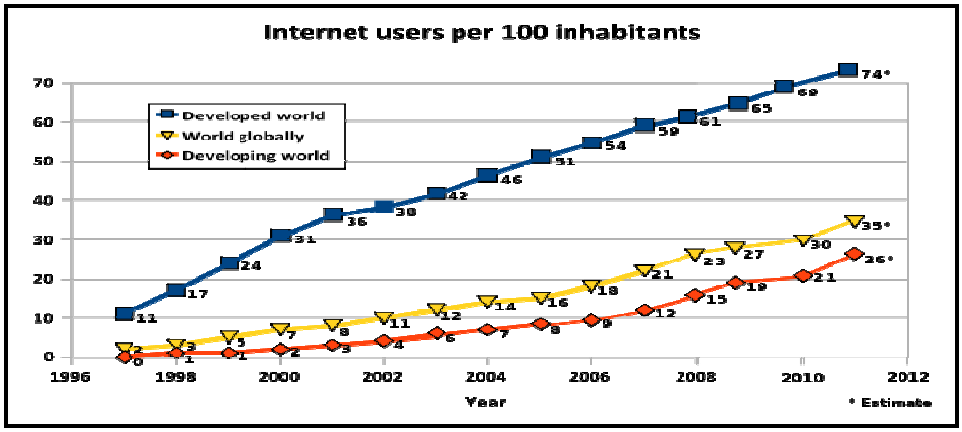
Abstract

Internet plays a vital role, in enabling the students to search the courses available in different institutions, in applying for admission in any institution, to search various study materials, job information, etc. It also makes the communication process easier for the students with their peers, teachers and other persons for establishing academic, social and personal relationships through using of electronic mail (e-mail) and different websites. So, the knowledge of internet has become the most vital for every post graduate student for their learning. Three aspects of using technology such as, learning about technology (know how to use), learning from technology (learn from stored information) and learning with technology (with the help of internet) are the basic learn facts. The common notion envisages the message that the post graduate students are aware of the modern technologies (ICT) for academic purpose which differs as revealed from the present study. The gender and stream of studies were not the factors for development of creating interest for internet use. The study focused on analysis of different dimensions such as usefulness, propose frequency and accessibility of internet with regard to the awareness and usage.

Key words: *Internet Usage, Postgraduate Students, Gender and Stream*

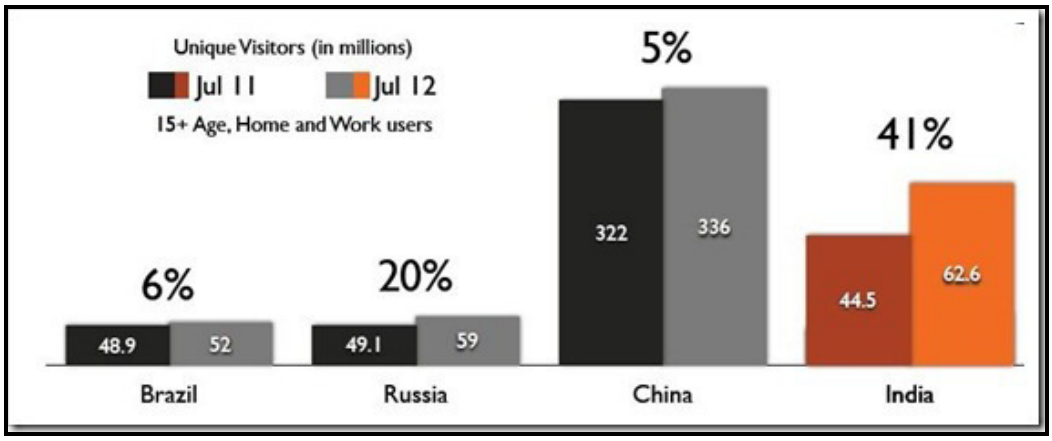
Introduction

The users of internet and computer networks can share resources and communicate with each other. In the university campuses the computers have direct access to all the facilities on the internet. Other computers, e.g. privately-owned ones, have indirect links through a commercial service provider, who offers some or all of the internet facilities. The Internet employs a set of standardized protocols which allow for the sharing of resources among different kinds of computers that communicate with each other on the network. These standards, sometimes referred to as the Internet Protocol Suite, are the rules that developers adhere to when creating new functions for the Internet. The Internet is also what we call a distributed system; there are no central archives. Technically, no one runs the internet rather; the internet is made up of thousands of smaller networks. The internet thrives and develops as its many users find new ways to create, display and retrieve the information that constitutes the internet. The Internet is one of the most important and complex innovations of mankind. It is a powerful means of communication, dissemination and retrieval of information. Now the facility of internet has been increasingly used for educational course delivery (Sinha, 2004). Writing in the Harvard International Review, philosopher Slabbert (2006) a writer on policy issues for the Washington DC-based Urban Land Institute, has asserted that the Internet is fast becoming a basic feature of global civilization, so that what has traditionally been called “civil society” is now becoming identical with information technology society as defined by Internet use.



