



## Performance development and its relationship to demographic variables among users of computerized management information systems in Gaza electricity Distribution Company

Mazen J. Al Shobaki, Samy S. Abu Naser

Faculty of Engineering & Information Technology, Al-Azhar University, Gaza, Gaza-Strip, Palestine

### Abstract

This paper aims to identify Performance development and its relationship to demographic variables among users of computerized management information systems in Gaza Electricity Distribution Company.

This research used two dimensions. The first dimension is demographic variables among users of computerized management information systems and the second dimension the Development of Performance.

The control sample was (360) questioners were distributed and (306) were retrieved back with a percentage of (85%). Several statistical tools were used for data analysis and hypotheses testing, including reliability correlation using Cronbach's alpha, "ANOVA", Simple Linear Regression and Step Wise Regression.

The overall findings of the current study suggested The results showed that: demographic variables among users of computerized management information systems have a positive relationship on the development of performance in Gaza Electricity Distribution Company, there were no statistically significant differences between the perceptions of respondents about performance development and its relationship to demographic variables among users of computerized management information systems in Gaza Electricity Distribution Company which attributable to gender variable, there exist a significant relationship between perceptions of the respondents for each of the resources (physical, software, and human) for computerized management information systems attributed to variable (age), there are no significant differences in the fields of (organizational resources) for computerized management information systems and (development of performance) attributable to variable (age) and that can be explained by the fact that the senior management deals with job titles not with age, there are significant differences between the perceptions of the respondents for each of the fields of resources (physical, software, and organizational) for computerized management information systems attributed to variable (educational qualification), the presence of a statistically significant differences between the perceptions of the respondents for each of the fields of "organizational resources for demographic variables among users of computerized management information systems " and "development of performance" due to the variable (years of service), there is no statistically significant differences between respondents' perceptions about the fields of resources (physical, software, and human) for computerized management information systems attributed to variable (years of service).

The study recommended the following: The need to strengthen the company's management interest in the use of computerized management information systems in all the systems components and elements as being an important variable which contributes to the development of performance. Strengthening the relationship between the users of information system and personnel systems in the department responsible for the system so that employees understand the technological and technical information needed by all users of information systems. It is essential that the company develop the infrastructure for information technology in general, and computerized management information systems, in particular for the development of performance. Increasing attention to provide material resources of equipment and devices used in the computerized management information system, and the interest in providing technical resources for management information systems keeping pace with technological means and modern techniques and work on the training of personnel to use those systems. Greater attention to human resource computerized management information systems "specialized technicians and end-users" through a variety of disciplines working in the field of computerized management information systems.

The current study is unique by the virtue of its nature, scope and way of implied investigation, as it is the first study at Gaza Electricity Distribution Company resources explores the status of demographic variables among users of computerized management information systems and their relationship to the development of performance in Gaza Electricity Distribution Company increasing interest in Computerized management information systems through continuity, keeping pace with technological means and modern techniques.

**Keywords:** Demographic variables among users of computerized management information systems, improving performance, the Development of Performance, Gaza Electricity Distribution Company

### 1. Introduction

Modern technology has supplemented computerized management information systems with new recipes to achieve enhanced performance than before, encouraging them to use their own scientific discoveries of modern technology to improve and develop its activities by increasing the

completion rate, transaction accuracy, provide customer service in line with the needs and preferences helped accountable contribute the decision-making process. It is improving the quality of decisions, increasing their value and productivity based on the information. Demographic variables

among users of computerized management information have great impact on the performance development.

Gad El Rab believes that accompanying these developments, the expansion in the use of information that computer applications has made one of its components key in order to take advantage of its large abilities which is equal to the increasing size of the organization, where it managed the importance of information systems in the benefits generated by such flexibility and speed of delivery, reduce costs and the possibility of providing useful information Systems in the appropriate time, in addition to being used on the level of administrative processes and activities at different levels. The preservation and dissemination of information is through the various aspects of the organization<sup>[19]</sup>.

Gaza Electricity Distribution Company is private and limited joint-stock company, is working on the distribution of electric power in the Gaza Strip, and looks forward to working continuously to improve and raise the efficiency of its performance by relying on computerized management information systems, which are the backbone of the administrative development, to make the results of performance in line with the company's goals.

Computerized management information systems allowed great opportunity for various business organizations in strengthening their competitiveness and achieve their desired objectives, also contributed to the development and improvement of the performance development by these systems rely on modern and sophisticated technology which enables these organizations to draw policies and directions based on real information and enable them to take correct administrative decisions, in addition to that computerized management information systems lead to develop and improve the performance of employees because of their relationship with the professional development of functional employees, and in the completion of the tasks and functions assigned to employees quickly, efficiently and with high productivity.

