

## **Feasibility Assessment of Offering B.A. Levels of Humanities through Virtual Education in Iran (Case of Study: Payam-e Noor University)**

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**Abstract:** *Since virtual education has been considered as an alternative for conventional education and it is in progress in M. A. levels in Payam-e Noor University (PNU) the feasibility assessment of B.A. levels has been studied for the present study. In this study, the facilities and equipment needed for virtual education and the shortcomings of it in PNU is studied. The research is of practical ones and imperative survey is used as the research method. Statistical society contains of 928 university teachers and all the 8954 students studying at B.A. levels in 2014. For the study of facilities and equipment, systematic observation method was used. Due to some restrictions of motivation etc., and for the increase of validity and reliability a questionnaire was also used to collect the data. According to the observations, the basic equipment and facilities as: computers, internet, skilled personnel needed, economical budgets, and digital textbooks have already been provided in Mashad Payam-e Noor University. On the other hand, possibility of offering virtual education from the view points of teachers was 3.09 out of 5 and from the student's point of view was 2.87. Therefore, it is possible to offer virtual education to B.A. students in PNU. Hence lack of a unique educational standard, very skillful personnel, small educational space, educational classes for teachers, are of the shortcomings of offering virtual education to PNU students.*

**Keywords:** *Feasibility, Virtual Education, Mashad Payam-e Noor University.*

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### **Introduction**

In recent years, the implementation of virtual education systems in order to provide services, using the new technologies has become a basic need. Use of new information and communication technologies in the field of virtual education can be considered as an option to fill educational gaps in the lack of access to in-person training. Virtual education by using information technologies has revolutionized the education field and has used networking technologies to create, develop, transfer and facilitate learning anytime, anywhere. This training method has provided the learning possibility for everyone, in every time and place. Therefore, we can say that the biggest benefit of virtual education is freedom of interaction between teacher and learner, and learner and learner, away from time and space constraints.

since the educational system of Iran can accept a limited percentage of those interested in higher education and many people, under work pressure and lack of time, cannot attend in traditional classes or courses or continue the education; it is necessary to address virtual education in order to solve many problems and shortcomings of current educational system. Virtual education courses provide the possibility of education for many employees, people with disabilities and even house wives for whom it is impossible or difficult to attend in university classes. It can be said that with regards to many features such as space, location and level of education in the country, virtual education can be considered as the best investment in higher education. If we want to implement the virtual education via the internet, the following factor should be provided:

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- Computer facilities and equipment,
- Educators with relevant skills,
- Staff with necessary technical skills,
- Economic IT infrastructure, and
- Necessary communication platform

In this study, by examining these factors, we are seeking to assess the possibility of providing virtual education via the internet in B.A. levels of humanities at Payam-e Noor University of Mashhad. Before the implementation of virtual education, it is necessary to examine whether it is possible to hold the courses or not. This study examines this issue and tries to specify the available facilities and shortcomings.

In order to assess the possibility of providing virtual education via the internet in B.A. levels of humanities at Payam-e Noor University of Mashhad, we will answer the following questions:

1. What is the status of computer facilities available for the implementation of virtual education in B.A. levels of humanities at Payam-e Noor University of Mashhad?
2. Is the communication platform required to offer virtual education in B.A. levels of humanities at Payam-e Noor University of Mashhad provided?
3. Are there enough staffs to carry out virtual education activities in Payam-e Noor University of Mashhad?
4. Is the economic infrastructure required to offer virtual education in the field B.A. levels of humanities at Payam-e Noor University of Mashhad provided?
5. Is it possible to support and evaluate the students of virtual courses in Payam-e Noor University of Mashhad?
6. Is it possible to digitize the learning textbooks in B.A. levels of humanities at Payam-e Noor University of Mashhad to offer virtual education?
7. What is the feasibility of providing virtual education in Payam-e Noor University of Mashhad from the perspective of undergraduate humanity professors?
8. What is the feasibility of providing virtual education in Payam-e Noor University of Mashhad from the perspective of undergraduate humanity students?

Here, it should be noted that throughout the article, virtual education, electronic training and electronic learning (e-learning) have been used to express one concept and are considered synonymous to each other; they all mean trainings that are provided through the internet and World Wide Web, regardless of time and space constraints.

