# THE IMPACT OF THE USE OF INFORMATION TECHNOLOGY ON THE TRAINING SERVICES QUALITY FROM TRAINERS POINT OF VIEW IN JORDANIAN KNOWLEDGE STATIONS

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## **ABSTRACT**

This study aimed to identify the impact of the use of information technology with its various variables (infrastructure, management support for the use of information technology, the response of individuals to the use of information technology, training programs) on the quality of training services from the point of view of trainers in Jordanian knowledge stations.

The researchers used the descriptive and analytical approach based on the comprehensive field survey of the studied population, (136) questionnaires were distributed on the studied population, 130 questionnaires were returned, and all were valid for analysis. The study found a set of results, one of them the information technology increases efficiency and effectiveness in training, and that management support was demonstrated by solving problems using information technology and its systems. The study recommended increased attention to infrastructure and intensified management support for trainers of Jordanian knowledge stations, as well as the need to adopt knowledge stations for all methods and strategies that contribute to achieving and increasing the quality of training services.

**Keywords:** Use Information Technology, Services Quality, Jordanian Knowledge Stations, Infrastructure, Management Support to use Information Technology, Member's Response to Use Information Technology, Programs Training

### INTRODUCTION

The development of the world in the era of technology and information requires keeping pace with development and updating methods in all different fields, especially in the field of training, and training is no longer limited to professional fields, but has evolved into the fields of information and communication technology, and computers have been given a traditional routine in different fields, and new technologies and training contents are remarkably advanced for societies. Despite the rapid development, developing countries are trying to keep pace with development by increasing the number of trainees in various technological fields and expanding their horizons and work without having to return to traditional jobs that no longer meet their needs and those of the labor market. Today's trainee lives with a huge amount of digital information, which makes him able to be of higher quality, efficiency and effectiveness than in the past. Despite the economic obstacles in the provision of equipment and equipment, many institutions contributed to the provision of special training places to help groups that aspire to acquire knowledge and experience and work away from costs and time drained in obtaining knowledge, and did not stop these institutions on the place but contributed and participated trainees in the development of future programs and training curricula to form an individual capable of keeping up with the development (Khlefat, 2010).

Rapid transformation and changes happened to the contemporary organization due to information and technology revolution in the last decade. The advanced scientific knowledge and computer technologies leads to the optimal uses of the resources worldwide, especially in

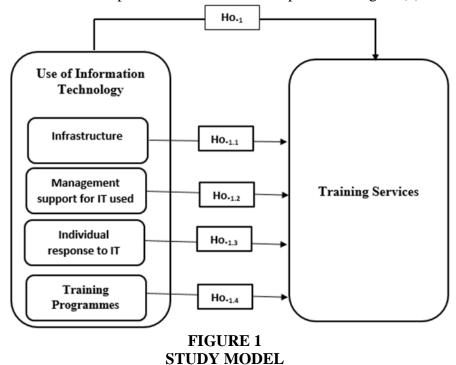
the network communications (internet). Transformation knowledge becomes a strategic source for the success or failure of any organization over all the world. (Turban et al., 2012).

Globalization has created a radical change in the work of organizations and competition in the global market, and as a result the quality of human resources has become an important factor in the process of change and development of any organization and institution, and it has to work to develop this cadre to ensure its success and its survival in the markets, and this success lies through the training process which is one of the most important and best means in the development of human resources to make them able to create careers and keep up with the world markets (Mohammad & Abdul-Ghani, 2018). The world has also witnessed great successes in the field of information technology through the scientific and technological development that has reached its peak, and has achieved great success in educational means such as interactive communication, the use of technology increases the opportunities of learning and transfer of knowledge from its sources to learners, and contributes to the achievement of the objectives of education for the individual by making him able to live with the surrounding environment and rapid technological development (Qamar, 2017).

The importance of using information technology lies in raising the quality of training services in Jordanian knowledge stations, and this importance is highlighted in the fact that training is a sustainable and indispensable process for both the trainer and individuals through which to keep up with the development, and the introduction of modern technologies and technology for the development of trainers and individuals, as well as to enhance the skills and knowledge of individuals and practically applicable.

#### Research Model

Based on the research problem, a hypothetical study model that illustrates the effect of independent variables on the dependent variable can be explained in Figure (1):



Source: The research model was developed based on the previous literature, in relation to the independent variable and its dimensions, the researchers adopted the study of both (Albkour, 2016), study (Khatalin & Shiab, 2016), study (Al-Otaibi, 2010), and study (Yasmeen, Alam, Mushtaq & Alam Bukhari, 2015) study (Arod & Shokr, 2010) and with regard to the dependent variable (quality of training services) the researchers adopted the study of both

(khalifah, 2010), study (Al-masdar, 2010) and study. Through reviewing the results of previous studies and their recommendations, the study variables and their dimensions have been linked to fit the study model in line with the study problem, its objectives, and its population, as the dimensions were not mentioned collectively in any of the previous studies.