The expansion of the business, and the presence of large organizational structures, prompted management to build a database and a larger system of positive interaction and structured to achieve its objectives and general goals, where the pursuit of this research is to identify the weaknesses in the computerized management information system in Gaza Electricity Distribution Company, and therefore attempt to treat and then be able to develop and raise the efficiency of the performance of their employees.

So, the researchers tried through this research to answer the following main question:

What is Performance development and its relationship to demographic variables among users of computerized management information systems in Gaza Electricity Distribution Company?

The objective of this study is to:

- To identify the perceptions of employees in Gaza Electricity Distribution Company toward demographic variables among users of computerized management information systems.
- To recognize the effect of demographic variables of computerized management information systems and the development of performance in Gaza Electricity Distribution Company in accordance with gender.

- To identify consequence of demographic variables of computerized management information systems and the development of performance in Gaza Electricity Distribution Company in accordance with age.
- To discover the relation of demographic variables of computerized management information systems and the development of performance in Gaza Electricity Distribution Company in accordance with educational qualification.
- To find out upshot of demographic variables of computerized management information systems and the development of performance in Gaza Electricity Distribution Company in accordance with years of services
- To provide recommendations and suggestions to help improve performance by enhancing the use of computerized management information systems in Gaza Electricity Distribution Company.

The current study draws on the literature to explore this topic in depth and then turns to an implied investigation to assess and determine the most influential variables.

In view of the literature review, the study raises the questions of:

**Q1.** Is there a relationship between demographic variables among users of computerized management information systems and the development of performance in Gaza Electricity Distribution Company?

**Q2.** Are there differences between the perceptions of respondents about demographic variables among users of computerized management information systems related to the development of performance in Gaza Electricity Distribution Company, attributed to gender?

**Q3.** Are there differences between the perceptions of respondents about demographic variables among users of computerized management information systems related to the development of performance in Gaza Electricity Distribution Company, attributed to age?

**Q4.** Are there differences between the perceptions of respondents about demographic variables among users of computerized management information systems related to the development of performance in Gaza Electricity Distribution Company, attributed to educational qualification?

**Q5.** Are there differences between the perceptions of respondents about demographic variables among users of computerized management information systems related to the development of performance in Gaza Electricity Distribution Company, attributed to years of service?

As for originality, the current study is unique by the virtue of its nature, scope and way of implied investigation, as it is the first study at Gaza Electricity Distribution Company that explores demographic variables among users of computerized management information systems.

## 2. Literature review

### 2.1 Computerized Management Information Systems Resources

AL-Gharbaoui reached to a positive relationship between the computerized health information systems and the level of functionality for those working in health centers [9]. Zinedine and Ajrami reached that electronic programs contribute to raising the performance levels and productivity of the workers at the Deanship of Admission and Registration in Al-Azhar University in Gaza, and that the software used in the deanship contributed to the selection of a qualified elements in the field of information technology [30]. Abu Karim concluded that the devices are the main requirement of computerized management information systems working to improve management performance systems, followed by users who are using information systems, then performance improvement, and software, while the least impact on information systems: technician specialists and databases. The results clarified that the response by the employees in the systems is high, and responding to maintenance by employees in systems is high, the results showed that the devices used are flexible enough, that the devices currently in use is one of the best and latest technology available, the management and operation of the databases is featuring high capability on the addition and modification, the management and operation of databases is characterized by high capacity storage, and there is statistically significant differences between the management information systems and the improvement of administrative performance attributed to years of service [1]. Al-Araby showed a statistically significant differences relationship between the use of information technology and (performance size, quality of performance, efficiency, simplify the work). The study also showed no statistically significant differences relationship between the use of information technology and fast task, no statistically significant differences about the impact of the use of information technology on job performance attributable to the variables (gender, educational qualification). In contrast, there were statistically significant differences about the impact of the use of information technology on job performance attributable to the variables (age, seniority, functional category) [6]. AL-Saraireh showed that the functionality of the faculty level was high, the researchers recommended that the universities to strengthen the functionality of faculty members, to identify their needs and desires to achieve the possible ones to satisfy them, and provide an incentive system, promotive, physical gifts, and moral, as they have a positive impact in maintaining the level of job performance high [16]. Myeong and Choi reached a positive change to the impact of information technology on decision-making policies [26]. Al-Otaibi concluded that there is clarity in a sample study of the importance of the use of information technology in human resource management, senior management supports the transition to the use of information technology to the management of human resources, provide adequate infrastructure to help in the use of information technology in management human resources, there are no statistically significant differences between the perceptions of the respondents attributed to demographic variables (gender, educational qualification, experience, functional level) [13]. Dweik showed that the computerized information health system currently used in the Gaza European Hospital has good effect on medical and