#### **Administrative Requirements of E-Learning**

**Technology:** Although technology is an important element in the success of electronic trainings, it cannot be the main equipment of such trainings. Technology has educational function and is used as a tool for teaching and learning. Teachers and learners should be taught to work with technology, and to this end, there should be processes and programs to systematically accomplish the trainings. **Course design and development:** E-learning is a group activity because its deployment requires people with different specialties to work together. **Subject content management:** In e-learning environments, content to offer learners should be prepared in forms, which are applicable in the used technology.

#### **Executive Requirements of E-Learning**

Electronic trainings, by the use of information and communication technologies, provide the ability to offer content in various forms. Thus, the portion of time that previously spent on teaching is now more efficiently spent to facilitate and support learning activities.

However, e-learning cannot, by itself, cause the efficiency and effectiveness of teaching and learning, and if we want the training to be efficient and effective, great attention should be devoted to the execution stages. These stages are:

#### *Registration of learners:*

Those organizations that want to use online educational system should be able to select, register and manage their learners in an online manner. To achieve this end, proper administrative systems should be used and the employees should be trained properly.

#### *Support for learners:*

In the e-learning environments, supporting the learners is very important, because they are separated from their teachers and educational institution in terms of time and place.

#### *Evaluation of learning and providing feedback:*

Since the e-learning systems have a high flexibility in the field of time- and place- independent use, they are more likely to face with assessment- and evaluation- related violations, so the possibility of such violations should be managed properly.

#### *E-learning effects evaluation:*

The way staff and learners participate in e-trainings needs to be evaluated. Evaluating the effects of used processes, as fundamental components, in the planning and implementation of any e-learning activities should be considered (Naidu, 2011).

### **Benefits of E-Learning**

- Temporal and spatial dynamics: E-learning has broken the barriers of communication in traditional education such as physical campus-based and time constraints and has doubled the access to teaching-learning process for students and teachers, so that they can effectively manage the time and place of learning.
- Efficient use of time: In E-learning environment, time is more spent on the major issues and minor issues have not the opportunity to be proposed. Moreover, there are no irregular academic holidays in virtual education courses and the waste time is meaningless.
- Educational opportunities for people deprived of education: E-learning can provide the education opportunities for people who have deprived of formal education due to various reasons.
- Virtual communication development: E-learning can provide conditions for the development of virtual friendship communication at the national or transnational level as well as the possibility of more scientific exchanges.
- Traffic reduction: Another benefit of e-learning is that there is no need to travel specially in crowded and air-polluted cities. Efficient use of time, due to reduction of unnecessary travels, can be the obvious benefit of virtual learning compared with traditional learning.

### **Disadvantages of E-Learning**

- High cost of investment: The initial investment for e-learning is higher than traditional methods.
- Technological limitations: It should be checked that whether the level of current technology could meet the desired educational needs; and if there is a full compatibility between all the software and hardware to promote the educational software technology.

Inappropriate subjects: Some experts believe that not all subjects can be taught in electronic form.

Cultural acceptance: In some regions of the world, according to cultural structures and social beliefs, people generally do not tend to use computer, let alone e-learning.

### **Benefits of E-Learning in Iran**

In addition to the mentioned general benefits in the context of e-learning, given the particular conditions of the country, other benefits can be considered, the most important of which are:

- The possibility of providing high quality education for people who are interested in learning different scientific subjects, given the relatively low level of education in many traditional universities, especially in remote areas.
- Easy access to higher education for those interested students who cannot continue their education due to few seats of the country's universities.

### **Problems of E-Learning in Iran**

- Low per capita levels of personal computer use in the country: The relatively high cost of computers, lack of information on its potentials, and low level of computer literacy even among educated people are among the reasons for the low per capita levels of personal computer use in the country.
- Low rate of access to internet in the county
- Lack of compatibility between telecommunication network facilities and international standards: About half of the residents of the country live in areas in which there is no internet connectivity. Furthermore, even in areas where there is connection, the data transfer rate is very low due to the low bandwidth and the use of worn copper wires in telecommunication network (Shabani Nia and Mokhtari, 2008).