[Source: Source: ITU World Telecommunication]

Some suggest that as low as 2 % of the World's population regularly accesses the internet (http://www.internetworldstats.com/usage/use009.htm). With over 60 million Internet user populations, in India being in age group of 18-35, educational related search queries are exploding on Google. Our core objective behind compiling this study was to understand the impact Internet is having on this young population with regard to education related decision making by the students (Anandan from Google, 2012). India has been identified as the fastest growing online market during the same period, with a 41% rise. This is much higher than China (5%), Brazil (6%) and Russia (20%). With most online categories in Indian exhibiting an average reach below the global figures, the potential seems to be high. (http://www.comscore.com, 2012). It highlights that the worldwide online audience has jumped 7%, with Asia-Pacific markets adding more than 40 million users.



[Source: www.comscore.com]

Literature Review

The studies were reviewed and the findings were also presented in the report having relevance to the study. Zakaria et al. (2010) conducted their research on the use of Web 2.0 technology by Malaysian students. The integration of Web 2.0 tools into learning was positive. Students preferred using e-mail to disseminate and share digital contents. Similarly it was also found that for finding information related to education, students prefer to use search engines instead of asking friends or teachers. Cheung and Huang (2005) suggested Universities should provide students with the necessary resources and facilities; instructors need to encourage and support Internet use in their course teaching; and Internet technical support should be available and effective. All of these elements may encourage positive beliefs and attitudes in students, which in turn could result in more Internet use. Maheshwari et al (2010) conducted a study on assessment of ICT literacy among high school students of Warangal District, Andhra Pradesh. The ICT literacy of students of private schools (22.58) is significantly better than that of government school students (16.07). Bebetsos & Antoniou (2009) found that majority of U.G. & P.G. students of Greek University had positive attitude with lot of confidence and spend more time to use computers and internet for educational

purposes. Dange (2010) in a study examined that students entering university have a mediocre knowledge and confidence of computing skills. The findings revealed that students consider themselves more knowledgeable and confident. No doubt, this confidence gets reinforced by their use of the Internet and all it has to offer. The results suggested that they are not more competent at using Office applications. Sanjay and Singh (2006) studied Internet usage by research scholars and faculty in sciences; the study found that 96.55 % research scholars and faculty used the internet; fifty six out of fifty eight respondents have the basic knowledge of computers and use internet. Choudhury and Sethi (2009) analyzed the computer literacy of library professionals in the university libraries of Orissa. The study showed that majority of the professionals were computer literates and majority of them opined that they should be provided orientation. Dhamija and Panda (2007) identified that the attitude of post-graduate students also plays an important role towards the usage of internet. Nowadays post graduate students are also likely to be dependent on computer with internet for collection of relevant information for learning, conducting research as well as teaching in their future life. Chinwe (2006) found from the study that majority of the students in the university use the internet for academic purposes in spite of the location of the facilities. In a study conducted by Mohanty & Pandua (2012) on ICT literacy among the higher secondary teachers and it was revealed from the study that teachers from Government Arts and Science faculty differs significantly in ICT literacy. Gender also plays significant factor for ICT literacy among HS teacher. Mohanty & Jena (2012) concluded from their study on ICT competency that the students from well to do families where parents are highly Educated and well earned, are found to be more literate than the students from less educated and low earned parents. Here, parental education and occupation played a vital role for ICT competency among the students.

It was felt necessary to conduct a study on the internet skill, internet knowledge or awareness of PG students of Ravenshaw University, as this university running at infancy stage and students of all corners of the state get admission for higher study. The common notion envisages the message that the PG students are aware of the modern technologies (ICT) for academic purpose. But in reality it differs in some extent, the present study has made an effort to study the internet knowledge of P.G. student and their level of usage and whether gender, stream play any role for internet knowledge, skill etc. created the base purpose for the study.

Objectives of the Study

The study was undertaken with the following objectives.