administrative fields of the business as well as the medical and administrative decisions, and that there are constraints limit the effectiveness of health information systems and most important of them: the weakness of funds required [18]. Al-Halabi concluded that the computerized management information systems requirements (physical, software, human and organizational) enjoys a high from the viewpoint of respondents efficiently, as the study found that there is no statistically significant relationship on the impact of computerized management information systems on the decentralization of the Ministry Finance in Gaza Strip due to demographic variables (gender, age, experience, educational qualification career, the scientific level) [10]. AL-Tahravi found that the existence of specialized human resources management departments by (67%), non-governmental organizations provide financial resources to the development of the capacity of its staff internally and externally, and it will help them in the development of educational and academic standing, as well as an existing performance appraisal system on the basis of the bonus system [17]. AL-Omari found the presence of impact that statistically significant with the requirements of the operation and management information systems (physical, software, human, organizational) on the performance of employees in the telecommunications company, and statistically significant differences between the perceptions of the respondents on the subject of the study are due demographic variables (scientific level, years of experience, the workplace, the functional level), and the presence of good level of material resources, human resources, software resources and organizational resources. [12]. Supattra and Boonmak concluded that the administrative information and information technology increase the organization's effectiveness and efficiency of their performance and improve the strategic work in systems, when one rely on management information technology and information systems, the greater the efficiency of the organization and increased effectiveness and the better the culture of workers in the organization about the efficiency of performance and effectiveness [28]. Al-bshabshah reached to the presence of significant impact to the quality of information systems on the raising level of functionality, the presence of a strong statistically significant differences between the information systems of various dimensions and functionality of a relationship, the presence of a strong significant impact of software supplies on functionality, and there are significant statistical differences between the perceptions of the respondents attributed to (age, educational qualification, functional level) [7].

### 2.2 Computerized Management Information Systems

Computerized management information systems are the use of computers in the assembly and operation of the storage and dissemination of information, and notes that computers including content of the hardware and software serves as the tools you use certified information systems at Computer [27], management information systems is a comprehensive system works to collect all the information necessary for all management functions with the aim of administrative support private managers by providing in time clear and accurate information to help them plan and organize their work and thus take appropriate decisions in order to provide the necessary information, as others added to the definition of

computerized information systems [11]. The importance of computerized management information systems is highlighted in the fact that its main task is to provide the necessary data and processed to produce useful management information, in a timely manner, accurate and appropriate quantity and commensurate with the needs of decision-makers [23]., the information as a storage of the organization, including addressed from the information that allows configures of a historical description of their conditions, discovery of easy errors that might occur, which means that information systems should bring confidence to surveillance to be effective coordination and communication between the various interests through exchange of information and documents associated with the various flows, and because of their role in helping in the decision-making process by finding a basis or foundation for the analysis of the initial warning signs that stand out both internally and externally [20]. As well as helping to improve performance by increasing the speed of completion and accuracy of transactions, provide customer service in line with their needs and desires also help by reporting provided to support the process which make decisions and thus improve the quality of decisions and increase their value and productivity based on the information provided and the associated productivity organization [7]. The importance of management information systems for organizations classified into three main roles: support pilot operations, support decision making by managers, and support the development and implementation of strategies to achieve competitive advantage, also the importance of management information systems lies in the support of the organization and supporting basic operations [24].

**2.3 Computerized Management Information Systems and the Development of Performance**

The development of performance in organizations is linked to the optimal use of financial and human resources available in the organization through the use of appropriate methods to achieve the objectives of the organization and therefore based on clear and objective goals doable to achieve the best level of performance [14], it is not limited to the use of this organization on a field without the other but are used in organizations at the senior management level are strategic and competitive dimension, used on the middle management level, where useful in processes of implementation and described the information here as a tactical dominated by the character of repetition, also used on the lower level of management so as to enhance the monitoring process of direct

and supervise the conduct of repeated operations [31]. Therefore, the researchers believe that the computerized management information systems help in the development of performance where they help to speed decision-making on a sound basis provided real information, adequate and in timely manner, and provide information to the various administrative levels and help departments in operations planning, control, regulation, facilitate administrative communication between all administrative levels, and help the organization in strategic planning, opening of new markets, working to increase the efficiency of the performance of staff development the development of management techniques, make the best investment of the available data, the speed of completion of transactions and accuracy, reduce cost, and improve the level of service, as well as take advantage of the electronic devices in the analysis, display and save information.

Performance development and its relationship to demographic variables among users of computerized management information systems in Gaza Electricity Distribution Company lead to the following main hypothesis in this study:

**H1:** There is statistically significant relationship between demographic variables among users of computerized management information systems and the development of performance in Gaza Electricity Distribution Company.

**H2:** There is statistically significant differences between the perceptions of respondents about demographic variables among users of computerized management information systems related to the development of performance in Gaza Electricity Distribution Company, enhance personal variables (gender, age, educational qualification, years of service).

