

## *Evaluation of the nurses' knowledge about the internet*

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**Keyword:** Knowledge, Nurses in hospital, Healthcare, Internet.

**Abstract:** There is a lack of a nursing perspective on the evolving internet environment. The purpose of this study is to know the knowledge and correlate the extent to which the internet is used among healthcare professionals and to study its effect on clinical practice. A randomized scan of the syllabus at Basra Governorate hospitals using randomly distributed questionnaires on health care professionals attending CME programs between 2017 and 2018. Multiple choice and yes/no questions regarding trends in internet use and its implications for clinical practice and response analysis were selected. The main outcome measures are self-reporting rates for internet use, perceived effects, and the role of medical web sites in clinical practice. The visit of three hospitals in the city of Basra, previously the General Hospital of Basra, Al Mawani Hospital and Al Fayhaa Hospital to take a questionnaire from nurses inside the hospital and to know how nurses use the Internet and how to benefit the nurse from the Internet of their nursing life and the number of samples 100 samples according to the proposed study. The study found that age and academic achievement played a major role in the use of the Internet. The percentage was unsatisfactory, reaching 56%.

### **1. Introduction**

Nursing is a work done to help the individual – sick or healthy – to do activities that contribute to his or her health. Nursing is the sum of services given to individuals and their families to help them maintain their natural state or help them to relieve their organic and psychological pain [1]. Nursing services may be the purpose including prevention of disease or assistance in diagnosis, treatment and prevention of complication [2].

The extent to which nurses have benefited from the development of technologies, especially the use of the internet in their nursing lives, and the development of nursing services, updating their computers on the internet, nursing programs, how to work on the nursing database, and communicating with other nurses to solve nursing problems and reach solutions [3]. Several studies have explored the scientific platforms on patient use of the internet for health information. In contrast doctor's perspective on evolving internet environment is missing. The purpose of this study is to assess and correlate the extent of internet use among healthcare professionals and examine its effects on clinical practice [1]. With changes in care delivery, technological advances and increased patient expectations, the role of nurses as healthcare professionals is growing and evolving. This trend requires nurses to have the latest information at their disposal so they can effectively assess

and treat their patients[4]. The science of medical informatics is closely related to the evolution of information technology- the most advanced and rapidly evolving human sciences- affecting the lives of individuals, peoples and communities- and we are aware of the tremendous advances in technology worldwide. Smart calculators help people determine the optimal decision and guide them to more success in discovery, invention and diligent search for the truth in the universe [2]. Since man represents the most precious value created by God on earth and ridiculed him, it has become certain that the health of this person and the integrity of his body and mind and soul is one of the most important necessities of his life and the necessities of the continuation of the reconstruction of the universe, so it has been manned since ancient times to develop treatment and seek recovery, medicine for what we are now of progress. Medicine is still looking for further development using all the available means of science, the most important of which is information technology, which has become impossible to practice without using modern medicine [3]. Healthcare professionals have realized that much of their technical and administrative activities are related to the management and provision of patient information, diagnosis, treatment and medical research. Hence, we can recognize the role of computer and the idea of using it in medicine and its relation to health sciences and the relationship of the latter with computer science and medical engineering [4]. We also have to recognize the nature of medical information and distinguish it with some characteristics – from the rest of the human information – such as privacy and terminology and its need for complex and accurate treatment, which led to the important of using artificial intelligence applications in the treatment of medical information and its integration with the practice of medicine[5].

## **2. Problem of project**

1. Demographic variables have an impact on the use of the Internet by nurses. The age of the nurse has a significant impact on the current skill set of the health worker and in some cases the inverse relationship with mastering the training

2. The educational level of the nurse The impact of Internet education has a positive impact on nurses' knowledge, where educated nurses generally have a range of more comprehensive skills. The level of education for nurses may be linked to their training competence.

## **3. Goals of project**

1. To evaluate nurses' knowledge about internet.
2. To find out the evaluate between nurses knowledge about internet demographic data (age, level of education )

## **3.1. Methodology**

### **3.1.1 Setting of the project**

The visit of three hospitals in the city of Basra, namely the General Hospital of Basra, Al Mawani Hospital and Al Fayhaa Hospital.

### **3.1.2 The sample of the project**

A questionnaire taken from nurses in the hospital to know how nurses use the Internet and how to benefit the nurse from the net of their nursing life. The number of samples 100 samples according

to the proposed study. The items developed for the questionnaire to be used in this study consisted of a mix of closed questions requiring univariate responses indicated by either a single or a range of multiple responses, and open-ended questions offering respondents the opportunity to comment on a particular topic.