### **The Role of E-Learning in the Future of Developing Societies**

The followings are among the challenges that universities face with in the age of information and communication:

- Knowledge production speed and the necessity of the continuing and lifelong educational system to accompanying the rapid dramatic changes in global educational system
- Growing demand to enter the academic system to achieve information literacy and realize the proper position commensurate with globalization phenomenon
- The necessity of responding to the growing demand for justice- and user-centered education and recruiting domestic and foreign talented students

Virtual education will enhance the efficiency of educational processes. Nowadays, every society, regardless of the level of development, inevitably and continuously is challenged with a rapid process of change in all areas and structures. But the difference between developed (industrialized and advanced countries) and developing societies lies in the fact that the formers generally gain the capacity to efficiently and immediately respond to the new demands by restructuring their systems and changing their procedures. However, in the less developed or developing societies, the inflexibility and inefficiency of traditional procedures, prevents adequate and timely reaction to changes. Therefore, the changes cause the emergence of new problems rather than solving the problems. The clear result of these conflicts is widening social, cultural, economic and technological gap between the two types of societies. This limits the world's unity and solidarity. There is enough evidence on the role of educational system in the development of all societies. Of course, in such unrest environment, no modern society can achieve satisfactory progress without qualitative and modern educational system. Within the educational system, the higher educational system has a certain effect in organizing the various levels of education, including undergraduate, graduate and research levels and everything else related to professional practice, value development, and science and technology production. Therefore, it is clearly understandable that the above gap reduction mainly depends on the appropriate structure of educational system. The situation can be understood by comparing the pure research and educational systems in developed societies and the lack of it in less developed countries. On the world stage, distance education and e-learning have reached a tremendous level of development in the last two decades; Because this type of training provides the knowledge required by a person simultaneously when studying, working and in family and allows the person to maintain the process of training during his/her economic life through continuous education. In addition, this style of education can significantly reduce the costs of education and training. The educational dimension not only plays a crucial role in the development of education among a lot of people, but also has a fundamental role in reconstructing the old educational systems, stimulating the at-work training systems and immediate response to new demands, and functional use of new technologies. Therefore, distance education and e-learning, form an important tool and dimension that, given the strategic tasks, rapidly and widely lead the developing countries to the modern situation, so close them to the living standards of developed countries.

## Research Literature Review

- ✍ Shu et.al. (2007) studied the feasibility of the development of e-learning as a solution for continuing education among public health nurses in Taiwan. In this study, the reasons for the acceptance or rejection of this training were evaluated. The results showed that 88.84% of nurses had positive attitude to this type of training, because this type of training has a high flexibility in terms of time and place, and 11.16% did not have access to e-learning because of barriers such as the lack of personal computers and internet access.
- ✍ In a feasibility study, Dissel et.al. (2010) evaluated the internet (web) based e-learning model for medical students. They stressed that the use of e-learning alongside the traditional (face to face) teaching methods provides new opportunities and an effective tool for better understanding, while examined the students' opinions in this regard. The results showed that 97% of the statistical population considered the computer based learning to be useful. By studying the feasibility of the implementation of virtual education in Islamic Azad University of Khorasgan.
- ✍ Afiuni et.al. (2014) showed that from the faculty member's viewpoint, the possibility of implementing virtual learning courses in four technical, socio-cultural, organizational and educational is significantly higher than the average level. Therefore, it is possible to implement these courses, but to prevent the problems during the implementation the shortcomings should be corrected. In addition, based on demographic characteristic (gender, age, education and experience), there was no significant difference between the average of respondents' views.
- ✍ Mohammad Hasan Keshavarzi et.al. (2014) examined the feasibility of e-learning in Islamic Azad University of Marvdasht in the year 2013. The findings showed that the possibility of the implementation of virtual education in Islamic Azad University of Marvdasht is at a high level from the viewpoint of officials, professors as well as students. In addition, the interest and willingness of teachers and students towards virtual education was at a high level (about 90 percent).
- ✍ Mamaghani (2008) examined the components of virtual education and the viewpoints of faculty members, officials and students as a strategic resource, and the feasibility of implementing this training in Faculty of Education and Psychology, University of Al-Zahra. The results showed that majority (79.4%) of faculty members, officials and students stated that it is possible to implement the e-learning in the Faculty of Education and Psychology. Furthermore, 74.3% of students believed that, in order to implement this training method, facilities such as related software and adequate hardware, digital library as well as workforce, cultural, leadership, economical and technical infrastructures of telecommunication networks should be provided.

