The Disadvantage of ICT in Higher Education Students' Study and Life through Lanzhou University Postgraduate Students

Ali A. Mahmood and Yi Wan School of Information Science and Engineering, Lanzhou University, Lanzhou City, China Email:msnbazona@yahoo.com, wanyi@lzu.edu.cn

Abstract—With a huge and fast growth of the use of technology in all the areas of modern-day life, the Elearning is now one of the main factors in the higher education students' life. E-learning represents computer, internet, mobile phone, and any technology used in learning or teaching. These technologies get more and more professional, this leads to more disadvantages, and these disadvantages are getting more serious than before. We made a survey on the postgraduate students at Lanzhou University, analyze the result, compare it with previous similar work and then prove that now have more serious disadvantage than before. These disadvantages can be in teaching fields towards postgraduate students, study field, and by using more and more of the postgraduate students' time, this time can be for rest or study. In this paper we will focus on these disadvantages in the students at Lanzhou University.

Index Terms—disadvantages of e-learning, internet influence on postgraduate students, postgraduate students' relation with ICT

I. INTRODUCTION

In the last few years the impact of technology is more effective on all areas of life. This technology changes many things, including teaching and learning also. The internet is one of the most effective parts in these changes in teaching or learning [1].

Comparison has been done between the old way of learning and teaching and the new way in using more technology, the new way having an advantage, but also with disadvantage [2]:

The learner can choose the object as he/she wants, maybe not exactly what the teacher recommends, and in this case will cost more of the students' time and effort.

II. MAIN DISADVANTAGES OF E-LEARNING

Zuzana and Alena said in [3] that the main disadvantages are:

- Not easy to find the right resources for student questions that they try to find answers for.
- Communication infrastructure and technology are needed more.

- Not many teachers have enough knowledge about how to use Information and Communication Technology (ICT) in teaching.
- E-learning grows fast and the source for the information is easier to access with less effort. If another type of source needs more work, the students can feel lazy to try to get.
- Information Security is not strong enough.
- Use of e-learning will keep the students use machines with less interact with their other environment.
- Students have more space to decide by themselves and make some of the students confused about which source is more suitable for them.
- Mathematics or professional subject for some students need personal explanation for better understanding, a teacher should confirm which source of information is more suitable.

Besides this the teacher should check well the source of information, software and hardware than they can know which is better for their students and during the class [4].

Face-to-face teaching is better than the network technology way, and it needs a long time to make the teacher get used to and know the best way of using these new technologies in teaching, so far normal way of teaching can replace by network teaching [2].

On the other hand using these technologies in teaching needs good preparation this will cost the institute more money.

Currently the technology starts to be a big source of money for many companies. At the same time maybe some of these websites or programs or devices are also used for teaching or learning. For an operating e-learning system, it may not have a good effect because it is possible that students spend their time on browsing news or playing online games.

Another disadvantage is that the students should have good skills with a good way of thinking. But in e-learning the students have bigger space and they have to choose what is good for their learning, so if some students don't have these skills then they will face some problems. [5]

Also the smart phone has started to have a big effect on the students because it's one of the most used devices in their everyday life. Carmen Hernandez ´, Jesus Vegas ´, Cesar Llamas ´, Manuel A. Gonzalez ´[6] said:

Manuscript received July 1, 2016; revised October 11, 2016.

Using smart mobile phone by students is getting more and more popular. They use these devices in study, more than half students on this situation.

Also he confirms that 83% of the students have smart phone, and 44% of them use the smart phone in the class.

Distance learning is another type of e-learning; this type can overcome all the distance or position difficulties, virtual university is one kind of distance learning,

The disadvantages for these virtual universities, according to [7] are:

- Some kinds of education need to have a practice part as a main part in learning, the virtual university cannot offer this [8].
- The normal education course can be faster than same course in visual university [8].
- The students may have problems in understanding the technical information [7].
- Feedback speed can be a problem [9].
- Listening and focus on learning material from the students may not be guaranteed [10].
- Students may trade them like customers [10].
- Policies from the government currently are not good enough. [10]
- Students cannot have direct interaction with their teacher like in traditional learning [11].
- Students should have more technical information about how to use these virtual universities.
- During virtual study the interaction between same course classmate is not as good as in the traditional way, as time goes along the students will be more isolated [7].
- Students' study tends to be related to the devices using the technology; if these devices have any problem then the students' study will also have problems [7].
- Keeping an eye on the students to make sure they are in the right way of study is not easy [7].
- Virtual university certificate that is given to the student when he/she graduates may not be as the same level with normal study certificate because have some kind of distrust [7].