The variables are supported as follows:

- A. Independent variable: (Information Technology) and is generated through the following dimensions:
  - 1. Infrastructure: Defined as a set of elements consisting of hardware, software, networks, databases and human resources (Laudon & Laudon, 2018).
  - 2. Management support for the use of information technology: as an integrated set of computer tools that allow decision makers to interact directly with the computer (Raman & Tewari, 2011).
  - 3. The response of individuals to the use of information technology: what the future decides to do to the message is either negative or positive, the upper limit of the response is that the future will do what the sender aims to do, and the minimum response is a decision to ignore the message or does nothing about the message (Yemen Community Development Program, 2003).
  - 4. Training programs: is one of the key entry points for personal enrichment and behavioral development to meet individual and collective performance requirements (Ali, 2004).
- B. The dependent variable: (quality of training services) as the full satisfaction of the beneficiary's needs at the lowest internal cost (Bannker & Majer, 2005). It is also an effort to provide the employee with the information and knowledge that earn him or her skill in performing the work, or to develop his skills, knowledge and experience to increase his or her competence in or after his current work to perform higher-level work in the near future (Khater, 2010).

# **Research Hypotheses**

Based on the problem of the study and its objectives, the following hypotheses have been formulated to test them:

• Ho.1: There is no statistically significant effect for the use of information technology on the quality of training services at Jordanian knowledge stations at the level ( $\alpha \le 0.05$ ).

The following sub hypotheses derived from the main hypothesis:

- Ho.1.1: There is no statistically significant effect on the quality of training services at Jordanian knowledge stations at the level ( $\alpha \le 0.05$ ).
- Ho.1.2: There is no statistically significant effect on the use of information technology (to support management) on the quality of training services at Jordanian knowledge stations at the level ( $\alpha \le 0.05$ ).
- Ho.1.3: There is no statistically significant effect on the use of information technology (personnel response) on the quality of training services at Jordanian knowledge stations at the level ( $\alpha \le 0.05$ ).
- Ho.1.4: There is no statistically significant effect on the quality of training services at Jordanian knowledge stations (training programmers) at the level ( $\alpha \le 0.05$ ).

## THEORETICAL FRAMEWORK

Organizations' interest in information technology has increased recently, This is due to its successful and significant role in various management aspects, where this technology has contributed to significant and significant changes, namely reducing the costs of production processes, improving price levels, increasing productivity and improving quality, which has contributed to increasing the competitiveness of these organizations, and achieving their objectives of survival, growth and expansion, depending on the appropriate means and tools provided by this technology.

# **Information Technology**

The concept and importance of information technology

The definitions of information technology have multiplied, according to the views of researchers and interested persons, including those who define them as: all types of devices, software, networks and databases used to receive, process, store, retrieve, print and transmit data electronically, in the form of texts, forms, sounds and images between users and related parties (Mubarak, 2004).

As he knew it (Turban et al., 2012), (Alter, 2002), as: that part that contains hardware, databases, networks, and other related devices such as printers, scanners and other related devices.

He adds (Al-Mahrat, 2011) that information technology in all aspects of life, since the beginning of the day may be information in the form of the computer we use, television to watch what is displayed, the car, the plane and many more in our daily lives, whether at home, work, or the street, as well as the contents of the papers at work, the computer or the fax machine, in fact we are immersed so that we receive, send, deal, store, organize and think about the means used to produce the necessary supplies to help the human being.

According to the researchers, information technology is the best investment for the age of technology and the information revolution from data collection to information, which facilitates the process of making different decisions through access to knowledge. Information technology has also contributed to the accurate, timely and timely access of information to organizations and individuals.

## The Concept of Information is Important and its Characteristics

Explain (Laudon & Laudon, 2018) that information is the data that has been processed, analyzed and interpreted, with the aim of using comparisons, indicators and relationships, which link facts, ideas and phenomena with each other.

He noted (Qandilji, Samarrai & Alian, 2011) that the scientific importance of information lies in:

- They are an important strategic resource that organizations rely on in the face of emergency and unstable conditions, which makes it imperative for these organizations and institutions to computerize their management information through the establishment of information systems departments.
- It helps to achieve the competitive advantage of the organization and enhances the creativity of its administrators
- It is an essential means of achieving control, regularity and rational accuracy in the completion of various administrative functions, and providing the conditions for strict application.
- The extent to which they affect the quality of decisions made depends on the validity of these decisions on the provision of information, as the effective use of information will lead to positive decisions that will help the organization succeed and achieve its objectives.

In order for the information used to be useful to those who use it, it is necessary to have a set of important characteristics, including accuracy, which reflects the ratio of correct information to the total amount of information, the format and the division of the information in form into quantity or descriptive, and to digital and information in the form of drawings and diagrams, and other summary or detailed, and the timing is one of the most important characteristics in providing information and retrieving the beneficiary in a timely manner, and the information must be objective away from, and finally, subject to verification (and finally the bias is verifiable for review and examination (Atrophy, 2003).

Variables Information technology in the current study:

The study includes a set of variables that affect in one way or another the quality of services such as infrastructure, management support for it use, individual response to IT use, training programs.