## Research Method

The present study is an applied research from the purpose viewpoint, and analytical-survey method was used to conduct it. The statistical population of the research consisted of two groups: Professors of Payam-e Noor University of Mashhad (928 ones) and all undergraduate students of humanities in the year 2014 at Payam-e Noor University of Mashhad (8954 students). The researcher wanted to select the sample size based on the number of students and professors in each department through stratified random sampling, but since it was not possible to access the required number, simple random sampling method was used. The sample size was selected to be 274 and 368 for professors and students groups, respectively. However, due to limitations in data collection for professors group, the sample size for this group was reduced to 47 ones. Since observation is, in fact, the main method of collecting information about phenomena related to all scientific areas and, compared to other method of data collection, have the required flexibility to gain insight about the facts, it can be used in conjunction with other methods (Hariri, 2008). In this research, in order to check the facilities required to implement virtual education, systematic observation method (a pre-designed observation based on facilities required to implement virtual education) was used. However, because the knowledge of some non-verbal indicators such as interest and awareness was not possible through observation, and to enhance the validity and reliability of the observation, a questionnaire was also used to assess the

facilities needed to provide virtual education. The questionnaires consisted of two parts: demographic characteristics (gender, age, work experience) and a set of questions, based on Likert scale, about the access, desire, ability, knowledge and assessment of professors and students regarding virtual education. The questionnaires used for this study are the ones developed by Davoodi Mamaghani (2008) about the deployment of virtual education at Faculty of Education and Psychology, University of Al-Zahra.

However, some changes were made in the questionnaires in order to comply with the requirements of Payam-e Noor University of Mashhad, which is why the validity of the questionnaires were re-examined by experts and professors. Because when we talk about the validity of measuring instrument, we are trying to answer the question whether the instrument measures what the researcher wants to measure? For this purpose, the required reforms were applied, some of the questions were deleted and some others were changed or replaced. The reliability of the questionnaire was determined to be 86% through Cronbach's alpha coefficient. The correlation coefficient showed the relationship between what each question measures and what is measured overall. Accordingly, the obtained coefficient indicates that the questionnaire has a good reliability.

### Research Findings

1. *Is the communication platform provided to offer virtual education in B.A. levels of humanities at Payam-e Noor University of Mashhad?*

Internet access with 512 Kbps of bandwidth is provided to use in university environment for professors and staff of virtual education as communication platform needed to implement virtual education courses.

2. *Is the economic infrastructure provided to offer virtual education in B.A. levels of humanities at Payam-e Noor University of Mashhad?*

To use information and communication technologies in the field of higher education curriculums, having sufficient funds to provide the required hardware and software facilities is the top facilitating factor, and lack of funding for universities to provide the facilities is the main obstacle.

In Payam-e Noor University of Mashhad, the funds needed to provide the facilities are supplied from the budget of the education sector of the university; and if there is a need for funds to launch a new course, it can be provided by requesting the central organization.

3. *Are there enough staffs to carry out virtual education activities in Payam-e Noor University of Mashhad?*

Staff: The number of staff working in virtual education section of the university is now five people: One manager (representative of Khorasan Razavi province) who is responsible for quantitative studies including the approval of professors' fees, holding workshops for staff and professors, and informing the professors and students of virtual courses on Learning Management System (LMS) website. One person who is responsible to hold classes at the center of Mashhad, and simultaneously controls the classes and checks their quality; and three people who help them as student part time work. Computer specialists (IT professionals) from statistics and technology office of the university are responsible to control the network problems and so on.

4. *Is computer facilities provided to implement virtual education in B.A. levels of humanities at Payam-e Noor University of Mashhad?*

Hardware equipment: There are six computers in virtual education section of the university. Four computers are put in a separate room for use by professors of virtual education who, for any reason, want to hold their classes within the university; and two computers is used by the responsible of holding the classes and his/her colleagues. The manager has an independent computer in his/her room, of course. All the computers have access to the internet.