**3. Research design**

**3.1 Study Population and Sampling**

This study conducted at Gaza Electricity Distribution Company. It is highly reputable one and established in 1991. The population is (1022) employees, the control sample (733). The usable sample was (520), which makes response rate (71%).

The sample of the study was selected using random sampling from different management levels where all levels are affected by demographic variables among users of computerized management information systems, the study sample size was (360) questionnaires, (360) questionnaires were distributed on study participants, (306) were returned back with a percentage of (85%). Table 3 shows the properties and characteristics of the study sample.

**Table 1.** Distribution of members of the study population according to the personal data (n = 306)

Characteristics and personality traits		The number	Percentage%
Gender	Male	224	73.2%
	Female	82	26.8%
Age	Less than 25 years	9	2.9%
	From 25 years to less than 35 years	88	28.8%
	From 35 years to less than 45 years	149	48.7%
	From 45 years and over	60	19.6%
Educational qualification	High school or less	10	3.3%
	Intermediate Diploma	56	18.3%
	BA	192	62.7%
	Graduate Studies	48	15.7%
Years of service	Less than 3 years	23	7.5%
	From 3 years to less than 6 years	34	11%



	From 6 years to less than 10 years	29	9.5%
	From 10 years and over	220	72%

Table 1 shows that most of the study sample aged (35-45 years), and that most of the study sample of graduates, where the proportion who hold a diploma or higher education has reached (96.7%), the rate is normal in the company that provide electricity distribution services and other advanced services which require workers with educational qualification, and that the majority of the company's employees are highly experienced workers with 6 years and over of experience reaching (%81.5).

**3.2 Research Instrument**

The first dimension referring to the model used in the study is demographic variables among users of computerized management information systems and the second dimension of the instrument is the development of performance. The authors with the help of other research literature [2, 8-10, 14-15, 25, 29-39] prepared the questionnaire.

A five-point Likert scale of agreement was used for measurement, running from "Strongly Agree" to "Strongly Disagree", with a Neutral category for scale midpoint.

**3.3 Search Tools**

The researchers prepared a questionnaire for the "Performance development and its relationship to

demographic variables among users of computerized management information systems in Gaza Electricity Distribution Company."

**3.4 Structural Validity**

The degree to which is a test measures what it claims, or purports, to be measuring. It shows the relevance of each field of study to the overall degree of the questionnaire paragraphs. Table 1 shows that all correlation coefficients in all fields of the questionnaire are statistically significant at the level of significance ( $\alpha \leq 0.05$ ) and therefore the questionnaire fields are considered to be valid to what it was supposed to measure.

**3.5 Validity and Reliability Assessment**

The study adopted Cronbach's  $\alpha$  to measure the internal consistence reliability of the questionnaire. The results showed that Cronbach's  $\alpha$  value for all dimensions were  $> (0.05)$ . It indicated that the design of the questionnaire had a high internal consistency.

The researchers used Alpha Cronbach method to measure the stability of the questionnaire, and the results were as shown in Table 2.

**Table 2:** Alpha Cronbach test results to measure the stability of the questionnaire

No.	The field	Cronbach's alpha coefficient
1.	Physical resources for computerized management information systems	0.863
2.	Software resources for computerized management information systems	0.895
3.	Human resources for computerized management information systems	0.803
4.	Organizational resources for computerized management information systems	0.897
5.	The performance of employees	0.926
6.	All fields of the questionnaire	0.958

Table 2 showed that the value of Cronbach's alpha coefficient was high for each field of the questionnaire ranging from 0.803 to 0.926. As well as the value of the alpha coefficient for all the paragraphs of the questionnaire was (0.958). This means that the reliability coefficient is high, so that the researchers were certain about the reliability and validity of the questionnaire, which made them confident about suitability of questionnaire for analyzing the results and answering questions of the study and testing of the hypotheses.

**3.6 Statistical Procedures**

The researchers used the questionnaire data for analysis through statistical analysis software (SPSS). Nonparametric statistical tests were used because Likert scale is a main statistical measure which used the following tools:

Percentages, frequencies, and relative arithmetic average are mainly used for the purpose of knowing repeated variable categories, and benefit researchers in the description of the study sample.

1. Cronbach's Alpha Test was used to determine the stability of the paragraphs of the questionnaire.
2. Spearman Correlation Coefficient to measure the degree of correlation. This test is used to study the relationship between the variables in the case of nonparametric data.

3. Sign Test to see whether the average degree of responsiveness has reached a degree of neutrality, a 3 or not.
4. Mann-Whitney Test to see whether there were statistically significant differences between two fields of ordinal data.
5. Kroskal-Wallis Test to see whether there were statistically significant differences between the three fields or more of the ordinal data.
6. Multi-linear regression model.

**4. Data analysis and discussion of results**

**H1:** There is statistically significant relationship between demographic variables among users of computerized management information systems and the development of performance in Gaza Electricity Distribution Company.