## **Infrastructure to Use Information Technology**

The IT infrastructure consists of a set of elements that have been classified by many researchers into several groups, it has been shown (Al-Mahyrat, 2011) that it elements consist of three elements: computer, connection network and database, as he sorted it out (Krajewski, et al., 2005); (Yaqup, 2013) into four components: Physical components, programs, Human resources, Application. Identified (Laudon & Laudon, 2018) with five elements: Hardware, software, databases, networks, human resources, it has been shown (Qandilji, 2010) the interaction of these elements with computing systems, including hardware, physical equipment, software and peripheral equipment, communications, especially long-range communications, data and information of various kinds, network systems including local network, extended network and world wide Web.

# Management support for Information Technology used

The basis of administrative work is to set goals and to move towards achieving these goals, but sometimes there is a gap between achieving the goals and the status quo and in order to fill this void a decision must be taken to solve a problem, and the decision in its simple sense is the process of selecting the best alternative among a range of alternatives and it achieves its objectives in itself as the input of this decision is its cost and its output is the return (Almahasneh, 2005).

Therefore, any organization has had to move towards the use of information technology and the use of support systems to make decisions that are in its interest, so Decision support systems are therefore known as a system that supports middle management and senior management in non-routine decision-making that focuses on unique and changing problems (Laudon & Laudon, 2018); Yasin (2010) is known as the information systems that support the organization's management decisions.

(Yahaya & Yusuf, 2018) adds that decision support systems help senior management make long-term decisions and this system helps to identify the problem and develop alternatives, allowing decision makers to make the right decision. The decision-making process is an integral part of organizations and data volume swells and it is difficult to deal with it in traditional ways, so it is urgently needed to deal with this data and tools are needed to help abandon the limitations of human thinking in order to save time, effort and accuracy in dealing with data (Morse, 2006).

## **Individual response to Information Technology**

An individual cannot perform or respond because of a particular stimulus unless he or she has the capacity and willingness to perform. In other words, the performance or learning required using information technology media can only be achieved if there is an innate willingness to do so and training that helps to develop it. Therefore, it is necessary when using information technology in a specific field to first make sure that the individuals have that preparation that allows them to perform and perfection, in other words, progress in that performance, otherwise the effort expended by the technology user becomes neither a result nor a return from it, nor is it useless (Ali & Hassan, 2018).

Information Technology contributes to the response of individuals through the presentation of the training material in interesting ways, and the analysis of the material well helps the interaction of individuals in the training situation, and the programs provided by information technology show the response of individuals through feedback, as happens in some training situations mastering, developing and raising the level of performance of the individual. The training position is an educational situation in which educational experiences, some of

which are intentional and direct and some occur accidentally without being intentional but sometimes very important negatively or positively, Therefore, some training methods instill and support the aspect of learning knowledge and responding to other skills such as teamwork and listening, this confirms that the learning of individuals and the change in their performance are not limited to the direct experiences demonstrated by the training program, but also include indirect learning experiences and that the repetition of any work or skill works to stabilize those responses in individuals, especially in sensory skills. Also, repetition does not lead to the stabilization of these responses simply because it is a repetition, but must be accompanied by the individual's awareness of positive results, so repetition must be accompanied by a system of weighting the effect either by itself or by others in order to have this condition available and to repeat its value in promoting the right response and the formation of the required skills (Almbaydeen & Jaradat, 2013).

# **Training Programs**

Both information, communication and knowledge interact in keeping with the development of the economic revolution, which has changed many global concepts, and this has been evident in many jobs in the labor market, where they have multiplied and focused on mental abilities and mental skills in a way that is compatible with the orientation of information technology, Therefore, it is necessary to focus on training and development programs for individuals and institutions alike in order to develop the e-economy, develop the use of information technology and new resources, and increase the competitiveness of individuals and institutions, which reflects positively on development from all different aspects (Saksaf, 2017).

The development of information technology has also created a gap between human resources skills and the performance of their use. Due to rapid and unprecedented developments in all walks of life, and the increasing and intensive reliance towards their use and strong employment in most human activities, it has become impossible for management to be alert to the development of human resources skills in the use of information technology and to attach these resources to training courses and to acquire those skills and raise their efficiency to suit the development of the technology world (Bkay & Qarqeet, 2016).

The researchers believes that information technology with its different variables cannot be based on each individual, but is a coherent group where no decision can be made by any department independent of the use of information technology and its systems, and the human resources aspect cannot be neglected either from within the organization or outside, every organization that uses information technology seeks to raise the quality of the skills of its human resources to enable them to keep up with this technology by enrolling them in training programs, and these institutions seek to gain loyalty through Providing electronic services with the highest quality and clarifying the response of individuals to information technology and showing all that is new and new.

## **Quality of Training Services**

# Quality

Quality is not an innovation of the industrial revolution as claimed by the West, but it comes primarily from humanitarian efforts, but it was in the 18th century BCE at the Babylonians in Iraq, and the best evidence of this is the regulations and laws of Hammurabi that clearly refer to quality in all areas of life (Majid & Alzyadat, 2008).

The researchers believes that the quality of training is not limited to outputs, but also the input of the training process and the way it is addressed and achieve the training objectives as well, and the training remains in the process of continuous development to keep up with the training and its mechanisms within international standards, to achieve the desired efficiency and

effectiveness and improve the training process through programs and systems that serve the trainees and the needs of the labor market.