Additional problem of e-learning for students is not enough to inspire [12] and one of the obstacles for the teacher is to make their teaching material more acceptable for the student, also students more familiar with technology than the teacher, then the teacher may have some pressure because they have at least to reach students level in using technology to be able to make their teaching material more motivated [4].

Combined assigning homework and having quiz can be adopted. Therefore, a majority of students will finish their homework seriously and personally [2].

III. THE SURVEY

A. Methodology for Data

The Data in this survey we collected using the hand writing on hard papers, the survey was done at Lanzhou University postgraduate campus library in January 2016

The postgraduate students finished the survey questions during one hour, we also kept near the students to explain any question they have about the survey questions, the survey have 26 questions with some branch question inside the main one.

B. Survey Question Parts

- 1) Teaching field: in these questions from the survey focused on the teaching issues, used by teacher and what is the impact on the students
- 2) The Technology for Studying: this part asks about the devices that students most often use and what the time it takes for their everyday use, how these devices is really starting to have a serious disadvantage.
- 3) General Questions: this part deals with the students' action in everyday life, in this part we want to get some view about the student activities and what they will do if they have time.
- 1 Does the E-learning have many serious disadvantages?
- 2 Last few years the communication and computer using is crazy increased, does this affect the students' education level?
- 3 Smart Phone and internet what is the scope of their effect on the Lanzhou University postgraduate students?

TABLE I. SURVEY QUESTIONS

1-Sex	Male	36%
	Female	64%
2- Occupation	Postgraduate	100%
	students	
3-You think that Information and Communication technology help you in your study?	Yes	26%
	No	8%
	I don't know	26%
	Waste time	30%
4-You use the Information and Communication technology like searching on the internet to solve your homework?	Yes	19%
	No	22%
	So less	23%
	Often	36%
5-When you need to search some information in the internet about	Yes	19%
	No	23%
your study or you	Waste time	19%
search in the digital library, you	Yes, but Need	39%
find what you searching for?	time	39%
	More than 1 hour	33%
6-You use computer everyday about?	2-3 hours	11%
	Yes , Depending	48%
	the reason of use	
	I don't like	8%
	Less than 30	29%
7-You play computer game or	Minutes	
phone game every day?	More than 1 hour	17%
phone game every day?	All my free time	21%
	I don't like	33%
8-Your phone is smart phone?	Yes	88%
	No	7%
	I will buy one	4%
	I feel the two is	
	the same (smart	1%
	phone and normal	1 /0
	phone)	
9-Do you feel your smart phone	Help in my study	9%
	Take my free time	53%
help you in your study, or its	Maybe	7%
waste some part from your time	Waste my free time	31%

11-Do you think if you don't use	Yes	33%
the Information and	No	26%
Communication technology you	I don't know	30%
can focus more on your study and study better?	Waste time	11%
	Yes	49%
12-Did your teacher use the Information and Communication	No	21%
technology in the class when	I don't know	17%
teaching you?		
	Maybe	13%
13-Do you think when your teacher use the Information and	Yes	19%
Communication technology in the	No I don't know	37%
class it's better for your	I don t know	28%
understanding?	Maybe	16%
14-Do you think your teacher	Yes	33%
have enough knowledge to use	No	19%
the Information and	I don't know	17%
Communication technology?	Maybe	69%
15-Share the education with your	Yes	29%
classmate use the Information and	No	31%
Communication technology is	I don't know	18%
useful? For example make one group on QQ or any other program or way	Maybe	22%
16-If you and your classmate	Chatt	46%
have one group on QQ or any	Know class	21%
other program, the most this	information	
group use for?	I don't use	24%
group use for:	Solve homwork	9%
	university library	37%
17-Do you think buying books on	Buy online	39%
the internet is better from borrow from the university library?	Two way i don't like	1%
I morn the university morniy.	I don't know	23%
18-Do you think the old teaching	Yes	52%
way is better for your	No	34%
understanding, for example use	I don't know	3%
for explaining use handwriting on the blackboard?	Maybe	11%
the blackboard:	Not bad	17%
	Cant study well	48%
19-What's your opinion for the	Waste time	16%
distance learning?	I don't know what	1070
	is this	19%
20-The Information and	Not bad	71%
Communication technology in the	Save time	2%
society for example when you	3.4 1	0%
take the bus and pay by your student card or eating in the student restaurant and also pay by	Maybe I don't know	27%
your student card		
	Website	33%
21-During your study you use?	Reading online	26%
	Cloud server	17%
	I don't use all	24%
22-If every day you have 5 hour	Less than 30 Minutes	43%
after finish all your class and you	More than 1 hour	16%
r life activities, you will	All my free	8%
A - reading book	I don't like	33%
	Less than 30 Minutes	32%
D D	More than 1 hour	13%
B-Play game	All my free	9%
	I don't like	46%
C-Watching (film, Series)	Less than 30 Minutes	36%
	More than 1 hour	34%
	All my free	19%
	I don't like	11%
- ~	Less than 30	
D-Chat	Minutes	63%