**H2:** There is statistically significant differences between the perceptions of respondents about demographic variables among users of computerized management information systems related to the development of performance in Gaza Electricity Distribution Company, enhance personal variables (gender, age, educational qualification, years of service).

The use of "Man-Whitney test", which is suitable for comparing averages of two sets of data, to see if there is a statistically significant difference. "Kroskal- Wallace" test

was used also to see if there is a significant statistical differences and this test used for comparing the averages of 3 or more data sets.

There exist statistically significant differences that showed the perceptions of the respondents about the development of performance and its relationship to some demographic variables among users of computerized management information systems in Gaza Electricity Distribution Company due to the variable of gender.

The following table shows that by using the "Man- Whitney" test shows that the probability value (Sig.) for all fields of study were greater than the significance level ( $\alpha \leq 0.05$ ) and

then there is no statistically significant differences between the perceptions of respondents about performance development and its relationship to some demographic variables among users of computerized management information systems in Gaza Electricity Distribution Company due to the variable gender. This result explains that both genders do the same business and rely on the same computerized management information systems requirements, therefore, the impact of these systems on the performance of both genders is the same.

**4.1 The results of the second main hypothesis - Gender:**

**Table 3:** The relationship of demographic variables among users of computerized management information systems to performance development in Gaza Electricity Distribution Company, due to the variable (Gender).

The field	Test value	Potential value
Physical resources for computerized management information systems	0.941	0.347
Software resources for computerized management information systems	0.475-	0.635
Human resources for computerized management information systems	0.850	0.396
Organizational resources for computerized management information systems	0.974	0.330
All demographic variables among users of computerized management information systems	0.832	0.405
The Development of Performance	0.157	0.247

**Third:** There are differences in the response of respondents to the study attributed to the variable age.

The following table illustrates that using Kroskal- Wallace shows that the probability value (Sig.) is greater than the significance level ( $\alpha \leq 0.05$ ) for all fields and then there are no statistically significant differences between the perceptions of respondents about these fields due to the variable age.

This can be explained in that the provision of financial support, information and training to be by job rank as well. As for the development of performance, those with small business employees are characterized by the novelty of science and speed of learning while aged employees have significant expertise advantage, thus, there will be no difference in the effect of management information systems and the development of performance due to age. This is consistent with the study of Al-Otaibi, which concluded that there were no statistically significant differences between the perceptions of the respondents attributed to demographic variables (gender, educational qualification, experience, job rank) [13].

The current study disagree with study results of Al-Araby, which showed that there were statistically significant differences about the impact of the use of information technology on job performance attributable to the variables (age, fiscal seniority, job category) [6], as well as also disagreed with the study of AL-Omari, which reached to the presence of statistically significant differences between the perceptions of the respondents on the subject of the study due to demographic variables (scientific level, years of experience, the workplace, the job rank) [12], as well as also disagreed with the study of Al-bshabshah which concluded that there are significant differences between the perceptions of the respondents differences attributable (age, educational qualification, job rank) [7].

**4.2 The results of the second main hypothesis - Age:**

**Table 4:** Relationship of demographic variables among users of computerized management information systems to develop performance in Gaza Electricity Distribution Company, due to the variable (age).

The field	Test value	Degrees of freedom	Potential value
Physical resources for computerized management information systems	1.761	3	0.078
Software resources for computerized management information systems	0.588-	3	0.557
Human Resources for computerized management information systems	0.046	3	0.963
Organizational resources for computerized management information systems	0.936	3	0.350
All demographic variables among users of computerized management information systems	0.574	3	0.566
The Development of Performance	0.514	3	0.607

There exist statistical differences among respondents attributable to the scientific qualification.

The following table shows that by using Kroskal - Wallace shows that the probability value (Sig.) for each of the fields, "the material resources for computerized management information systems", "programming resources for computerized management information systems",

"organizational resources for computerized management information system" and "all the fields of systems resources for computerized management information" was less than the significance level ( $\alpha \leq 0.05$ ) and then there exist a statistically significant differences between the perceptions of respondents about these fields due to the educational qualification. This is a natural result, where the employees who do not have

scientific degrees and needs physical and software requirements deal less than experienced staff with scientific qualification who need higher physical and software requirements, and thus need greater financial support from the senior management as well as their needs for more accurate information and more recent software and hardware.

As for the fields of "human computerized management information systems resources " and "performance development" shows that the probability value (Sig.) was greater than the significance level ( $\alpha \leq 0.05$ ) and then there are no statistically significant differences between the perceptions of respondents about these fields attributed to the

educational qualification. This because the information system is maintained and followed-up remotely and this does not require a scientific level by the staff, as well as for the development of performance as the company's employees have the level of their job and their performance and their dealings with the computerized management information system, each according to educational qualification, thus there is no relationship for the scientific level on the perceptions of the respondents on performance development.