Explained (Verna, 2003) that quality is to meet what the beneficiary expects, or exceeds expectations, and that quality is suitable for use. While (Costin, 2004) amends the definition to include the service, quality is define as the suitability of the product to meet the intended use as requested by the beneficiary. It is defined by (Kiran, 2016), as the full satisfaction of the beneficiary's needs at the lowest internal cost. Deming emphasizes that the terms of the work should not be limited to quantitative terms, but also necessary to create new approaches that combine quantity and quality together, and that the determination of digital quotas for the workers to accomplish them may affect the quality of their output, because then they will consider the completion of their tasks by completing the required quota (Dawood, 2001).

#### The Concept and Importance of Training

Training in our time is a key topic of particular importance in the development of human resources and increased productivity. Training has become a top priority for organizations, many organizations, regardless of their field of work in the public or private sector, need to identify their training needs to train their staff. Ministries, institutions, government agencies and universities spend a lot of money and effort and allocate part of their annual budget to train workers, the aim of which is to develop and develop performance and increase the effectiveness of training programs to reflect on the performance of individuals, Ensuring the continuity of the employees' careers, and developing their creativity (Ali, 2004).

There are many trends in the meaning of training, and training is an effort aimed at providing the employee with the information and knowledge that earn him or her skill in doing the work, or developing his skills, knowledge and experience to increase his or her competence in or after his or her current work to perform higher-level work in the near future (Khater, 2010).

considers (Azzam, 2006) considers that training is a type of guidance, guidance and organization in a particular art, job or profession that qualifies the targets to overcome their difficulties in their work and to be better able to transfer information, technical ideas and new practices from the theoretical to the applied level, and to work towards development and improvement. also believes (Al-Khalifat, 2010) that training is based on an investment process intended to increase the effectiveness and efficiency of the individual at work, and that it is a planned and organized activity that aims to change behaviors, knowledge, skills, and capacity development, and helps workers achieve effectiveness and sufficiency in work, behavior modification and the development of performance methods.

# **Training Objectives**

The main objectives of the training process are to increase knowledge, develop skills and change behavior for what is positive, and training seeks to raise the efficiency of workers to the extent that they enable them to perform their jobs in the best way by joining training programs, and as a result of the rapid growth in society's institutions and the tremendous change in their activities, so we realize the necessity The need for training activity and its importance for the success and sustainability of the organization. Despite the variation and multiplicity of training objectives, (Al-Kubaisi, 2005) identified the most important of these goals as follows:

- 1. Acquiring comprehensive knowledge of the work practiced by the individual to familiarize him with his work goals and activities that fall within his duties and his connection with others with whom he will work.
- Developing skills, behaviors and career methods to contribute to increasing efficiency, improving performance and employing personal experiences and abilities for the benefit of the individual, organization or society.

- 3. Providing opportunities for innovation, innovation, creativity and positive competition in search of excellence and excellence to keep pace with the spirit of the times and its developments and adapt to technology at work.
- 4. Work to increase the experience of managers, supervisors and employees and refine them, and provide them with opportunities to raise their standards and qualify them for more responsible jobs to meet the growing needs of administrative development.

The researchers believe that the training programs have a broader goal than training employees, and individuals to perform their jobs in a good way, but aims to what is more specialized and in-depth, as well as to improve the efficiency of the performance of workers and develop their knowledge and gain new experiences, skills and sciences, to reflect this on the performance and efficiency of the organization and increase its competitiveness in the economic and digital market.

# **Jordanian Knowledge Stations**

The idea of Jordanian knowledge stations crystallized from the vision of His Majesty King Abdullah II, son of Hussein al-Muzam, "our belief has always been that the Jordanian human being is the goal and the foundation of development, and our concern was focused on the importance of investing in human beings with education, training and rehabilitation, with the aim of preparing a generation of young people who are able to think, analyze, creativity and excellence, aware of their rights and duties towards their homeland and nation and keen to participate in various stages of work and construction", by shifting to the digital and knowledge economy, which was to provide the Jordanian citizen with the opportunity to use effective information and communication technology as a tool. To serve the community in all its categories with a focus on rural and remote communities with the aim of bridging the digital divide between the governorates of the Kingdom, and to develop the manpower and acquire the skills of the modern economy to increase their competitiveness in obtaining jobs and raise their practical efficiency, in order to integrate efforts to contribute to the achievement of comprehensive economic and social development at the level of population stales with direct effects on the life and well-being of the citizen (Abdullah II Ibn al-Hussein, 2001).

The literature on the subject has indicated the effectiveness of the use of information technology in many variables and aspects of the training process, information technology through its elements (infrastructure, management support, personnel response, training programs) affects the quality of training services, There is a moral impact on electronic training activity (Belhadj & Bougazzi, 2018).