Other equipments available in the virtual education section include two scanners, which are used to scan the desired content of professors and convert it into small web format (SWF) format to upload on the site.

Software equipment: LMS was designed to hold virtual education courses by a company affiliated to the central organization of Payam-e Noor University called "Information Technology Route".

5. *Is it possible to support and evaluate the students of virtual courses in Payam-e Noor University of Mashhad?*

E-learning system has been designed based on course guide, independent learning and support services.

Through course guide, internet conference, e-mail and video, students are able to learn independently and communicate with the instructor at any time.

In Payam-e Noor University of Mashhad, the students can interact with one another and with officials of virtual education of the university in Learning Management System (LMS). In addition, there is the guide for Learning Management System (LMS) as well as notifications for students in the system.

Students of virtual courses of the university can observe the educational calendar of each semester in their profile, which can log in with a specific username and password after registration. Telephone numbers for communicating with the relevant authorities are also provided on the website of Payam-e Noor University of Mashhad.

On the other hand, it is possible for professors to evaluate the students during the semester; however, the final evaluation of the students is done in person.

6. *Is it possible to digitize the educational textbooks in B.A. levels of humanities at Payam-e Noor University of Mashhad to provide virtual education?*

In teaching-learning process, the content has an important place, and more importantly, it is one of the essential elements in the curriculum development process. In other words, achieving the set educational goals is based on the existence of convenient and efficient content so that it can be used in order to achieve the goals. Given the importance of this subject, the resources based on which the final evaluation is done are identified and defined in Payam Noor University.

On the other hand, Arbaugh (2010) indicates the necessity of designing the virtual courses by the relevant professor before the class and believes that in this case the professor can have a better interaction with students.

Given this issue and in order to prepare and transfer information and scientific achievements to electronic environment, the possibility of digitize the desired content of professors at each session is provided by officials responsible for holding classes and equipments in Payam-e Noor University of Mashhad. Therefore, according to what was obtained from observation, Payam-e Noor University of Mashhad has the components needed to provide virtual education in B.A. levels of humanities. The components include computer facilities and equipment, communication platform, staff to conduct virtual education activities, economic infrastructure, the possibility of supporting and evaluating the students of virtual courses and the possibility of digitizing the educational resources.

7. *What is the feasibility of providing virtual education in Payam-e Noor University of Mashhad from the perspective of undergraduate humanity professors?*

**Table (1): Descriptive statistics for feasibility of providing virtual education and its subscales among professors**

Variable	Mean	Standard deviation	Range	
Possibility to provide virtual education	3.09	.76353	1	5
Ability subscales	2.80	.82370	1	5
Tendency subscale	2.96	1.3080	1	5
Awareness subscale	3.54	.66456	1	5
Evaluation subscale	2.99	.69836	1	5

According to table1, it can be seen that from the perspective of surveyed professors, the total average feasibility of providing virtual education on a 1 to 5 scale is 3.09, which is assessed as moderate. Furthermore, among the subscales of this index, knowledge subscale with an average of 3.54 was higher than average and higher than other subscales. The lowest average belonged to ability subscale with an average of 2.80, which shows that despite the moderate tendency of professors (2.96), they have lower than average ability to conduct virtual education. Moreover, the professors have less than average evaluation (2.99) for the feasibility of providing virtual education.

**Table (2): Comparing the average possibility of providing virtual education and its subscales in terms of gender (among professors)**

Variable	Gender	Frequency	Mean	Standard deviation	Mean comparison test	
					T	Sig
Possibility to provide virtual education ability subscales	Female	18	3.07	0.52193	-0.182	0.865
	male	29	3.10	0.59625		
Tendency subscale awareness subscale	Female	18	2.88	1.37793	-0.324	0.748
	male	29	3.01	1.28510		
Evaluation subscale possibility to provide virtual education	Female	18	2.87	0.77653	-0.492	0.625
	male	29	2.75	0.86172		
Ability subscales tendency subscale	Female	18	3.58	0.61759	0.355	0.724
	male	29	3.51	0.77918		
Awareness subscale	Female	18	3.02	0.72767	0.276	0.776
	male	29	2.97	0.55282		

In addition, the average feasibility of providing virtual education from the men’s perspective (3.10) is higher than women’s perspective (3.07). On the other hand, the significance level for mean comparison test is higher than 0.05, which reveals that the difference is not significant. Moreover, the data showed that there is no significant difference between the two groups in all subscales.

