

Administrative Communication and Its Impact on Improving the Efficiency of Decision Support Systems in Palestinian Higher Education Institutions

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Abstract: **Research Objective:** The aim of the research is to identify administrative communication and its impact on improving the efficiency of decision support systems in universities. **Society and Sample of Research:** The research was applied to Islamic University- Gaza, and the sample of the academic research consists of administrative positions at Islamic University- Gaza, totaling 87 employees. **Research Methodology:** A descriptive and analytical approach was used and secondary data was obtained through a questionnaire that was distributed to the research community using the comprehensive enumeration method. The questionnaire was distributed to all members of the study population, and 65 questionnaires were retrieved with a recovery rate of 79.3%. **Research Results:** The research concluded with a set of results, the most important of which are:

1. The results confirmed the existence of a positive statistically significant relationship between administrative communication and improving the efficiency of decision support systems at Islamic University- Gaza.
2. The results showed a statistically significant effect of administrative communication in improving the efficiency of decision support systems at Islamic University- Gaza.
3. The results confirmed that there are statistically significant differences between the averages of the respondents' answers about administrative communication and improving the efficiency of support systems at Islamic University- Gaza that are attributed to the job title.
4. The results showed that there are no statistically significant differences between the average of the respondents' answers about administrative communication and improving the efficiency of support systems at Islamic University- Gaza decision, due to (age group, academic degree, and years of service).

Research Recommendations: The research reached a set of recommendations, the most important of which are:

1. The importance of universities reformulating procedures, the nature of work and the organizational structure in these universities in a way that improves the application of administrative communication, as well as working to reduce centralization, avoiding duplication, red tape and repeated oversight, in a way that contributes to improving the level of performance and achieving goals, and implementing strategic and operational plans.
2. The necessity of adopting the principle of integration in the work of information technology and moving away from duplication, and continuing administrative communication and feedback to reveal any developments, and building an information technology platform that provides an opportunity for universities to use it as an infrastructure in administrative communication.
3. The need for higher management of universities to pay attention to decision support systems, and to make intensive and continuous efforts to support and enhance efforts aimed at enriching and enhancing the role of decision support systems in universities.

Originality of The Research: The research was distinguished as an addition in the field of administrative communication and the field of support systems, as it was interested in studying administrative communication and a course in improving the efficiency of decision support systems at Islamic University- Gaza.

Keywords: Administrative Communication, Decision Support Systems, Universities, Palestinian Universities.

Introduction

Challenges at the global and regional levels have caused a radical and accelerating transformation in all aspects of life, in addition to what resulting from the information and communication technology revolution and the resulting abolition of distance, time and space and the availability of a vast amount of information for decision-makers. (Gad Al-Rab, 2010: 155) which requires decision-makers in many cases to research continuously to identify the variables and challenges that affect the acceleration of development and scientific development and increase productivity (Al Shobaki et al., 2019).

Decision support systems are one of the important types of computer-based information systems that are increasingly used in decision-making. The decision support system helps the decision maker find a good formula for decisions, semi-defined or structured problems and situations that have predetermined procedures that can be considered a basic procedure in Decision support system in addition to situations that occur in a rare or infrequent manner (Gad Al-Rab, 2009: 80-81).

Problem Statement

The researcher noticed the extent of the challenges related to the development of universities, which are represented in the

weakness of workers' ability to effectively employ information technology in the decision-making process (Al-Masry, 2007), as decision support systems are among The most important information systems, and these systems are used, especially in support of semi and other decisions. It is characterized by its integration between information technology and operations research, which contributes to supporting decisions at all stages of decision-making, and the applications of these systems vary between organizational planning and risk management, and the effectiveness of these systems depends on several factors, the most important of which is the amount of support from senior management, in addition to the availability of technology and mechanisms, conscious management, specialized human cadres.

And through the researcher's review of a set of previous studies related to the research topic, including the study (Al-Tayeb, 2015), which showed that the decision support systems used in companies are commensurate with the needs of upper and middle management, and the strategic decision-making process fully supports, and the Abu Dhabi study (Al Shobaki et al., 2019), which confirmed that Palestinian universities have a clear organizational structure that supports support decision systems, and since universities in Palestine seek to develop, they have sought to study the skills, abilities and competencies that enable them to deal with current and future requirements.

Based on the above, the research problem is determined by the following question:

What is the role of administrative communication in improving the efficiency of decision support systems at Islamic University- Gaza?