The results also indicated that the dimensions of information technology have a moral impact on the dimensions of knowledge sharing, and also showed that the interaction of information technology and knowledge sharing morally affects the quality of education (Al-Bkour, 2016),

The results of the study (Shawabaka, 2005) also indicated the importance of having an impact on the factors associated with the ICDL training program (goals, content, and methods) on the trends of government employees towards the effectiveness of the program. The results also showed statistically significant differences between the trends of government employees towards the ICDL training program due to gender, scientific qualification, job level, and the nature of the job. There were no statistically significant differences between government employees' attitudes towards the ICDL training programs.

The results revealed that the use of ICT in educational work, the ways in which teachers learn and it skills are associated with individual differences in orientation towards the goal of teacher achievement (Karaseva, et al., 2018). The results of the study (Lucas et al., 2017) study revealed the importance of the workshop as the most important key criterion identified by participants, and highlighted the role of new ICT knowledge in promoting the professional growth and development of teachers by focusing on four main criteria (workshop design,

workshop content quality, workshop content delivery quality, workshop content convenience, workshop suitability).

#### RESEARCH METHODOLOGY

The descriptive analytical approach was adopted in describing the variables of the study, in order to identify the impact of the use of information technology on the quality of training services in Jordanian knowledge stations, where the curriculum aims to give an accurate picture of the phenomenon. It has been shown (Najjar et al., 2013) that the methodology of description goes beyond description and identification of characteristics sometimes to extend to the process of identifying variables related to the phenomenon, as well as providing solutions and proposals to address the problem and explain its results.

For the purposes of the study, Questionnaire was developed to measure study variables: it in its dimensions (infrastructure, management support for IT use, individual response to IT use, training) and the quality of training services that represent the dependent variable.

The study population included trainers of Jordanian knowledge stations, which are scattered in all 196 provinces of the Kingdom, and all members of the study population were selected as a sample for the study in the comprehensive survey method, where they numbered 136 trainers and trainers on their head. Accordingly, the researchers distributed 136 questionnaires to trainers, of which 130 were all suitable for analysis (95.58%) for all provinces.

#### **Research Variables**

The study is based on two variables, the first independent variable (use of information technology) at Jordanian knowledge stations, which are the following variables: (infrastructure, management support for information technology use, individual response to information technology use, and training) with a total of (34) paragraphs, and the dependent variable on the quality of training services with a total of (10) paragraphs and thus the study tool was formulated in the form of a questionnaire consisting of the final form of (44) paragraphs.

	Table 1 STABILITY COEFFICIENTS FOR STUDY TOOL VARIABLES							
Main variables	variables	Number of paragraphs	References					
	Infrastructure	8	(Al-masdar, 2010)(Al- qbelat, 2013) (Yasmeen, Alam, Mushtaq & Alam Bukhari, 2015)					
Used Information	Management support for Information Technology used	10	(Al-qbelat, 2013)(Abu slameh, 2007)					
Technology	Individual response to Information Technology	7	(al-masdar, 2010)(Alkhlefat, 2010)					
	Training programs	9	(Alkhlefat, 2010) )(Abu slameh, 2007) (Yasmeen, Alam, Mushtaq & Alam Bukhari, 2015)					
Quality	Quality of training services		(Alkhlefat, 2010) )(Abu slameh, 2007) (al-masdar, 2010)					

# **Descriptive Statistics**

Table 2 refers to the results of the descriptive census and the correlation matrix for the dimensions of the entire study. The use of information technology (infrastructure, management

support for the use of information technology, personnel response to IT use, and training) was highly favorable.

	Table 2 PERSON MATRIX FOR INDEPENDENT ITEMS									
Information Technology		Average arithmetic	Standard deviation	Infrastructure	Management support for IT used	Individual response to IT	Training programs			
1	Infrastructure	3.284	0.456	1.000						
2	Management support for IT used	3.442	0.639	0.524**	1.000					
3	Individual response to IT	4.040	0.420	0.483**	0.483**	1.000				
4	Training programs	4.066	0.522	0.376**	0.364**	0.669**	1.000			
			** At ind	ication level (α≤0.0	01)					

#### **Measurement Model**

To ensure accurate, correct and generalized results, the researchers conducted a series of tests to ensure the sincerity and stability of the study tool and the level of representation of the study paragraphs of their dimensions.

## **Instrument Validity and Reliability**

The researchers distributed the questionnaire to a few group of a sample, the face validity (pilot testing), to take a feedback from respondents. The researcher modified few questions according to the suggestions of the respondents. A final copy of the questionnaire was written and distributed to the target population after taking in consideration all recommendations. Cronbach Alpha was used to check the internal consistency, Cronbach Alpha is acceptable when the value is above (60%) (Sekaran and Bougie, 2010). In this study the value of Cronbach Alpha is (92.1 %) which is above 60%.

The values of the average variation extracted (AVE) also indicated the distinction of the study tool with convergence honesty, which exceeded all values (0.50), which is the indicator required to achieve convergence validity, and finally the study tool was characterized by discriminant validity by comparing the values of (AVE) for the dimension with the higher correlation between the paragraphs of the dimension, as the value of (AVE) must be higher than the square higher the correlation between the paragraphs of the one dimension, which is achieved in the dimensions of this study. Table (3) refers to all the above values.