**Table (3): Comparing the average possibility of providing virtual education and its subscales in terms of teaching experience (among professors)**

Variable	Teaching experience	Frequency	Mean	Standard deviation	F	Sig
Possibility to provide virtual education ability subscales	Less than 5 years	10	2.69	0.33158	2.964	0.063
	5 to 10 years	12	3.19	0.50260		
	More than 10 years	20	3.13	0.61408		
Tendency subscale awareness subscale	Less than 5 years	10	2.46	0.75454	0.732	0.487
	5 to 10 years	12	2.83	0.72279		
	More than 10 years	20	2.74	0.76878		
Evaluation subscale possibility to provide virtual education	Less than 5 years	10	2.00	0.78174	3.916	0.028
	5 to 10 years	12	3.29	1.35610		
	More than 10 years	20	3.17	1.28116		
Ability subscales tendency subscale	Less than 5 years	10	3.33	0.54469	0.335	0.717
	5 to 10 years	12	3.55	0.62609		
	More than 10 years	20	3.54	0.84054		
Awareness subscale	Less than 5 years	10	2.80	0.81749	1.690	0.198
	5 to 10 years	12	3.26	0.65601		
	More than 10 years	20	2.92	0.47471		



In addition, the average score for feasibility of providing virtual education among the professors with teaching experience between 5 to 10 years (3.19) is higher than the other groups. On the other hand, the significance level for mean comparison test is higher than 0.05, which shows there is no significant difference between the viewpoints of professors with different teaching experience about the feasibility of providing virtual education. The data also shows that, only in tendency subscale, there is a significant difference between the three groups, so that the average tendency to teach in a virtual manner among the professors with a teaching experience of 5 to 10 years (3.29) is higher than the other groups.

8. *What is the feasibility of providing virtual education in Payam-e Noor University of Mashhad from the perspective of undergraduate humanity students?*

For the use of virtual education in universities, it is necessary to know the knowledge and attitude of students as the most important elements of the educational system.

**Table (4): Descriptive statistics of the possibility of providing virtual education and its subscales among students**

Variable	Mean	Standard deviation	Range	
Possibility to provide virtual education	2.87	66353.	1	5
Ability subscales	2.60	72345.	1	5
Tendency subscale	2.67	0089.1	1	5
Awareness subscale	3.69	069.1	1	5
Evaluation subscale	2.88	77069.	1	5

According to table4, it can be seen that from the perspective of surveyed students, the total average feasibility of providing virtual education on a 1 to 5 scale is 2.87, which is slightly less than average. Furthermore, among the subscales of this index, only knowledge subscale with an average of 3.69 was higher than average and higher than other subscales. The lowest average belonged to ability subscale (2.60), which shows that the students do not have the ability to deal with virtual education. In addition, students have less than average tendency to use virtual education, and less than average evaluation (2.88) for the feasibility of providing virtual education.

**Table (5): Comparing the average possibility of providing virtual education and its subscales in terms of gender (among students)**

Variable	Gender	Frequency	Mean	Standard deviation	Mean comparison test	
					T	Sig
Possibility to provide virtual education ability subscales	Female	321	2.86	0.69798	-1.113	0.267
	male	42	2.99	0.78429		
Tendency subscale awareness subscale	Female	321	2.57	0.69501	-2.581	0.010
	male	42	2.88	0.86468		
Evaluation subscale possibility to provide virtual education	Female	321	2.67	0.99358	-0.397	0.692
	male	42	2.71	1.12266		
Ability subscales tendency subscale	Female	321	3.72	1.05375	0.731	0.465
	male	42	3.59	1.12747		
Awareness subscale	Female	321	2.88	0.76673	-0.731	0.465
	male	42	2.97	0.76068		

In addition, according to table5, the average feasibility of providing virtual education from the men's perspective (2.99) is higher than women's perspective (2.86). On the other hand, the significance level for mean comparison test is higher than 0.05, which shows there is no significant difference between men and women regarding the possibility of providing virtual education. The data also shows that only the ability subscale of virtual education among men (2.88) is significantly higher than women (2.57).