	More than 1 hour	11%
	All my free	13%
	I don't like	13%
24-When you use the computer and see some advertisement for something you?	Have a look	7%
	Never open	16%
	If about clothes or	38%
	eating i will	
	If new stuff i will	39%
	open it	
	Easy to find	7%
25-When you search about	Hard to find	58%
something on the internet you	Most of the time	100/
feel?	cant find	19%
	Waste time	16%
	traditional book	26%
26-You prefer book is traditional	PDF book	22%
book or the PDF book, or	reading online	38%
reading online book	book	
	All i don't like	14%
27-When you go to the university	100% Agree	43%
library to study there, and you	60% Agree	19%
don't allowed to use phone or	30% Agree	27%
computer you agree that you can	_	
study better and can study for	I don't Agree	11%
longer time?		
	Good but cant	
28-Do you think when your teacher use the data show to explain the class without writing and explain on the board?	understand all the	28%
	class	
	Write on the	17%
	blackboard better	1770
	Use data show	
	without	39%
	blackboard make	
	me confused	
	Use data show	
	without blackboard is	16%
	better	l

Source: Author

IV. SURVEY RESULT

After analyzing the survey the results show that all the subscribers are postgraduate students. There are 63% female and 37% male.

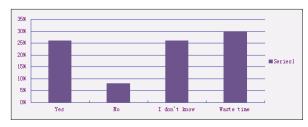


Figure 1. Information and Communication technology benefit as students opinion.

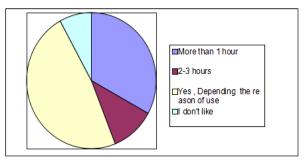


Figure 2. Computer usage by students for everyday

30% said they think that Information and Communication technology waste their study time. See Fig. 1. 39% of them say searching study material on digital library need time to find the exact thing they search for. For 92% of the students use the computer every day with different time duration. See Fig. 2.

Their 49% of the students confirm that their teacher use ICT during their class and 37% of them said this technology does not help for better understanding. On the other hand 33% of them said they think that their teacher have enough knowledge to use these technologies .52% they prefer the old way of teaching for better understanding. 39% said if just use the data show without writing or explain on the blackboard make them confuse. (Distance learning can't make me study well) there 48% confirm this, when asking them about the distance learning. And 30% mention that it is not helping them in their study and wasting their time.

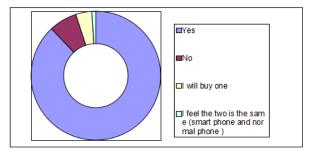


Figure 3. Ratio for using of smart phone.

Although 39% agree when they search in digital library its consumes more time to find exactly what they are searching for, and 33% of the students reveal if they don't use these new technologies that can focus more on their study.

Smart phones are very commonly used these days, by this time Smart phones have a big influence on the student's everyday life. See Fig. 3.

These smart phones also have similar effect for computers or any other device can use the internet and could be with the students everywhere.