**4.3 The results of the second main hypothesis - Educational qualification:**

**Table 5:** The relationship of demographic variables among users of computerized management information systems to develop performance in Gaza Electricity Distribution Company, due to the variable (educational qualification).

The field	Test value	Degrees of freedom	Potential value
Physical resources for computerized management information systems	12.920	3	0.005*
Software resources for computerized management information systems	13.530	3	0.004*
Human Resources Computerized Management Information Systems	5.135	3	0.126*
Organizational resources to computerized management information systems	8.423	3	0.038*
All demographic variables among users of computerized management information systems	11.210	3	0.011*
The Development of Performance	3.858	3	0.277*

\*The difference between the averages are statistically significant at the level of significance ( $\alpha \leq 0.05$ ).

**4.4 The results of the second main hypothesis - years of service:**

Table 5 using Kroskal - Wallace shows that the probability value (Sig.) from the fields of "organizational resources for computerized management information systems" and "performance development" was less than the significance level ( $\alpha \leq 0.05$ ), then there is a statistical significant differences between the perceptions of the respondents on these two fields, due to the variable years of service. For each of the fields: "the material resources for computerized management information systems", "software resources for computerized management information systems", "human resources requirement" and "all fields of computerized management information systems' resources", the study shows that the probability value (Sig.) was greater than the level significance ( $\alpha \leq 0.05$ ), then there is no statistically significant differences between the perceptions of respondents about those fields due to the variable of years of service. This is a natural result that the years of service have a significant impact on the development of performance, and employees with long-experience have greater relationships with senior management and with all other organizational levels. This is consistent with the study of Zinedine and Ajrami, which concluded that there is no statistically significant

differences at the significance level between the job performance of employees and using electronic programs due to the variable (years of services) [30], also agrees with the study Al-Otaibi, which concluded that there were no statistically significant differences between the perceptions of the respondents attributed to the variable (experience) [13], also agrees with the study of Al-Halabi, which concluded that there is no statistically significant relationship on the impact of computerized management information systems on decentralization in the Finance Ministry in the Gaza Strip due to variable (experience) [10].

And disagreed with the findings of a study Abu Karim, which reached to statistically significant differences between the management information systems with improve management performance due to the variable of years of service [1]. and also disagreed with the study Al-Araby, which showed that there were statistically significant differences about impact of the use of information technology on job performance attributable to the variables (age, fiscal seniority, job category) [6], and also vary with the study AL-Omari, which reached to statistically significant differences between the perceptions of the respondents on the subject of the study due to the variable (years of experience) [12].

**Table 6:** The relationship of demographic variables among users of computerized management information systems to the Development of Performance in Gaza Electricity Distribution Company, due to the variable (years of service).

The field	Test value	Degrees of freedom	Potential value
Physical resources for computerized management information systems	4.893	3	0.180
Software resources for computerized management information systems	2.196	3	0.533
Human Resources computerized management information systems	7.565	3	0.056
Organizational resources to computerized management information systems	9.796	3	0.020*
All demographic variables among users of computerized management information systems	5.714	3	0.126
The Development of Performance	15.852	3	0.001*

\*The difference between the averages are statistically significant at the level of significance ( $\alpha \leq 0.05$ ).

**4.5 Multiple linear regression model:**

The use of multiple regression model to test the relationship between management requirements and operation of management information systems and the development of performance and creating an equation linking them.

**Table 7:** Results of Stepwise- multiple linear regression

Dimensions	The parameter value	The value of t	Potential value
Fixed amount	2.167	10.983	0.000
Human Resources Computerized Management Information Systems	0.188	3.805	0.000
Organizational resources to computerized management information systems	0.152	2.678	0.008
Physical resources for computerized management information systems	0.130	2.660	0.008

Stepwise was used to find the best equation of the line multi-regression. It was found that the three dimensions listed by their effect on development of performance: human resources for computerized management information systems, organizational resources for computerized management information systems, and Physical resources for computerized management information systems. But software resource for computerized management information systems has been excluded from the form because it is ineffective on the development of performance according to Stepwise, and can be explained by the existence of many variables which have greater influence resource for computerized management information systems and the development of performance.

The coefficient of determination is equal to (29%). This means that 29% of the variation in the development of performance can be explained by the previous regression multiple linear equation and this ratio is considered acceptable in human studies. The remaining (71%) perhaps go back to other variables that may affect independent of the organization in the development of performance.

Notes from the former table: probability value of each of the three dimensions is: (0.00), (0.008), (0.008), respectively, which is less than the significance level ( $\alpha \leq 0.05$ ) and so there is substantial relationship for each of the three dimensions and the Development of Performance.