Research Objectives

This study aimed at identifying administrative communication and a course in improving the efficiency of decision support systems at Islamic University- Gaza, and its impact on its performance by achieving the following objectives:

1. Presenting the concept and reality of administrative communication and the tasks and activities associated with it in light of recent technological developments, which higher education institutions may adopt.
2. Demonstrate the importance and need for universities to apply administrative communication related to decision support systems, as one of the approaches to improving academic and administrative services and raising their efficiency.
3. To shed light on the extent to which Palestinian universities have the dimensions of decision support systems, and to show the effectiveness of the current systems used in producing information needed for decision-making in universities.
4. He drew the attention of decision-makers and officials to the importance of paying attention to decision support systems, so that they could deal with the accelerating changes on the various aspects of his speech entries that

have proven successful in developing and distinguishing higher education institutions.

5. Detecting whether there are statistically significant differences between the averages grades of members (academics with an administrative position) about the research axes with different (gender, age group, academic degree, years of service, job title).
6. Submit a number of recommendations of interest to decision-makers to enhance the use of decision support systems in Palestinian universities.

The Importance of Studying

The study derives its importance from its subject matter, and can specify aspects importance studying from contributes and addition expected them, and as follows:

First Of: The Importance of the Theory:

1. Highlights the importance of this theoretical study of scientific enrichment, which are adding to the studies that T. ways T to the subject of decision support systems and administrative communication, and the importance of the variables dealt with and which represent topics speech constitutes the general orientation of the outstanding organizations of.
2. This study derives its importance from a vital topic that T. eating, and relative scarcity, which is the subject of modernity and scientific excellence and practical on the both.
3. This study sheds light on administrative communication and its effect on improving the efficiency of decision support systems in universities, which contributes to developing and increasing the efficiency of universities.
4. The study provides a scientific reference that can guide workers in Palestinian universities, especially the higher administrative levels, to face challenges in making strategic decisions.

Second-Importance from the Practical (Application) Point Of View:

1. Hopes the researcher that the dissemination of the results of the study on this (14) recognized by the University by the Ministry of Education and Higher operating in the State of Palestine.
2. The current study represents a feedback, according to its results to get to know what contribute In promotion aspects Power and avoid weaknesses.
3. Providing the higher management of Palestinian universities with documented recommendations and proposals drawn from the field study that help improve administrative communication and have an impact on improving the efficiency of decision support systems in universities.
4. This study gives scientific assessment of universities on the subject of decision support systems and administrative and impact of communication in improving the efficiency of decision-support systems in universities, thus contributing to the development of the efficiency and performance of universities and upgrading the academic and administrative level..

5. The study practically T made recommendations and proposals for decision-makers in the Palestinian universities to develop communication management, which helps to achieve the development of regulations of the university academic and administrative.

Research hypothesis

In order to provide an appropriate answer to the scholarly questions raised, the study seeks to test the validity of the following hypotheses:

Ho1: There is a statistically significant relationship at the level of significance ($\alpha \leq 0.05$) between administrative communication and improving the efficiency of decision support systems at Islamic University- Gaza.

Ho2: There is a statistically significant effect at the level of ($\alpha \leq 0.05$) for administrative communication in improving the efficiency of support decision systems in Islamic University- Gaza.

Ho3: There are statistically significant differences at the level of significance ($\alpha \leq 0.05$) between the averages of respondents' responses about administrative communication and improving the efficiency of decision support systems in Islamic University- Gaza due to personal and organizational data (Age Group, Academic Degree, Years Of Service, Job Title).

The Limits of the Study

For each study, whether scientific or theoretical, objective boundaries, human boundaries, institutional boundaries, spatial boundaries, as well as temporal boundaries, and they can be explained as follows:

1. **Subjective (Academic) Limit:** limited studying at Alone
The objective is to study administrative communication and its effect on improving the efficiency of decision support systems in Palestinian universities, and to present proposals that contribute to activating the role of decision support systems in Palestinian universities in Gaza Strip.
2. **Human Limit:** have been conducting the study on the staff of the academic position of administrative in Islamic University- Gaza.
3. **Institutional Boundary:** The study was conducted on Islamic University- Gaza.
4. **Spatial Limit:** The study was conducted in the State of Palestine, specifically in Gaza Strip, where the researcher designed the questionnaire and distributed it to academic workers in an administrative position.
5. **Time Limit:** The study was conducted, primary data were collected on Palestinian universities, and statistical analyzes were conducted in the year (2022).