### Conclusion

Nowadays, virtual education is raised in the world as a necessity and a training system with the minimum *cost* and maximum efficiency. To keep up with these developments, Payam-e Noor University of Mashhad should take steps to provide training programs through the internet. In this regard, the required infrastructures, equipments and scientific, technical and training faculty members should be provided; and it should be noted that the growth of virtual education is directly related to increased access to information and communication technologies. According to what was obtained in the observation, the necessary infrastructures needed to provide virtual education are provided in Payam-e Noor University of Mashhad. Therefore, the possibility of providing virtual education at this university is in an acceptable level. However, it should be noted that failure to follow certain standard, labor shortages, task dispersion, limited space, lack of training courses for virtual professors and lack of necessary platforms for the evaluation of virtual courses, are among the problems and limitations of providing virtual education courses in Payam-e Noor University of Mashhad. Solving the problems and limitations will ensure the courses are held in a more useful manner.

According to the research findings that have been obtained based on the viewpoints of students and professors, before deciding on providing virtual education courses in B.A. levels of humanities at Payam-e Noor University of Mashhad, measures should be taken to address issues that the possibility of their implementation is at average or less than average level, and to correct shortcomings. As was stated by Afiuni et al (2014), from the professors' perspective, the possibility of providing virtual education courses is higher than average level; but, to prevent problems during implementation, the existing shortcomings should be solved. In higher education planning, in order to develop the use of e-learning in teaching-learning process, we should address training the students who currently work in relation to e-learning in universities. To this end, it is proposed to consider workshops in this field in order to increase the understanding of virtual education; and various computer and internet training courses to be held by the university in a more serious manner, especially for students. As Arbaugh (2010) proposed the training of teachers for virtual courses as an effective solution for the success of these courses, it is necessary for better implementation of virtual education that faculty members of Payam-e Noor University learn the knowledge and skills needed to apply this technology in education and development of higher education.

### References

1. Afiuni, Safoora; Forooghi Abari, Ahmad Ali; Yarmohammadian, Mohammad Hosein(2014). Feasibility study of implementing virtual education courses in Islamic Azad University of Khorasgan (Isfahan). *Journal of Research in Educational Sciences*. 2(39): 80-92
2. Arbaugh, J. B. (2010). Sage, guide, booth, or even more? An examination of Arbaugh, J. B. (2010). Sage, guide, booth, or even more? An examination of instructor activity in online courses. *Computers & Education*, 55(3). P. 1234–1244
3. Davoodi Mamaghani, Mehrangiz (2008). *The components of virtual education and the feasibility study of implementing this education in Faculty of Education and Psychology, University of Al-Zahra*. Master's thesis, University of Al-Zahra.
4. Diessl, Stefanie, Verburg, Frederik A., Hoernlein, Alexander, Schumann, Martin, Luster, Markus, Reiners, Christoph(2010). Evaluation of an internet-based e-learning module to introduce nuclear medicine to medical students: a feasibility study. *Nuclear Medicine Communications*, 31(12), p.1063-1067.

5. Hariri, Najla (2008). *Principles and methods of qualitative research*. Science and Research Branch, Islamic Azad University, Tehran
6. Keshavarzi, Mohammad Hasan; Salehi, Masoumeh; Heydari, Seyyed Taghi; Salehi, Moslem; Amirianzadeh, Mozghan(2014). Feasibility study of implementing e-learning in Faculty of Education and Psychology, Islamic Azad University of Marvdasht in 2013. *Academic Journal of E-learning*. 4 (1): 20-27.
7. Naidu, Sam (2012). *E-learning: theoretical fundamentals, procedures, practices*. translators: Saeed Safayi Movahed and Hedi Mohabat. Training and Industrial Research Center of Iran (original publication, 2003).
8. Shabani Nia, Fereydoon; Mokhtari, Vahid (2010). *E-learning systems analysis and design*. Khaniran, Tehran.
9. Shu Yu, I-Ju Chen, Kuei-Feng Yang, Tze-Fang Wang, Lee-Lan Yen(2007). A feasibility study on the adoption of e-learning for public health nurse continuing education in Taiwan. *Nurse Education Today*, 27(7), p. 755-761.