1. To study the internet knowledge of post-graduate students.
2. To study the internet awareness of post-graduate students on the basis of gender.
3. To study the internet knowledge among post-graduate students in relation to their stream.

Research Questions

Based on the above stated objectives, the investigator has formulated the following research questions

1. What do the Post Graduate Students of Ravenshaw University perceive about the Usefulness of Internet?
2. What do the Post Graduate Students of Ravenshaw University perceive about the Propose of using internet?
3. Do the Post Graduate Students of Ravenshaw University use internet source for educational purpose frequently?
4. Do all the Post Graduate Students of Ravenshaw University accessible to internet use (e.g. having valid email id)
5. Are the Post Graduate Students of Ravenshaw University aware of all the aspects of internet (e.g. Face book, yahoo chatting, orkut, random search etc)?
6. Do the Post Graduate Students of Ravenshaw University use internets for Educational propose?
7. Do the Post Graduate Students of Ravenshaw University think internet as a barrier of study?
8. What is the opinion of the Post Graduate Students of Ravenshaw University on the internet facility available in the library of the university?

Scope of the Study

The study was limited to the following area.

1. It was limited to study internet knowledge among Post Graduate students.
2. The population of the study was limited to Post-Graduate of Ravenshaw University, Cuttack.
3. The sample for the study was confined to 100 Post-Graduate students.

Method of the Study

The research method of the study was descriptive survey in nature. Descriptive research gives description of the present situations. Its main focus is on the prevailing conditions in which individuals, groups or things behave and functions. In the present survey an attempt was made to know what extend the post graduate students possess Internet knowledge and whether gender, stream of study play any discriminating role and whether any relationship between SES and Internet knowledge. Thus the study comes under descriptive study of ex-post-facto type.

Population and Sample

The population of the study comprised all the post graduate students of Ravenshaw University, Cuttack, Odisha and the sample of the study comprised both Male and female students from Arts and Science Stream. Due to the limitation of time the investigator selected 100 Post Graduate Students purposively keeping in view of the factors like Gender and stream as the distribution was : Male 50 (Arts-30, Science-25), Female 50 (Arts-25, Science-20) from Ravenshaw University, Cuttack.

Tool Used for Data Collection

The investigator used a self prepared questionnaire (Internet Knowledge Test) on use of internet and ICT knowledge to collect the data on internet knowledge. The questionnaire consists of both open and closed ended questions on the following dimensions.

- Usefulness of Internet, Propose of using Internet,Frequency of using internet, Accessibility of internet, Aspects of Internet, Using Internet at Educational propose, Internet as a barrier,Opinion regarding internet facility in university

Techniques of Data Analysis

The collected data were tabulated and analyzed by using Percentage and qualitative technique with thick description.

The Result and Discussion

The main purpose of the study was to assess Internet Knowledge among post Graduate students of Ravenshaw University. Besides, the objective was to analyze the Internet Knowledge with reference to the factors such as Stream and gender. The data were collected from 100 Post Graduate students which comprised 50 males and 50 females. After collection of data the investigator followed the scoring procedures as prepared during the time of preparation of tool. The data were analyzed and interpreted on the basis of the Percentage analysis. The main variables such as Stream (Arts & Science), gender (Male & Female) were analyzed. The details are presented below.

The investigator has collected the data on internet service awareness by using a questionnaire containing 14 Items of different aspects of Internet Service awareness viz. Usefulness of Internet; Propose of using Internet; Frequency of using internet; Accessibility of internet; Aspects of Internet; Using Internet at Educational propose; Internet as a barrier; Opinion regarding internet facility in university. After collecting the data investigator analyze the data very minutely by using simple statistics like average and Percentage which are presented below.

A. Usefulness of Internet

Under this section the investigator has formulated 3 items No. 1, 2 & 3. The subjects of the sample have responded their opinion on these items after thorough understanding. The response has been analyzed in simple Percentage analysis which is presented in table-1 and table-2.