### 3.1.3 Project instrument

The data collected in response to the questions was summarized using "Excel".

### 3.1.4 Statistical data analysis

Analysis of the demographic data was divided according to the nurse's age, gender, educational level and experience. Further data was about the nurse's general views about Internet and nurse's workplace.

## 4.1. Result of The Project

Table 1. Distribution of samples according to the Hospitals

	Hospital	Fi	%
1	Jum	39	39%
2	Fai	28	28%
3	Maw	33	33%
	SUM	100	100%

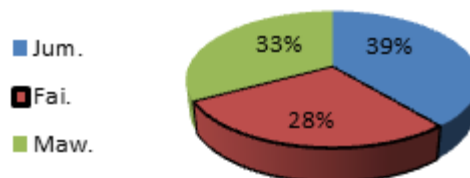


Table 1 shows the total number of nurses (100) asked about their use of Internet inside the hospital. 1-Basra General Hospital (39 nurse),2- Al Mawani Hospital (33 nurse ) and 3- Al Fayhaa Hospital (28 nurse).

Table 2. Distribution of samples according to the demography characteristic; age

Age	Fi	%
Less than 20	5	5%
20 -- 29	46	46%
30 -- 39	27	27%
40 -- 49	14	14%
50 -- 59	7	7%
60 – 69	1	1%
SUM	100	100%

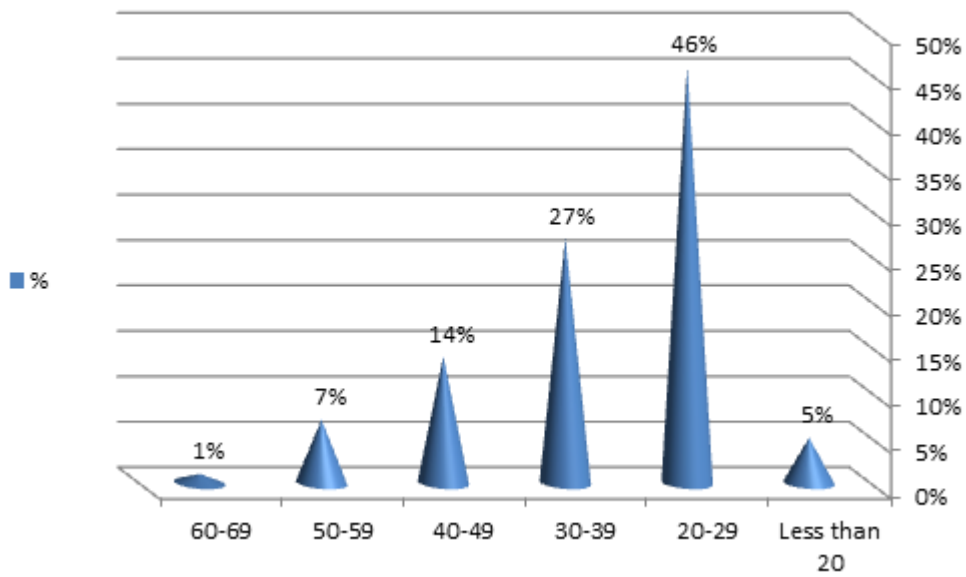


Table 2 shows age categories of nurses and their percentages, less than 20yrs (5%), 20-29yrs (46%), 30-39 yrs (27%), 40-49 yrs (14%), 50-59 yrs (7%), 60-69 yrs (1%).