Theoretical Framework

First-The Conceptual Framework for Administrative Communication

Communication is the art of transmitting information, ideas and attitudes from one person to another (Al-Mousa, 2009: 23). Communication can be defined as the process by which a specific message-an alarm-is sent and who is a target sender,

using more than one method and through specific communication means (Obaidat, 2004:253).

And it depends An image Essential On capacity Administration In adopting channels Effective and continuous communication With friends Interests within the organization and beyond, where Communication process is considered Necessary to achieve the Stability of t Organizational, and necessary to stabilize a t success Administrative work within the university (Al Shobaki et al., 2019).

The importance of administrative communication as a vital and essential process for every organization is shown in the following points (Abu Salmiya, 2012: 18-19):

- Administrative communication helps to achieve and accomplish the goals of any organization, depending on the efficiency of the existing administrative communication and the technologies used in it.
- It leads to the exercise of power and the organization of workflow in institutions.
- Administrative communication is a good way to unify the various efforts in the organization and work to bring about a change in the behavior of employees, and to consolidate the relationship between them and the institution.
- Educating individuals in society about the organization's goals and activities. Good administrative communication helps in consolidating the relationship between the organization and those individuals working in it, and introducing them to the economic and social conditions in which the organization operates.
- Contribute to facilitating the work of supervision.
- Communication in general in its various forms is considered to be of a high degree of importance in the organization. Studies and research have indicated that administrative communication represents approximately (%75) of the activity in the organization distributed in all its forms, formal and informal.

It is clear to the researcher in the light of the above that contact the administrative vital and dynamic processes, and overlap in all other administrative processes, and facilitate its work, which is an essential indispensable necessity for all individuals, and in all the m organizations.

Second-Frame of Conceptual Support Systems

The main concept of decision support systems is that they represent a relatively new way of thinking using computers for administrative purposes. They are computer-based systems designed with the aim of improving productivity and increasing efficiency by supporting decision-makers and policy makers, and these systems are applied in long-term planning fields. (Term, strategic planning, analysis of organizational mergers, policy development, portfolio management, etc. (Al-Kurdi and Al-Abd, 2003).

Organized Resolution support characterized Flexible, and interacting with users With high efficiency, It is designed to support the creators Decisions at Environment Unconfirmed and unconfirmed Structural, and considered Software lists E

of examples of the most common of the use of Support systems the decision (Yassin, 2006: 25).

By reviewing a set of definitions of decision support systems, we find that (Al-Kurdi and Al-Abd, 2003) has been known as interactive information systems provide managers with information, forms, and data processing tools that help them in the decision-making semi-structured and unstructured, in those circumstances in which no one knows exactly what is the decision to be taken. While he defined it (Mustafa and Nabil, 2006: 351) as an extension of management information systems that provide managers with the tools and data they need to make decisions, while systems provide management information and routine structural information needed to make administrative decisions, then the field of decision support systems. It helps managers to solve unstructured and non-routine problems.

Importance of decision support systems:

Decision support systems of different generations have emerged due to the objective need for departments to have techniques and tools to support complex decisions that are subject to conditions of risk and uncertainty, as it is an effective mixture of human intelligence, information technology and software that interact with each other in order to solve complex problems, and the importance and benefits of these can be summarized. The systems are as follows (www.caoa.gov.eg) :

- Decision support systems are distinguished by their development from other information systems by integrating technology and operations research within the framework of the decision-maker's competence.
- Increasing the number of alternatives and the possibility of choosing the optimal alternative from among the set of tested alternatives by providing a more rapid sensitivity analysis and a faster response. It can provide support for a series of interconnected decisions, providing support for all stages of the decision-making process.
- Better understanding of the business, enabling decision-makers to see relationships, which can be used to prepare a comprehensive business picture.
- Quick response to unexpected situations, easy review of forms and quick view of variables.
- The ability to perform analysis for a specific purpose, providing a set of various technical means and methods for preparing analyzes for specific purposes.
- Improve communication and control, communication channels are documented and improved, and plans more consistent and calculation procedures Stylized.
- Saving time and costs, shortening office work and reducing overtime, and thus saving costs.
- Better decisions, collective action better, effective and better use of the resources of the data.

The researcher believes that the use of decision support systems provides advanced information technologies that lead to the organization obtaining an important advantage over all its competitors who do not use these systems and technologies.