Table 1: Percentage Analysis of Internet Usefulness

(N= 100) Arts: 55, Science: 45; Male: 50, Female: 50)

Sl.No	Components	Yes (%)	No (%)
1	Competency	86 (A: 45, S: 41)	14 (A:10, S: 04
3	Use of internet on daily basis	27 (A: 12, S:15)	73 (A: 43, S:30)

Table 2: Preference of Place for Using Internet (N=86)

Sl no	Places	% of students preferred
1	University Lab	30 (M: 16 %, F: 14 %)
2	Dept. Computer	12 (M: 4 %, F: 8 %)
3	Home	21(M: 8 %, F: 13 %)
4	Cybercafé	32(M: 20 %, F: 12 %)
5	Friends Home	05(M: 2 %, F: 3 %)

The investigator selected 100 PG Students out of this 55 from Arts and 45 from Science stream (Male 50 & Female 50). From the above tables it is evident that 86 % (Arts: 45, Science: 41) of post graduate students have the competency in internet but it is varies in in-depth and 14 % (Arts: 10, Science: 04) do not have any knowledge on internet. On the other hand less than 50 (27) % (Arts: 12, Science: 15) of post graduates students use internet on daily basis and 73 % (Arts: 43, Science: 30) students do not use on daily basis. Hence, it is obvious although 86 % students have the internet knowledge but they are not fully dependent on internet.

Out of this 86 students, it was revealed that 30 % of post graduate students prefer to use university computer lab for internet use (16 % male and 14 % female); 12 % (M: 4 %, F: 8 %) students expressed their view for using concerned Department computer; 21 % students (M: 8 %, F: 13 %) prefer use internet at home, 32 % post graduates (M: 20%, F: 12%) prefer to use cybercafé and very negligible five (5%) % students (M: 2 %, F: 3 %) prefer to browse internet at friends home.

The reasons may be many for the difference in % on above facts, but one reason is obvious which could be assumed during that data collection that cybercafé is the safest place to use internet for personal aspects.

B. Purpose of using Internet

Under this section the investigator has formulated items as following. The subjects of the sample have responded their opinion on these items after thorough understanding. The response has been analyzed in simple Percentage analysis which is presented in Table-3.

Table-3: Analysis on Purpose of using Internet

(N=100) Arts: 55, Science: 45; Male: 50, Female: 50

Sl No	**Purposes**	**Percentage of students preferred**
1	Internet for Educational Purpose	24 % (M:10, F:14)
2	Getting job information.	28 (M: 12, F: 16)
3	Downloading Games, Movie, Songs, Images etc.	18(M: 9, F: 9)
4	Social Networking	16(M: 9, F: 7)
5	Browse without any aim	8(M: 5, F:3)

Under this dimension 94 students responded out of 100 students and from the above data it was evident that 24 % of post graduate students (M: 10, F: 14) using internet for Educational purpose and 28 % of post graduate students (M: 15%, F: 13%) using internet for getting job information from various Government and Private Sectors. From this analysis it was also revealed that the 18 % of post graduate students (M: 14 %, F: 4 %) preferred to use internet for downloading Games, Movie, Songs, Images etc. and 16 % (M: 9

%, F: 7 %) use in social networking for chatting with his friend and relatives and 8 % of post graduate students (M: 5 %, F: 3 %) use internet without any aim.

C. Frequency of Using Internet

Table-4: Analysis on Frequency of using Internet

(N=100) Arts: 55, Science: 45; Male: 50, Female: 50

Sl no	Frequency	% of students preferred
1	Everyday	14 (M: 8, F: 6)
2	2 to 3 times a weak	39 (M:14,F:25)
3	Once a month	16(M: 10, F: 6)
4	2 to 3 times a month	11(M: 6, F: 5)
5	No response	20 (M:12, F: 08)

From the above data it is evident that 14 % of post graduate (M: 8, F: 6) students uses internet service in daily basis and 39 % of post graduate students (M:14,F:25) uses internet service 2 to 3 times a week and very less number 16 % students (M: 10, F: 6) use internet service once a month and 11 % of students (M: 6, F: 5) uses internet service 2 to 3 times a month.

D. Accessibility of Internet

Table 5: Analysis on Accessibility of Internet

(N= 100) Arts: 55, Science: 45; Male: 50, Female: 50)

Sl no	Aspects	% of respondents
1	Having Valid Mail-Id	Yes-67 (M: 35, F: 32) , No-19 % (M:10, F:09) No Response-14 %
2	Writing Correct Example of Mail-Id	54 % correct (M: 35, F:19) ,13 % incorrect (M:8,F:3) ,No response 33 %

From the above data it is evident that 67 % of post graduate students (M: 35 %, F: 32%) having valid Mail-id and 19 % of post graduate students have not the valid mail-id. From this analysis it was found that the 54 % of post graduate students mention an example of valid mail-id and rest 13 % students mentioned their mail-id incorrectly.