Table 3. Distribution of Samples according to the Gender

Gender	Fi	%
Female	64	64%
Male	36	36%
SUM	100	100%

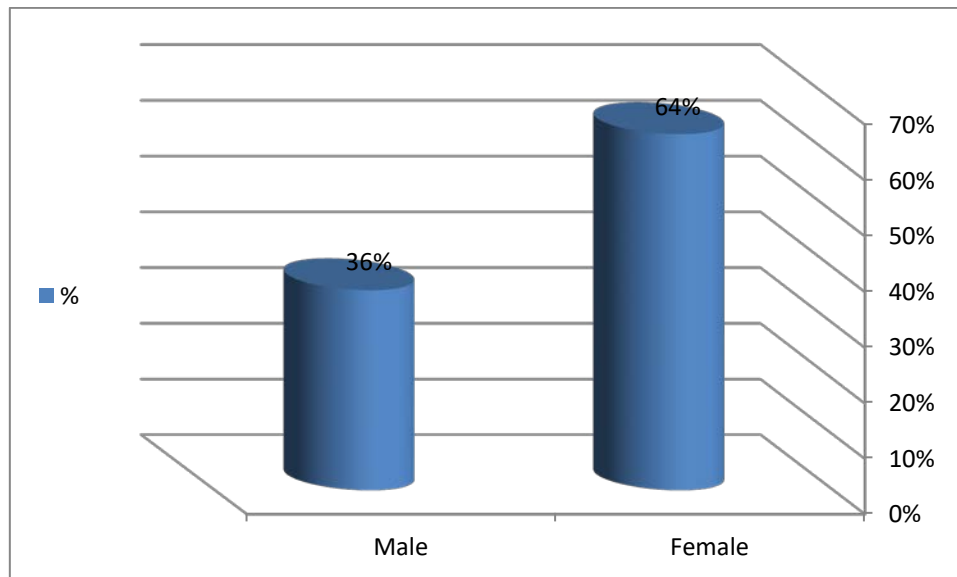


Table 3 shows classification of samples according to the nurse gender and its percentage, female were (64%) and male (36%).

Table 4. Distribution of samples according to Education Level

Edu.	Fi	%
Interm.	5	5%
Seco.	66	66%
Diploma	25	25%
BA	4	4%
SUM	100	100%

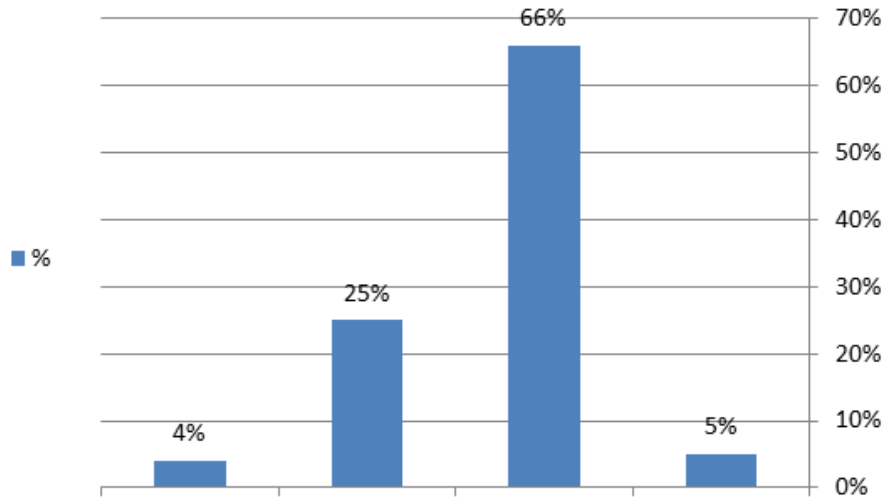


Table 4 shows classification of samples according to nurse's educational level and their percentage, Intermediate school nurses (5%), Secondary school nurses (68%), Diploma nurses (25%), and BA nurses (4%).

Table 5. Distribution of samples according to years of experience

	Years	Fi	%
1	Less than 10	62	62%
2	10 -- 19	21	21%
3	20 -- 29	11	11%
4	30 -- 39	4	4%
5	40 -- 49	2	2%
	SUM	100	100%

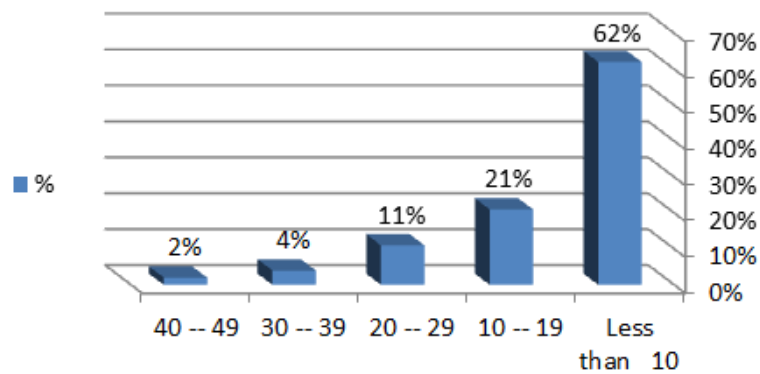


Table 5 shows classification of samples according to experience years of the nurse and their percentage, less than 10 yrs (62%), 19 -10 yrs (21%), 20-29 yrs (11%), 30-39yrs (4%) and 40-

49yrs (2%).

Table6. Distribution of answers& percentages

T. Answers	Gredit	%
	56	56%

Table 6 shows the percentage of the answers of the open end question in the questionnaire (56%) .