**5. Conclusion**

The results showed that: demographic variables among users of computerized management information systems have a positive relationship on the development of performance in Gaza Electricity Distribution Company, there were no statistically significant differences between the perceptions of respondents about performance development and its relationship to demographic variables among users of computerized management information systems in Gaza Electricity Distribution Company which attributable to gender variable, there exist a significant relationship between perceptions of the respondents for each of the resources (physical, software, and human) for computerized management information systems attributed to variable (age),

there are no significant differences in the fields of (organizational resources) for computerized management information systems and (development of performance) attributable to variable (age) and that can be explained by the fact that the senior management deals with job titles not with age, there are significant differences between the perceptions of the respondents for each of the fields of resources (physical, software, and organizational) for computerized management information systems attributed to variable (educational qualification), the presence of a statistically significant differences between the perceptions of the respondents for each of the fields of "organizational resources for demographic variables among users of computerized management information systems " and "development of performance" due to the variable (years of service), there is no statistically significant differences between respondents' perceptions about the fields of resources (physical, software, and human) for computerized management information systems attributed to variable (years of service).

Based on previous results, researchers suggest a set of recommendations that could lead to the development of performance through demographic variables among users of computerized management information systems in Gaza Electricity Distribution Company are as follows:

The need is to strengthen the company's management interest in the use of computerized management information systems in all the systems components and elements as being an important variable which contributes to the development of performance.

Strengthening the relationship between the users of information system and personnel systems in the department is responsible for the system so that employees understand the technological and technical information needed by all users of information systems.

It is essential that the company develop the infrastructure for information technology in general, and computerized management information systems, in particular for the development of performance.

Increasing attention to provide material resources of equipment and devices used in the computerized management information system, and the interest in providing technical resources for management information systems keeping pace with technological means and modern techniques and work on the training of personnel to use those systems.

Greater attention to human resource computerized management information systems "specialized technicians and end-users" through a variety of disciplines working in the field of computerized management information systems.

**6. References**

1. Abu Karim. Relationship management information systems to improve administrative performance - a field study on the application of non-governmental organizations in the Gaza Strip, Master Thesis (unpublished), Faculty of Economics and Administrative Sciences, Al-Azhar University, Gaza, Palestine, 2013.
2. Abu Naser SS, MJ Al Shobaki. Enhancing the Use of Decision Support Systems for Re-Engineering of Operations and Business-Applied Study on the Palestinian Universities, Journal of Multidisciplinary