Goals and principles Organized Support Resolution:

Decision support systems have many benefits, including the ability to support solutions to multiple problems, quick reactions to unexpected situations that result from a change in circumstances, support the decision-making process and facilitate its completion, improve administrative control, reduce the cost of decision-making, improve management effectiveness through Make quick and accurate decisions (Al-Salmi, 2003), In decision support systems are designed to solve problems in Dziaha semi-structural and non-structured, to assist managers in separate places and parts of the problem to be able to use their expertise and judgment to solve them through the basic components namely : data management systems, models, knowledge, and meet the users (Al-Omari and Al-Samarrai, 2008).

Types of decision support systems

There are two types of decision support systems as follows:

- A. A decision support system directed according to models: the use of a mathematical model to perform repeated operations, to find alternatives to decision outputs, and this type is characterized as having a special use and is separate from the information systems of the organization, i.e. it is represented by ready-made software that is used for specific purposes (Al-Najjar, 2007: 125).
- B. A data-oriented decision support system: This type is characterized by a great ability to analyze a large volume of data, which enables the decision maker to obtain the necessary information for decision-making, and this data can be analyzed using immediate analytical processing and data mining (Al-Najjar, 2007: 126).

Decision support systems have been divided into three types according to the user of the system (Al-Kurdi and Al-Abd, 2003: 311), which are as follows:

1. Individual decision support systems: They are based on having an individual user perform the same activities in making decisions that may be repeated over different time periods, such as choosing stocks or bonds.
2. Collective decision support systems: in which the focus is on the existence of a group of individuals as users of the systems, and each of them is responsible for performing tasks that are independent of those performed by others, but linked to it to a high degree.
3. Organizational decision support systems: the focus is on performing organizational tasks that include the sequence of processes belonging to different functional areas, such as decisions related to long-term planning, the process of allocating resources and the process of assigning tasks.

Decision support systems can be classified as follows

(Yassin 2006: 112-112):

1. Decision support systems with limited orientation: These are field and function specific systems to help managers make decisions effectively and flexibly.
2. Institutional decision support systems: They are complete systems that are developed in order to allow the decision maker to retrieve or generate information related to a problem of a general nature and deal with repeated

decisions periodically, which are used for relatively long periods.

3. Decision support systems generators: These generators are designed to assist the decision maker in generating fast applications for decision support systems that have limited potential compared to institutional decision support systems, but they are characterized by rapid development, generating reports, and performing analyzes very quickly, using the fourth generation languages. With infrequent periodic problems such as strategic planning decisions.
4. Decision support systems tools: These tools are designed to assist in the development of decision support systems with limited capabilities compared to the previous two types. Examples of these tools are the electronic spreadsheet package, the ability to generate graphs, and limited database processing.

Third - Higher Education in Palestine:

The efficiency of the performance of universities expresses the intended activity or effort that aims to introduce a set of changes in the capabilities and capabilities of the educational institution that helps it raise its performance by setting goals, and improving the efficiency of university performance is the main motivation for universities to achieve their goals, distinction, and improve their reputation in society, and university performance is related. The ability of universities to employ information technology to improve academic and administrative processes, and the increasing demand for higher education, and the widespread spread of communications and information technology are among the variables affecting universities, and their effects were reflected on university performance.

Despite the increasing growth of information technology in general and decision support systems in particular, there are many challenges facing their application in Palestinian universities that need experts, developing content, and providing protection for information security.

Islamic University:

Islamic University- Gaza is an independent academic institution of higher education institutions, and Islamic University- Gaza Governorate was established in (1978) based on the Palestine Religious Institute (Al-Azhar), to meet the needs of the people of Gaza Strip in graduating academic staff, and it works under the supervision of the Ministry of Education and Higher Education, and it is a member In the Association of Arab Universities, the Association of Islamic Universities, the Association of Mediterranean Universities, and the International Federation of Universities, and they have cooperative relations with many Arab and foreign universities (www.iugaza.edu.ps).

The following table shows the sample of academics working in an administrative position at the Islamic University during the year (2022).