E. Aspects of Internet Use

Table-6: Analysis on internet services being used

(N= 100) Arts: 55, Science: 45; Male: 50, Female: 50)

Sl.No.	Name of Services	Mode of Use		
		Most Frequently	Occasionally	Never
01.	e-mail service for communication	46 %	35 %	19 %
02.	Face book use	59 %	33 %	8 %
03.	FAQ (Frequent Asked Question)	22 %	31 %	47 %
04.	Online Chatting	61 %	26 %	13 %
05.	Online Audio and Video	38 %	29 %	33 %
06.	Communication through Skype	27 %	16 %	57 %
07.	Bulletin Board Services	09 %	14 %	77 %

From the above table it is evident that 46 % students most frequently use the email for communication purpose; 59 % use face book social networking site; % students use internet for online chatting with friends and others purpose; 38 % students use internet for downloading the audio and video sites; 27 % students use software for communication most frequently. Out of the data revealed from the students & 8 % students never use face book. 13 % students do not chat with friends through on line. 77 % students do not open the bulletin board service on internet.

F. Educational Purpose

Table 7: Analysis on use of internet for Educational Purpose

(N= 100) Arts: 55, Science: 45; Male: 50, Female: 50

Aspects	Percentage
Internet serves as a teacher for you	Yes-63 (M: 45, F: 18); No-26 (M:18 ,F: 06) No Response: 11

From this analysis of the above table the investigator could found that the 63 % of post graduate students (both male and female) accepted that the internet serves as a teacher for them and 26 % of students are not agree that the internet serve as a teacher for them. At the same time 11 % post graduate students remained silent on this aspect as they could not decide whether internet serves as a teacher for them.

G. Internet as a barrier

Table 8: Analysis on the Use of Internet as a Barrier

(N=100) Arts: 55, Science: 45; Male: 50, Female: 50

Sl no	Aspects	Percentage
1	Internet Reduce everyday activity	Yes-67 (M: 35, F: 32); No-19 (M: 10, F: 09) No Response-14
2	Internet as a barrier in maintaining real life situation.	Yes-32 (M: 22, F: 10); No-56 (M: 28, F: 28) No Response-12

From the above data it is evident that 67 % (M: 35, F: 32) of post graduate students are agreed that Internet reduce their everyday activity and 19 % (M: 10, F: 09) of students are not agreed that internet reduces their everyday activities and 14 % students were undecided. In relation to Internet as a barrier in maintaining real life situation, 32 % (M: 22, F: 10) of post graduate students expressed their opinion in favour, that, internet creates a barrier for maintaining real life situation. Majority of respondents i.e. 56 % (M: 28, F: 28) students opined against the statement, that means, for them internet is not a barrier for maintaining real life situations.

H. Opinion on internet Facility in University Library

Table 9: Analysis on the Opinion on internet facility in university library

(N=Arts: 55, Science: 45; Male: 50, Female: 50)

Aspects	Opinion Percentage
Satisfied with the internet facilities available for the students in University library	Yes-25 (M: 10 , F: 15) No-75 (M: 40 , F: 35)

From the above data it is evident that 75 % of post graduate students have expressed their opinion that the internet facilities available in University is frustrating and they are not satisfied with internet facilities available in the library, in terms of number of computers etc. and 25 % of students have remarked that internet facilities available in University library is accessible and convenient.

Major Findings

- As high as 86 % (Arts: 45, Science: 41) of post graduate students have the competency in internet but it varies in in-depth and 14 % (Arts: 10, Science: 04) do not have any knowledge on internet.
- Majority of post graduate students (73 %) (Arts: 43, Science: 30) students do not use on daily basis whereas only 27% (Arts: 12, Science: 15) of post graduates students use internet on daily basis.
- Thirty percent of post graduate students (16 % male and 14 % female) prefer to use university computer lab for internet use.
- Twelve percent of the students have expressed their view for using concerned Department computer; 21 % students prefer use internet at home, 32 % post graduates prefer to use cybercafé and very negligible five (5 %) % students prefer to browse internet at friend's home.
- Twenty four percent of post graduate students prefer to use internet in Educational purpose and 28 % of post graduate students use internet for getting job information
- Eighteen percent of post graduate students prefer to use internet for downloading Games, Movie, Songs, Images etc. and 16 % use in social networking for chatting with his friend and relatives and 8 % of post graduate students use internet without any aim.
- Fourteen percent of post graduate students uses internet service in daily basis and 39 % of post graduate students uses internet service 2 to 3 times a week and very less number 16 % students use internet service once a month and 11 % of students uses internet service 2 to 3 times a month.
- Sixty seven percent of post graduate students having valid Mail-id and 19 % of post graduate students have not the valid mail-id.
- Thirty eight % students use internet for downloading the audio and video sites; 27% students use software for communication most frequently
- Sixty three percent of post graduate students (both male and female) accepted that the internet serves as a teacher for them and 26 % of students are not agree that the internet serve as a teacher for them
- Majority of respondents i.e. 56 % students opined against the statement, that means, for them internet is not a barrier for maintaining real life situations.
- Majority of post graduate students (75%) of have expressed their opinion that the internet facilities available in University are frustrating and they are not satisfied.