V. CONCLUSION

E-learning is getting more serious disadvantages. These disadvantages start to be stronger just from the last few years because the fast development in technology. The main disadvantage is that the huge growth in technology, this technology be one of the main money resources for many institutes, universities or companies, All of these affects the students by taking more and more from their life or study time, the time should be used for rest or study. The overuse of technology in teaching from the teacher doesn't have a good reaction from the students as our survey shows. It still needs to use some of the traditional teaching method. In class some teachers use these technologies in teaching but students feel the teachers give them much more information than they can understand. Smart phones and the computers are the most

used devices for the students, the smart phones can do many tasks but it tends to be wasting a lot of students' time. Learning is a good business for many companies and organization. Even some companies don't sell or ask the students to pay for this education information but they still try to put advertisement. In some situations the students need to find some topic or education program freely, which may consume all their day time just searching because a lot of websites or companies they use these education keywords for advertising.

VI. FUTURE WORK

We advise seriously the government or the university management to find a good way to filter the internet contents for students in general and for postgraduate students especially, the idea is to make special logan interference to make sure about students university ID number, this filter should applied inside the university internet to protect the students from wasting their time by internet advertising, games, and fake link for science source.

REFERENCES

- M. L. Angelino and F. K. W illiams, "Strategies to engage online students and reduce attrition rates," *The Journal of Educators* Online, Dec. 15, 2007.
- [2] J. Zhang, J. Ma, and Q. Yao, "Application of e-learning in college education," in *Proc. International Conference on Computer Science and Service System*, June 2011, pp. 2102-2104.
- [3] Z. Melicher kov á and A. Busikova, "Adaptive E-learning-A tool to overcome disadvantages of E-learning," in *Proc. 10th International Conference on Emerging eLearning Technologies & Applications*, November 2012, pp. 263-266.
- [4] S. Squires and J. Preece, "Predicting quality in educational software: Evaluating for learning, usability and the synergy between them," *Interacting with Computers*, vol. 11, pp. 467-483, 1999.
- [5] J. Zhao, "The application of metacognitive strategies into elearning in English teaching," in *Proc. International Conference* on e-Education, Entertainment and e-Management, December 2011, pp. 67-69.
- [6] C. Hernández, J. Vegas, C. Llamas, and M. A. González, "A survey on mobile devices use by university students," in *Proc. International Symposium on Computers in Education*, November 2014, pp. 223-226.
- [7] M. Mirzakhani, H. Ashrafzadeh, and A. Ashrafzadeh, "The virtual university: Advantages and disadvantages," in *Proc. 4th International Conference on Distance Learning and Education*, October 2010, pp. 32-36.
- [8] Overview of virtual university status in Iran. (2009). [Online]. Available: http://www.irna.ir.
- [9] M. Hannay and T. Newvine, "Perception of distance learning a comparison of online and traditional learning," *Journal of Online Learning and Teaching*, 2010.
- [10] O. Yengin, K. Adem, and U. Huseyin, Think again Virtual University, Elsevier Ltd., 2010.
- [11] What are the pros and cons of online education? [Online].

 Available: http://lwww.elearners.com/guide/faq-glossary/elearning-faq/what-arethe-pros-and-cons-of-online-education/2010
- [12] S. Schaffert and W. Hilzensauer. (2008). On the way towards Personal Learning Environments: Seven crucial aspects. eLearning Papers. [Online]. vol. 9. Available: http://www.elearningpapers.eu



Ali A. Mahmood Born at Mosul, 1985, he graduated from Electronic and Information Engineering College at 2007, study psychology at Zambuk Institute for one year. He work for Zain communication company for 2 years, then he work for GSM tower instructions with Nokia-Siemens as installations engineer for about 2 years, Worked as volunteer for teaching English for college students 2012-2013, this

experience encourage him to do his master subject to figure out any new or good way that can make students study well and more efficiency .Very interesting in Education and teaching field , Planning to publish more papers about this subject and if it possible will make this topic as his future PhD study.

Mr. Mahmood was a Honorary Member at human resources association for developmental countries Mosul-2008.



Yi Wan study from 1991 -1995 Xi'an Jiaotong University, Bachelor of Information Science and Technology, 1995 - 1998, Michigan State University, master's degree, mathematics, electrical engineering, 1998 - 2002, Rice University, Ph.D., Electrical and Computer Engineering.

He work In 2000 at Bell Labs; 2002 -2005 In the United States National Center for Macromolecular Imaging; in 2005 present

Information Science and Engineering, Lanzhou University, Professor, Institute of Signal and Information Processing.