Table 3 MEASUREMENT MODEL							
Construct	Item	Mean	A	CR	AVE	SQRT(AVE)> COOR2	
<b>Used Information Technology</b>							
	A1	3.808				3.708<3.284	
	A2	3.754		0.458	3.284		
	A3	3.508					
Infrastructure	A4	3.877	89.4%				
Imrastructure	A5	2.385	89.4%				
	A6	2.638					
	A7	2.623					
	A8	3.677					
Management support for	P1	2.877	85.5%	0.568	3.442	3.70<3.442	

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Information Technology used	P2	2.938				
	P 3	3.454				
	P 4	3.092				
	P 5	3.369				
	P 6	3.354				
	P 7	3.408	1			
	P 8	3.992	1			
	P 9	4.008				
	P 10	3.931				
	S1	3.785				
	S2	3.900				
To dividual manages to	S3	4.038				
Individual response to Information Technology	S4	4.162	75.9%	0.584	4.04	3.708 >4.04
information reciniology	S5	3.985	1			
	S6	4.185				
	S7	4.223				
Construct	Item	Mean	A	CR	AVE	SQRT(AVE)> COOR2
	b1	3.569		0.587	4.06	3.708 >4.04
	b2	3.969				
	b3	3.885				
	b4	4.100				
Training programs	b5	3.915	83.7%			
	b6	3.931				
	b7	4.292				
	b8	4.592				
	b9	4.338				
	C1	3.762				
	C 2	4.138				
	C 3	3.900				
	C 4	3.762				
the quality of training services	C 5	3.546	83.2%	0.584	3.874	3.708 > 3.87
the quanty of training services	C 6	3.769	03.270	0.304	3.074	3.700 / 3.07
	C 7	4.069				
	C 8	4.085				
	C 9	3.646				
	C 10	4.062				

# **Hypotheses Test Results**

This part of the study aims to test the study's hypotheses and answer question no. (3), which states, "Is there an impact of information technology on the quality of training services at the level ( $\alpha \le 0.05$ )?"

# Test the main Hypothesis

H0.1: "There is no statistically significant effect of the use of information technology on the quality of training services at Jordanian knowledge stations at the level ( $\alpha \le 0.05$ )."

Table 4 RESULTS OF THE SIMPLE REGRESSION TEST OF THE IMPACT OF IT ELEMENTS ON THE QUALITY OF TRAINING SERVICES IN JORDANIAN KNOWLEDGE STATIONS.						
Used Information Technology Standard deviation (Beta) T-Value (Sig)						
Infrastructure	0.092	0.102	1.107	0.270		
Management support for Information Technology used	0.066	0.272	4.136	0.000		
Individual response to Information Technology	0.119	0.210	1.761	0.081		

Training programs	0.088	0.358	4.063	0.000			
(R)		0.718					
(R <sup>2</sup> )		0.516					
$(R^{Adj})$		0.501					
F-value		33.327					
F-table		3.84					
DF	4						
(sig)	*0.000						
Result of the null hypothesis		Rejected					

<sup>\*</sup> The effect is statistically significant at the level ( $\alpha \le 0.05$ )

Table (4) Represents the results of the statistical test of this hypothesis model and is represented by a set of independent variables (infrastructure, management support for information technology use, individual response to information technology use, training programs) and one dependent variable (quality of training services).

The table (4) indicates that there is a statistically significant effect on the quality of training services in Jordanian knowledge stations from the point of view of trainers, through F-value (33.327) at sig (0.00).

The adjust value indicates that the use of information technology explain 50.1% of the changes of the quality of training services at Jordanian knowledge stations. The relationship between variables is considered to be strong R = (71.8%).

The results of a partial analysis of this hypothesis show that both (management support, training) combined have made a contribution to the impact on the quality of training services at Jordanian knowledge stations, which is shown through ( $\beta$ ) value of (0.272), (0.358) and T-values of (4.136). (4.063) respectively at ( $\alpha \le 0.05$ ), while (infrastructure, personnel response) didn't make a contribution to the intra-group impact shown through ( $\beta$ ) value and T values which is greater than (0.05) as shown in table (4).

Base on the above we reject the null hypothesis and accept the alternative hypothesis, where a statistically significant effect has been shown at the level ( $\alpha \le 0.05$ ) of the use of information technology on the quality of training services at Jordanian knowledge stations.

## The Result of the First Sub Hypothesis

This part of the study aims to test the first sub hypothesis derived from the main hypothesis, which states:

 $H0._{1.1}$ : There is no statistically significant effect of the infrastructure on the quality of training services at Jordanian knowledge stations at the level ( $\alpha \le 0.05$ ).