Table 1: Distribution of employees from the research sample of the Islamic University

| Gender | Univ ersit y's Presi dent | Vice Pres ident Of The Uni vers ity | Assi stan t Pres ident Of The Uni vers ity | De an | De put y/ Ass ista nt Dea n | Dir ect or | Hea d Of The Depa rtme nt | T ot al |
|---------------|---------------------------------------|--|---|----------|--|------------------|--|---------------|
| Mal e | 1 | 4 | 6 | 1 7 | 18 | 2 | 35 | 83 |
| Fem ale | - | - | 1 | 1 | - | - | 2 | 4 |
| T ot al | 1 | 4 | 7 | 1 8 | 18 | 2 | 37 | 87 |

Source: The data of the Personnel Affairs Department at the Islamic University.2022 ,

* **Note /** All academics in an administrative positions in the Islamic University are those with a doctorate degree

Previous Studies

- Study of (Mir Anamul and Daniel, 2019) aimed at selecting the appropriate supervisor for the PhD is a very important step for the student. This paper introduces a multi-criteria decision support system to help students make this choice. The most important results of the study were that the system uses a hybrid method that first uses an ambiguous analytical hierarchy process to extract the relative importance of the specified criteria and sub-criteria that must be taken into account when choosing a supervisor. Then an information similarity algorithm based on information retrieval is applied to retrieve relevant candidate profiles based on the student's research interest. The selected profiles are then rearranged based on other relevant factors selected by the user, such as post history, research grant history, and collaboration history. The ranking method objectively evaluates potential supervisors based on various metrics that are determined in terms of detailed knowledge of the scope, making it part of the automated decision-making process. In contrast to other established businesses, this system does not require the participation of the professor nor does it use subjective procedures.
- Study of (El Talla et al., 2018), which aimed to identify the organizational structure and its relationship to the prevailing communication pattern in Palestinian universities. The researchers used the descriptive and analytical method through a questionnaire distributed randomly to workers in Palestinian universities in Gaza Strip. The study was conducted on a sample of (274) administrative employees from the three universities, and the response rate was (81.87%). The study found that there is a great satisfaction with the nature of the organizational structure in Palestinian universities from the point of view of the administrative staff, as it reached

- 68.05%. And that there is a high level of the prevailing communication style from the point of view of the administrative staff, as the percentage reached (71.32%), there is a direct relationship between the nature of the organizational structure and the prevailing communication style, and the absence of differences between the sample members according to the gender variable in their perception of the nature of the organizational structure and the prevailing communication style, There are no differences in the employees' perception of the nature of the organizational structure and the prevailing communication pattern according to the changing age. There are statistically significant differences in the perception of the nature of the organizational structure and the type of communication depending on the scientific qualification variable in the organizational structure, and the type of communication. The differences were in favor of diploma holders compared to other practical qualifications. The absence of differences in the employees' perception of the nature of the organizational structure and the style of communication depending on the variable of years of service. The absence of differences in the employees' perception of the nature of the organizational structure and the style of communication depending on the variable of the functional level (manager, head of department, administrative official). The absence of differences in the employees' perception of the nature of the organizational structure and the pattern of communication according to the workplace variable. And the existence of differences in the employees' perception of the nature of the organizational structure and the pattern of communication according to the university in which they work. And that there are statistically significant differences between the Islamic University and Al-Azhar University, and the nature of the organizational structure and communication pattern in favor of the Islamic University. And that there are statistically significant differences between Al-Azhar University and Al-Aqsa in the prevailing communication pattern in favor of Al-Azhar University.
- Study of (El Talla et al., 2018) which aimed to shed light on the nature of the organizational structure prevailing in public universities in Palestine and to identify the most important differences in the perceptions of workers in Palestinian public universities according to demographic and organizational variables. The researchers used the descriptive and analytical approach through a questionnaire distributed randomly to a sample of Al Aqsa University affiliates. The study was conducted on a sample of (80) administrative employees from Al-Aqsa University. The study found that there is a moderate degree of satisfaction with the nature of the organizational structure prevailing in the Palestinian public universities from the point of view of the administrative staff at a rate of (63.11%). There are no differences between the sample members according to the gender variable in their perception of the nature of the structure prevailing at Al Aqsa University, and there are no differences in their perception of the nature of the organization based on the age variable. And that there are statistically significant differences in the perception of the elements of the organizational climate's dependence on the variable of scientific qualification in their perception of the nature of the organization structural in favor of holders of a Bachelor's degree, and the absence of differences in their perception of the nature of the organizational structure depending on the changing years of service, and the absence of differences in their perception of the nature of the organizational structure according to Changing career level (manager, head of department, administrative manager).
 - Study of (Al Shobaki and Abu Naser, 2017) aimed to identify the degree of use of decision support systems capabilities in Palestinian higher education institutions, Al-Aqsa University in Gaza - a case study. The study used the descriptive and analytical approach, and the researchers used the questionnaire tool to collect data. The researchers used a stratified random sample distributed (150) questionnaires over the study population, and (126) were obtained again with a rate of 84%. The study indicated that the most important results are: that the senior management supports the existence of decision support systems and that there is agreement from the respondents on the paragraphs of using the capabilities of decision support systems in general. And that there are no statistically significant differences between the average of the respondents' answers about the degree of use of the capabilities of decision support systems attributed to personal data.
 - Study of (Abu Naser and Al Shobaki, 2016) study, which aimed to enhance the use of decision support systems and re-engineering processes and business - an applied study in Palestinian universities in Gaza. This study was applied to the Palestinian University in Gaza Strip, Palestine. This research relies on decision support systems. The second dimension reengineering of processes and business was developed by the authors. And the control sample reached (500). Several statistical tools have been used to analyze data and test hypotheses. The results indicate that there is no statistically significant effect on supporting senior management to enhance the use of decision support systems in re-engineering operations and business in the universities of Gaza Strip, and the results indicated that there is a significant impact on the impact of the type of decision support systems used to enhance the use of decision support systems in re-engineering Operations and business in Palestinian universities in Gaza Strip, and there are statistically significant differences between the average of the study sample estimates of the impact of re-engineering decision support systems for operations and business in Palestinian universities in Gaza due to the