- Engineering Science Studies (JMESS). 2016; 2(5):505-512.
3. Abu Naser SS, MJ Al Shobaki. Requirements of using Decision Support Systems as an Entry Point for Operations of Re-engineering in the Universities (Applied study on the Palestinian universities in Gaza Strip), World Wide Journal of Multidisciplinary Research and Development. 2016; 2(4):32-40.
  4. Abu Sheikha N. Human Resource Management, Dar Al Safa for publication and printer, Jordan, the first edition, 2000.
  5. Ahearne M, Schillewaert N. The effect of Information Technology on Salesperson Performance E Business Research Center, 2001.
  6. Al-Araby A. The impact of the use of information technology on the job performance of workers in the local government field study at the University of Rqlh-Algeria, Faculty of economic and business sciences easing, magazine researcher, Tenth Issue, 2012.
  7. Al-bshabshah S. The impact of the quality of management information systems to raise the performance of the functional level of the Jordanian Social Security Corporation, Accounting and Management magazine, insurance, Oman, 2005, 10(1).
  8. Alfoazin R. Modern information systems and their impact on the performance of employees, a survey in the Customs Authority in the Kingdom of Saudi Arabia, the study of MS, Jamvh Nayef Security Sciences, Riyadh, Saudi Arabia, 2003.
  9. AL-Gharbaoui MH. Computerized health information and its relationship to performance Alozivy- field study systems on UNRWA primary health centers in the Gaza Strip, a study Master (unpublished), Al-Azhar University, Gaza, Palestine, 2014.
  10. Al-Halabi DA. Computerized management information systems and their impact on the decentralization Empirical Study on the Finance Ministry in the Gaza Strip," Master Thesis (unpublished), the Islamic University, Gaza, Palestine, 2010.
  11. AL-Hassania SI. Management Information Systems", Second Edition, Warraq Foundation Publishing and Distribution, Amman, Jordan, 2002.
  12. AL-Omari A. Impact of computerized management information systems personnel in the performance of the Palestinian telecommunications company, Master Thesis (unpublished), the Islamic University, Gaza, Palestine, 2009.
  13. Al-Otaibi A. The impact of the use of information technology on the performance of human resources at the Australian Academy in Melbourne, and the impact on job performance, the study of MS (unpublished), the British Arab Academy for Higher Education, London, 2010.
  14. Al-Othman M. The delegation of authority and its impact on the adequacy of performance, Master Thesis (unpublished), Naif Arab University for Security floated, Riyadh, Saudi Arabia, 2003.
  15. Al-Quds Open University), Management Information Systems, Al-Quds Open University Press, Jordan, 2007.
  16. AL-Sarairah KA. Job performance among faculty members in the Jordanian public universities from the perspective of the department heads, Mutah University, the University of Damascus magazine, Jordan, 2003.
  17. AL-Tahrawi AM. The role of human resources development strategies in the institutional development of performance in the non-governmental organizations in Gaza, Master Thesis (unpublished), Faculty of Commerce, the Islamic University, Gaza, Palestine, 2010.
  18. Dweik M. The impact of computerized health information systems on administrative and medical decisions - Empirical Study on the Gaza European Hospital, Master Thesis (unpublished), Faculty of Commerce, the Islamic University, Gaza, Palestine, 2010.
  19. El Rab GS. Information Systems Managment- basics and administrative applications, Press Ashri, Ismailia, Egypt, 2008.
  20. Guendlchi AA. Management Information Systems, ninth edition, Dar march publishing, distribution and printing, Amman, Jordan, 2009.
  21. Guendlchi A, Al-Janabi IA. Management Information Systems, the first edition, Dar march for Publishing and Distribution, Amman, Jordan, 2005.
  22. Laudon KC, Traver CG. Management Information Systems, Prentice Hall, 12th, 2012.
  23. Idris T. Management information systems in contemporary organizations, Dar University, the first edition, Alexandria, Egypt, 2007.
  24. Kurdish MM, Adley JI. Introduction to Management Information Systems, the new University House, Egypt, 2003.
  25. Muasher Z, Fertile M. The impact of organizational and technical factors Ge administrative information systems applications in the Jordanian banking sector, Jordan Journal of Business Administration, Oman, 2006, 2(4).
  26. Myeong S, Choi Y. Effects of Information Technology on Policy Decision-Making Processes, Some Evidences Beyond Rhetoric, Administration & Society 2010; 42(4):41-45.
  27. Sultan I. Mangement Information Systems - administrative entrance, University AL Dar, Alexandria, Egypt, 2000.
  28. Supattra B. The Influence of Management Information System and Information Technology on Management Performance and Satisfaction, 7th global conference on Business and Economics, 2007.
  29. Suwailem S. The fields of the use of functional performance evaluation in the security services, a survey on working in the security services at King Khaled International Airport, Nayef Security Sciences Academy, master thesis (unpublished), the Kingdom of Saudi Arabia, 2003.
  30. Zinedine O, Al-Ajrami A. The reality of the electronic programs used in the Admission and Registration at the University of Al-Azhar Gaza to improve the functionality of their workers from their point of view, the paper Agesah introduction of the Third Conference Thirty-Arab organization responsible for the Admission and Registration at universities in Arab countries, Arab Academy for Science and Technology and Maritime transport in Alexandria AASTMT, Egypt, 2013.
  31. Al-Salem S, Makkawi NM. The impact of the structural characteristics in the effectiveness of information systems field study in Jordan's contribution to industrial

- companies, Jordan Journal of Applied Sciences. 2004, 7(1).
32. Abu Naser SS, Al Shobaki MJ, Abu Amuna YM. Knowledge Management Maturity in Universities and its Impact on Performance Excellence "Comparative study, Journal of Scientific and Engineering Research. 2016; 3(4):4-14.
  33. Naser SS A, Al Shobaki MJ, Abu Amuna YM. Measuring knowledge management maturity at HEI to enhance performance-an empirical study at Al-Azhar University in Palestine. International Journal of Commerce and Management Research 2016; 2(5):55-62.
  34. Naser SSA, ALmursheidi SH. A Knowledge Based System for Neck Pain Diagnosis. World Wide Journal of Multidisciplinary Research and Development (WWJMRD) 2016; 2(4):12-18.
  35. Naser SA, Al-Dahdooh R, Mushtaha A, El-Naffar M. Knowledge Management in ESMDA: Expert System for Medical Diagnostic Assistance. AIML Journal. 2010; 10(1):31-40.
  36. Naser SA, Zaqout I, Ghosh MA, Atallah R, Alajrami E. Predicting Student Performance Using Artificial Neural Network: in the Faculty of Engineering and Information Technology. International Journal of Hybrid Information Technology. 2015; 8(2):221-228.
  37. Naser SSA. Predicting learners performance using artificial neural networks in linear programming intelligent tutoring system. International Journal of Artificial Intelligence & Applications 2012; 3(2):65.
  38. Atallah RR, Naser SSA. Data Mining Techniques in Higher Education an Empirical Study for the University of Palestine. IJMER 2014; 4(4):48-52.
  39. Abu Naser SS, Sulisel O. The effect of using computer aided instruction on performance of 10th grade biology in Gaza. J Coll. Edu. 2000; 4:9-37.