Conclusion

We are living in a modern knowledge based society, where the Internet Knowledge has made an increasing and powerful impact upon every area and especially at work place like office, industry, institution, home, school, ATM computerized card catalogue in library banks, research, hospitals etc. It has shown great impact in the field of education. The teachers and students should be motivated to get trained to improve their Internet Knowledge in order to participate actively in the knowledge based society. It is assumed that the development of internet awareness or knowledge is influenced by the peer groups and the academic environment in the university campus. The facilities need to be upgraded in terms of proving sufficient number of computers and opening of computer laboratory in each post graduate department. The University is the premier institute in Odisha and in India as well. The students from different parts of the globe are rushing for admission into different post graduate programmes, but due to non availability of the infrastructure in the campus it makes them frustrating. Hence, attention needs to be given and necessary steps to be taken for making the system more learnable for making the campus suitable for learning. Even, facility needs to be provided for making students' internet literate.

References

Anandan, R. (2012). *India ranks no 2 in search queries for education: Google*. Retrieved from www.techgig.com on 13.08.2012

Bebetsos. E. and Antoniou, P. (2009). Gender difference an attitude towards computer use and physical activity among greek university students. *The Turkish Online Journal of Educational Technology*.

Cheung, W. & Huang, W. (2005). Proposing a framework to assess internet usage in university education: an empirical investigation from a student's perspective. *British Journal of Educational Technology .Vol .36* No. 2. 237-253.

Chinwe, V. A. (2006). Dynamics of internet usage: A case of students of the Federal University of Technology Owerri (FUTO) Nigeria, *Educational Research and Reviews Vol. 1* (6), 192-195.

Choudhury, B.K. & Sethi, B. B. (2009). Computer literacy of library professionals in the university libraries of Orissa: an analytical study. *IASLIC Bulletin, 54(1),* 15-30.

Dange, J. K. (2010). Post graduate students' computing confidence, computer and internet usage at Kuvempu University-an Indian study. *International Journal of Instruction. Vol.3,* No.2, July 2010 available at: http:/ / www .e-iji.net

Dhamija, N & Panda S.K. (2007). Attitude of P.G. students towards internet. *Edutracks*. Vol-6. No.5.

Maheshwari, U., K., Reddy, S., Gyanmudra, P. (2010). Assessment of ICT literacy among high school students of Warangal district, Andhra Pradesh, *Edutracks,* Hyderabad.

Mohanty, S.P. & Pandua, M. (2012). Information and communication technology literacy among the higher secondary teachers in relation to their type of management and stream: an assessment. *International Journal of Educational Research and Technology (IJERT*), Vol. 3 (2) Pp. 119-124. Available at: www. soeagra. com/ ijert/ ijert. htm, retrieved on 27.10.2012.

Mohanty, S.P., & Jena, S.K. (2012). ICT competency with reference to parental education and occupation: an assessment, *NAVA GAVESANA: An International Research Journal,* Vol.3 (2), Pp. 31-40.

Sanjay,K. & Singh, V. (2006). Internet usage by research scholars – A dissertation submitted to the Rohtak University

Sinha, M.K. (2004). Studies on the scenario of internet use pattern of Assam university community and local population of Barak valley: a survey. In T.A.V. Murthy et al. (Eds.) *Planner 2004: content creation, access and management in networked environment* (210-225). Ahmedabad: Inflibnet Centre.

Slabbert, N.J. (2006). The technologies of peace. *Harvard International Review*, June 2006. (Visited on January 14, 2008)

Zakaria, M. H., Watson, J. & Edwards, S. L. (2010). Investigating the use of web 2.0 technology by Malaysian students. *Multicultural Education & Technology Journal 4*(1): 17-29.

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