gender variable in favor of males, and the existence of differences in the age variable in relation to the field of "senior management support for the use of support systems The decision by respondents (45-55 years) and (55) years or more, and the existence of differences in the education level variable in the field of "supporting senior management for the use of decision support" by respondents with a master's degree, and the existence of differences in the variable name of university systems and that all The field of study for the benefit of the Islamic University, Al-Azhar University, and Al-Aqsa University, and the existence of differences in the variables of the years of service in the field of "supporting senior management for the use of decision support systems" by Al-Mabah And then those between the ages of (15-20) years and 21 years and over. The present study is unique by virtue of its nature, scope, and method of implicit investigation.

- Study of (Abu Naser and Al Shobaki, 2016) study, which aimed to identify the use of decision support systems as an entry point for re-engineering operations in Palestinian universities in Gaza Strip. The researchers used the questionnaire method to collect data, and the researchers used a stratified random sample, and (350) questionnaires were distributed over the research sample, and (312) questionnaires were collected (89.1%). The results of the study showed that the most important of them are: There is a statistically significant effect at the level of significance ($\alpha \leq 0.05$) for physical and human requirements. Technical and regulatory requirements. The results also showed that there are statistically significant differences between the averages of the study sample estimates on the use of decision support systems as an entry point for re-engineering operations in Palestinian universities in Gaza Strip due to the variable of gender in Saleh. Male requirements. The results also showed that there are differences in the name of the university variable and each field of study in favor of the Islamic University, then Al-Azhar University, and then Al-Aqsa University.
- Study of (Al Shobaki and Abu Naser, 2016) study which aimed to identify decision support systems and their role in developing strategic management in universities - case study: Islamic University- Gaza. A descriptive approach was used where a questionnaire was developed and distributed to a stratified random sample. (230) questionnaires were distributed and (204) questionnaires with a response rate of (88.7%). The most important results of the study: There is a positive correlation with statistical significance between decision support systems and strategic management in Islamic University- Gaza, and this shows that there is a role for decision support systems in developing strategic management. The top management is convinced of the importance of the strategic management of the organization, and this conviction drives a clear understanding of the strategic management development process and thus led to

commitment to this process to improve its performance. There is an impact on the strategic management of the capabilities available to use decision support systems, and the type of decision support systems to be used, while there is little impact on supporting the top management to use decision support systems. The results also showed that there were no statistically significant differences between the mean of the respondents' answers due to the personal data.