Table 7. Distribution & percentage of samples views about Internet

	Views	Fi	%
1	0	630	42%
2	1	870	58%
		1500	100%

Samples :

- 1- (0) refers to the positive Views.
- 2- (1) refers to the negative Views .

## 4.2. Discussion of the Result

Table (1) shows that the number of samples 100 faced the Republican Hospital (39), Fayhaa hospital (28) and hospita

Table (2) shows the percentage of nurses aged less than 20 years and over 63 and Table (3) shows the number of women 64 and the number of men 36 and Table (4) shows the level of education for the nurses, which increases the higher the teaching the greater the ability of the nurse to use Internet and Table (5) level of hospital nurse service

Through a full study of three major hospitals in Basra, there was a complete lack of nursing attendance with respect to the use of the Internet and its use in health services. The purpose of this study was to find out whenever the pathogen was a high level of education[6]. He also accepted his knowledge of the Internet. Also, the higher the life expectancy of the nurse than the average age, the greater the level of knowledge of the Internet.

## 5. Conclusions

While it is accepted that Internet information increase and develop Nurses skills and practice technology, this study is useful to know how nurses make use of Internet at hospitals and their practical life. Analysis of the findings identified a number of statistically significant correlations with respect to the age, gender, education level, and experience of nurses. This study revealed the low adoption and application for Internet use by nurses in Basra hospitals, especially in nurses aged between (41-70)yrs ,this is in result of the lack of internet knowledge in older nurses. While it began to increase by secondary school nurses, because they partially depending on Internet in their work. Internet use in female nurses is higher than male, also it increased in new practice nurses and began to decrease with increased nurses experience. By this study we also asked nurses about their opinion on Internet availability in their work setting. Most of them rejected Internet present in their work place for a variety of reasons {No opportunity available, inappropriate, choose not to use, limited time (workload)}.While other wanted to use it for a lot of reasons {Easier than other resources, helpful with nursing care, learned new sites, discus work related problems with other nurses have more experience.

## 6. Recommendations

1-Providing Internet in each hospital and setting up training courses for nurses and health workers to use it in their work.

2-Establish institutionally approved websites and online hospital program as a basis for organizing registrations, patients' names and their records on the internet.

3-Establish online classes ,websites about the hospital systems and its policies for new practice nurses and health workers.

4-Establishment of a database unit trained on artificial intelligence of the hospital. The progress in artificial learning and artificial intelligence (AI) has opened the door to predictive modeling to enhance patient care. Of the ICU surveillance systems that identify patients' vital signs and produce patient care recommendations to improve the level of nurses

## References

- [1]Susan D. Scott a,\* , Jean Gilmour a,1, Jann Fielden b,2School of Health and Social Services, Massey University, Wellington Campus, Private Box 756, Wellington, New Zealand King Faisal Specialist Hospital and Research Centre, P.O. Box 3354, Riyadh 11211, Saudi Arabia Accepted 1 June 2008
- [2]Debra M. Wolf \_1, John Wenskovitch2, Bonnie B. Anton, Chatham University, Pittsburgh, PA, United States Allegheny College, Meadville, PA, United States University of Pittsburgh Medical Center, St Margaret Hospital, Pittsburgh, PA, United States
- [3]Anne Niemi1,2, Maija Hupli2, Marita Koivunen2,3Eura Healthcare Centre, Eura, Finland; 2 University of Turku, Department of Nursing Science, Turku, Finland;Satakunta Hospital District, Administrative Centre, Pori, FinlandMarita Koivunen, Satakunta Hospital District, Administrative Centre, Satakunnan sairaanhoitopiiri, Keskustoimisto,Sairaalanatie 3, FI-28500 Pori, FINLAND.
- [4]Naser Ghazi, Gitesh Raikundalia, Janette Gogler, Leslie Bell,Identifying Nursing Computer Training Requirements using Web-based Assessment, (IJACSA) International Journal of Advanced Computer Science and Applications, Vol. 2, No. 12, 2011
- [5]Jim Blair, MA, MS, P GDipHE, BA, BSc, D ip HE, RNLD, D IP, SW, CNLD, is senior lecturer in learning disabilities, Kingston University and St. George's Hospital Medical School, London.Blair, J. (2004) assessing the value of the internet in health improvement. *Nursing Times*; 100:35, 28–30.
- [6]Ahmed A. AL-Husaunawy, Evaluation of Nurses Knowledge and Practice of Electrocardiogram Toward Adolescent Patient, *IOSR Journal of Nursing and Health Science (IOSR-JNHS)*, Volume 4, Issue 4 Ver. II (Jul. - Aug. 2015), PP 10-16