Table 5 RESULTS OF THE SIMPLE REGRESSION TEST OF THE IMPACT (INFRASTRUCTURE) ON THE QUALITY OF TRAINING SERVICES AT JORDANIAN KNOWLEDGE STATIONS.							
Used Information Technology	Standard deviation (Beta) T-value T-table (Sig)						
Infrastructure	0.094	0.550	5.830	1.96	0.000		
(R)			0.458				
(R <sup>2</sup> )			0.210				
$(R^{Adj})$			0.204				
F-value	33.989						
(sig)	*0.000						
Result of the First sub null hypothesis			Rejected				

The simple linear regression test was used with one independent variable (infrastructure) and one dependent variable (quality of training services), and the results in table (5) indicate that

a statistical significant effect at ( $\alpha \le 0.05$ ) where the sig. (0.00) was also shown through the T-value (5.830) and it's more than T-tabulated. The value of (R <sup>Adj</sup>) (0.204) which means that the infrastructure in the Jordanian knowledge stations explains (20.4%) of the changes in the quality of training services, and the relationship between the two variables is considered almost strong (R =45.8%). Based on the above we reject the first sub null hypothesis and accept the alternative hypothesis.

# The Result of the Second Sub Hypothesis

 $H0._{2.1}$ : There is no statistically significant effect to support management on the quality of training services at Jordanian knowledge stations at the level of ( $\alpha \le 0.05$ ).

Table 6 RESULTS OF THE SIMPLE REGRESSION TEST OF THE IMPACT (MANAGEMENT SUPPORT FOR IT USE) ON THE QUALITY OF TRAINING SERVICES AT JORDAN KNOWLEDGE STATIONS							
<b>Used Information Technology</b>	Standard deviation	(Beta)	T-value	T-table	(Sig)		
Management Support for IT Use	0.063	0.484	7.737	1.96	0.000		
(R)			0.564				
(R <sup>2</sup> )			0.319				
$(R^{Adj})$			0.313				
F-value			59.859				
(sig)		*0.000					
Result of the Second sub null hypothesis:			Rejected				

<sup>\*</sup> The effect is statistically significant at the level ( $\alpha \le 0.05$ )

The simple linear regression test was used with one independent variable (management support for IT use) and one dependent variable (quality of training services), and the results in table (6) indicate that a statistical significant effect at ( $\alpha \le 0.05$ ) where the sig. (0.00) was also shown through the T-value (7.737) and it's more than T-tabulated. The value of (R  $^{Adj}$ ) (0.313) which means that the support of the administration in Jordanian knowledge stations explains (31.3%) of the change in the quality of training services, and the relationship between the two variables is considered almost strong (R=0.564%). Based on the above we reject the second sub null hypothesis and accept the alternative hypothesis.

#### **Result of the Third Sub Hypothesis**

 $H0._{3.1}$ : There is no statistically significant effect of the response of individuals to the use of information technology on the quality of training services at Jordanian knowledge stations at the level of indication ( $\alpha \le 0.05$ ).

Table 7								
RESULTS OF THE SIMPLE REGRESSION TEST OF THE IMPACT (RESPONSE OF								
INDIVIDUALS TO THE USE OF INFORMATION TECHNOLOGY) ON THE QUALITY OF								
TRAINING SERVI	ICES IN JORI	DANIAN KN	OWLEDGE S'	TATIONS				
Used Information Technology Standard deviation (Beta) T-value T-table (Sig)								
response of individuals to the use of information technology	0.094	0.761	8.138	1.96	0.000			
(R)			0.584					
(R <sup>2</sup> )			0.341					
$(R^{Adj})$			0.336					
F-value			66.229					
(sig)	*0.000							
Result of the third sub null			Rejected					

hypothesis	
<u> </u>	

<sup>\*</sup> The effect is statistically significant at the level ( $\alpha \le 0.05$ )

The simple linear regression test was used with one independent variable (individual response to IT use) and one dependent variable (quality of training services), The results in table (7) indicate that a statistical significant effect at ( $\alpha \le 0.05$ ) where the sig. (0.00) was also shown through the value of T-value (8.138) and it's more than T-tabulated. The value of (R  $^{Adj}$ ) (0.336) which means that the response of individuals explains (33.6%) of the change in the quality of training services, and the relationship between the two variables is considered almost strong (R= 0.584%). Based on the above we reject the third sub null hypothesis and accept the alternative hypothesis.

## The results of the Fourth sub hypothesis

 $H0._{4.1}$ : There is no statistically significant effect at the level of indication ( $\alpha \le 0.05$ ) to train trainers on the quality of training services at Jordanian knowledge stations.

Table 8 RESULTS OF THE SIMPLE REGRESSION TEST OF THE IMPACT (TRAINING PROGRAMS) ON THE QUALITY OF TRAINING SERVICES IN JORDANIAN KNOWLEDGE STATIONS.							
Used Information Technology Standard deviation (Beta) T-value T-table (Sig)							
training programs	0.074	0.626	8.412	1.96	0.000		
(R)			0.597				
(R <sup>2</sup> )			0.356				
$(R^{\mathrm{Adj}})$			0.351				
F-value			70.762				
(sig)	*0.000						
Result of the four sub null hypothesis		Rejected					

<sup>\*</sup> The effect is statistically significant at the level ( $\alpha \le 0.05$ )

The simple linear regression test was used with one independent variable (training) and one dependent variable (quality of training services), The results in table (8) indicate that a statistical significant effect at ( $\alpha \le 0.05$ ) where the sig. (0.00) was also shown through the value of T-value (8.412) and it's more than T-tabulated. The value of (R  $^{Adj}$ ) (0.351) which means that the training using information technology in Jordanian knowledge stations explains (35.1%) the change in the quality of training services, the relationship between the two variables is considered almost strong (R=59.7%). Based on the above we reject the four sub null hypothesis and accept the alternative hypothesis.