- Study of (Al Shobaki and Abu Naser, 2016) study which aimed to explain the requirements for implementing decision support systems in Palestinian higher education institutions - an applied study on Al Aqsa University in Gaza. The researchers used the descriptive and analytical approach. The study population is the faculty of Al-Aqsa University in Gaza. The researchers used the random sampling method. 150 questionnaires were distributed to the study population and 126 responses were obtained with a recovery rate (84%). The results of the study showed the following: - The approval of the sample members of the requirements of implementing decision support systems in general. The approval rate for "supporting senior management for the use of decision support systems" is (62.60%). While the percentage of approval for "possibilities to use decision support systems" (69.03%). Finally, the level of approval for the type of decision support systems used was 69.73%. The results showed that there were no statistically significant differences between the respondents' responses to the requirements of applying decision support systems due to demographic variables (gender, age, qualification, years of service).
- A study (Al-Tayeb, 2015) aimed at identifying the impact of decision support systems on strategic decision-making. The most important results of the study were the decision support systems used in companies that are commensurate with the needs of higher management, and the strategic decision-making process fully supports, and that the senior management supports the efforts of employees to design decision support systems, and the management evaluation makes the decision support systems process part of the overall organizational development process.
- Study of (Al-Buhairi, 2015), which aimed to identify the role of re-engineering of administrative processes in improving administrative performance in the Palestinian Ministry of Health in Gaza Strip, and to know the extent of the availability of the basic requirements necessary to implement re-engineering of administrative processes, and their impact on improving administrative performance. The most important results of the study were the availability of the basic requirements necessary to apply the re-engineering of administrative processes, and this means the availability of the minimum of those requirements, represented in (strategy, support for senior management, information technology, administrative communication, employee empowerment, readiness for

change). There is a direct relationship between applying the principles of re-engineering administrative processes in the Palestinian Ministry of Health in Gaza Strip and improving administrative performance by improving (quality of performance, simplification of work, volume of performance, speed of completion, and efficiency of performance).

Commentary on previous studies and their analysis:

By reviewing the previous studies, it became evident to the researcher that there is an increasing interest in decision support systems and administrative communication, and the current study was concerned that all studies should be recent to represent the reality present in our time, which is characterized as a rapidly developing and changing reality. Through the presentation and analysis of previous studies, the current study reached a set of the following conclusions and observations:

❖ **Aspects of agreement and difference between the current study and previous studies**

- A. In terms of the study’s purposes and objectives: The previous studies focused on linking administrative communication on the one hand and computerized information systems on the other hand, without addressing decision support systems alone and administrative communication alone. The researcher was not able to obtain a study that linked Decision support systems with administrative communication.
- B. In terms of the method used in the study: The previous studies as well as the current study used the descriptive and analytical method as the method of the study, because this approach has characteristics that fit the naturalness of the current study, as it depends on studying the reality accurately, and depends on the description of the phenomenon under study.
- C. In terms of the study tool: The studies agreed to use the questionnaire as a main tool for the study.
- D. In terms of the community and the sample of the study: Most of the previous studies highlighted administrative communication or decision support systems in governmental and industrial institutions and the scarcity of studies in universities. Researchers in previous studies have chosen their study population in line with the nature of the study. Targeted are academics with a management position.

❖ **What distinguishes this study from previous studies:**

This study is in addition to the existing studies that examined the variables of decision support systems and the variables of administrative communication, the research sample is Islamic University- Gaza, and the examination unit is academics with an administrative position, and from the above, the basic features of this study can be explained from others as follows:

- 1. The importance of the university education sector, and the need to develop academic and administrative systems in universities.

- 2. The practical aspect, which took place at Islamic University- Gaza.
- 3. It differs in the time domain from the previous studies conducted in this field.
- 4. The viewpoint of all academics in an administrative position has been taken from (university president, vice chancellors, assistants to the university president, assistants to vice presidents, faculty deans, deputy or assistant dean, directors, deputy directors, head of departments) in Islamic University- Gaza.
- 5. Studies related to decision support systems and administrative communication are still few. The studies dealt with topics including information technology, its success factors, its requirements and its relationship with organizations.
- 6. The researcher seeks to benefit from the summary of previous studies in presenting a theoretical model for decision support systems and administrative communication, which were discussed.

Field study

Study methodology and procedures

Study population and sample: The study population is represented by the academic staff in the administrative position of Islamic University- Gaza, whose number is 87 employees, and the researcher used the comprehensive enumeration method, where the questionnaire was distributed to all members of the study population and 65 questionnaires were retrieved with a recovery rate of 79.3%.