## DISCUSSION, CONCLUSION, AND RECOMANDATIONS

#### **Discussion of Results**

According to the study of the comprehensive survey carried out by the researchers on the impact of the use of information technology on the quality of training services in Jordanian knowledge stations, the study concluded a set of results and the results were presented and compared with previous studies, and the results of the study:

The study showed that the trends of the sample elements were towards the relative importance of the use
of information technology in Jordanian knowledge stations from the point of view of trainers, the
arithmetic average was (3.708). The results also showed that the sample elements agreed to the interest of
the management of knowledge stations in the training of trainers and of high importance, this indicates the
trend of Jordanian knowledge stations to develop in the field of information technology and to attach field
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- staff (trained) to training in the field of technology and to strive to develop individuals within different environments to keep pace with the era of information technology and knowledge.
- 2. Based on the results of the analyses of questioners regarding the use of information technology, the study concluded:
  - a. The use of information technology increases the efficiency and efficiency of training through the hardware, equipment, technological systems and networks provided by its infrastructure components. It also showed that systems play a big role in controlling and controlling individuals through device controllers, which is matching with the study (Al-Bqor, 2016) that the use of information technology affects the quality of higher education, as matching with the study (Al-Hanini, 2011) that the use of information technology works to improve the quality of audit services.
  - b. The study showed the extent to which management supported the use of information technology by solving administrative problems using information systems, it also employs technology in collecting, storing and disseminating knowledge, Jordan Knowledge Stations Management also provides procedures and instructions on how to use technology and employ knowledge. This finding was not matching with a study (Abu Salima, 2007) where management support plays a major role in it development, in the End, positive management support improves training output and productivity, The result was also consistent with a study (Al-Shati, A'weys & Al-Rifai', 2015) that the follow-up of senior management in the light of the use of information technology leads to an increase in the efficiency of individuals in the use of control systems.
  - c. Jordanian knowledge stations are keen to harness information technology to develop the creative skills of individuals, and integrate them into groups that interact with each other in training programs, and responding to the systems of these programs, It also contributes to increasing the efficiency of the response to information technology through the orientation of individuals from different disciplines to keep up with modern developments, and follow-up on what is needed for the labour market and direct them towards training to use technology, This finding was matching with a study (Rochelle Irene Lusasa et al., 2017) in which the study showed that the use of information technology enhances the professional growth and development of trainees.
  - d. The results of the study showed that the training process is done effectively and positively, Information technology is of great importance in the training process and in all aspects, training methods are also used, which are compatible with the training program and individual differences are taken into account in the training. The training process is clearly objective, enhancing the competence and experience of trainers, through the acquisition of modern IT skills. This finding was matching with a (Abu Salima, 2007), the results of the study showed that the training process is done flexibly and that the UNRWA office is implementing the courses using modern methods and using qualified trainers to implement the training program.
- 3. The study showed that the quality of training services reached relative importance high from the point of view of the researchers, the different training services varied between it training programs, E-government services, the use of networks and databases in government support services, the management of knowledge stations also took into account the fees of training services due to the economic conditions that different segments of society are going through, such as the adoption of a small fee to join modern technological courses, It also sought to build a link through training programs and know the needs of individuals for various technological programs that will seek to develop individuals in different age groups and scientific, this finding matching with a study (Al-Hori, Bani Hani & Al-Scarna, 2011) because there is an impact between the use of information technology in the quality of different services as the proportions of barriers to the use of technology have varied in the quality of services.

Analysis of the gradual regression of the main study hypothesis showed that training of trainers is one of the most influential dimensions of information technology in the quality of training services, this corresponds to the fact that the quality of the training services will be achieved and increased as the level of training obtained by the trainers increases and the knowledge and skills gained from the training courses and workshops in the field of work are applied, while the response of the trainees has contributed a small share to the quality of the training services, this may justify that the response of the trainees is influenced by many factors and variables related to the personality and personality of the trainee and the nature and procedures of the training program, and the field of work.

#### RECOMMENDATIONS

#### In light of the results the researcher's made the following recommendations:

- 1- Attention to the infrastructure of some Jordanian knowledge stations should be given in terms of:
  - a. Provision of adequate and appropriate financial allocations for the equipment and equipment needed for training operations.
  - b. The Jordanian Knowledge Stations Department conducts regular and continuous maintenance and modernization of equipment and equipment with the help of specialists and technicians.
- 2- Intensifying management support for Jordanian knowledge station trainers through:
  - a. Increasing the level of support for Jordanian knowledge station management for trainers and trainees and for the training process in general, by preparing long-term plans in identifying training needs for both trainers and trainees.
  - b. Develop knowledge stations and create long-term plans in the development process, which will increase the efficiency of the training activity.
- 3- Adopt knowledge stations for all methods and strategies that contribute to achieving and increasing the quality of training services, respond to the suggestions and complaints of trainees by evaluating the training program after completion, and providing training services that meet their needs and requirements.

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