Description of the characteristics of the study sample

The following is clear the distribution of the study sample according to the personal and organizational data of the individuals in it:

Table 2: Distribution of the study population according to personal and organizational data (n = 65)

| Personal And Organizational Data | | The Number | Percentage % |
|----------------------------------|-------------------------------------|------------|--------------|
| Age Group | Less than 30 years old | - | - |
| | 30 years old-less than 40 years old | 15 | 23.1 |
| | 40 years old-less than 50 years old | 27 | 41.5 |
| | 50 years or more | 23 | 35.4 |
| Qualification | BA | 15 | 23.1 |
| | M.A. | 27 | 41.5 |
| | PhD | 23 | 35.4 |
| Years Of Service | Less than 5 years old | 5 | 7.7 |
| | 5 years-less than 10 years | 12 | 18.5 |
| | 10 years-less than 15 years | 10 | 15.4 |
| | 15 years and over | 38 | 58.5 |
| Job Title | University President | 1 | 1.5 |
| | Vice President of the University | 2 | 3.1 |

| | | |
|--------------------------|----|------|
| Assistant Vice President | 7 | 10.8 |
| dean | 9 | 13.8 |
| Deputy / Assistant Dean | 14 | 21.5 |
| Director | 4 | 6.2 |
| Deputy Director | 2 | 3.1 |
| Head of the Department | 25 | 38.5 |
| Other | 1 | 1.5 |

The results of the previous table show a description of the characteristics of the research sample as follows:

- It is clear from the previous table that the age group of those whose ages range from (50 years and over) and with a percentage (42.6) of the research sample came in the first place, and in the second place came the age group of those whose ages ranged from (from 40 years old - less than 50 years old) and with a percentage of (33.3%) from the research sample, and in third place is the age group of those whose ages range from (30 years - less than 40 years) and by (21.8%) from the research sample, and in the last place is the age group of those whose ages range from (less than 30 years) with a percentage of (2.3%) from the research sample, as the general trend in Palestinian universities is to give young people the opportunity to assume leadership positions in working within universities. The researcher attributes this to the fact that the sample members have experience in academic and administrative work, as they are either members of the university council as deans of colleges or head of academic departments, and this is considered an advantage for the presence of such a group of people with accumulated experience in academic and administrative work within universities, and Palestinian universities seek to Benefiting from young competencies, which represent a large percentage of the Palestinian society, which is described as a young society, which falls between the age (from 30 - less than 40) years, and this in turn is a good indicator that confirms that universities are characterized by vitality and academic administrative activity.
- It is clear from the previous table that it came in the first place of their scientific qualification (PhD) with a percentage (69.0%) of the research sample, while it came in the second place of their scientific qualification (Master) and with a percentage (22.7%) of the research sample, and came in the third and last place Of their academic qualification (BA) and a percentage (8.3%) of the research sample. Where the researcher notes that the highest percentage of the respondents are doctoral holders because they are in leadership positions and higher management of universities, which start from the degree of department head and above, and this is normal for most of the university leaderships to hold a doctoral degree, given the nature of work in universities, and that he holds a degree Masters are a large part of them who

hold the title of department head and often supervise academic departments, which is an acceptable indicator of performance in educational institutions (Gad Al-Rab, 2010: 490). This indicates the keenness of universities to attract holders of higher qualifications in order to develop education in those universities. The researcher attributes that the highest percentage of respondents hold a doctorate, because it is necessary to obtain this university degree to assume an academic administrative position, and it is also due to the nature of the targeted sample of academics with an administrative position who have the ability to make academic and administrative decisions.

- It is clear from the previous table that it came in the first place of their years of service (15 years and more), at a rate of (51.9%), while the second place came in those whose years of service ranged from (10 years - less than 15 years), with a percentage of (24.5%) And in the third place, those whose years of service range from (5 years - less than 10 years), by (18.5%), and in the fourth and last place came from their years of service (less than 5 years) and by (5.1%) of the research sample. Where the researcher notes that members of the University Council, deans of colleges and their deputies, head of departments and directors are those who have spent more than 15 years of service in universities, and that they have experience and experience and are well acquainted with the regulations of Palestinian universities in Gaza Strip. The researcher attributes that to the fact that it is natural for senior administrative positions in universities to be assumed by academics with experience, and this is done after the accumulation of experience through years of service, and this period makes them have the ability to deal with the challenges they face, and the ability to make decisions with confidence and stability, because in During his time inside the university, he took many courses that had an important impact on developing his skills and abilities, which differ from person to person according to years of service. This benefits the purpose of the study, as those with years of service working in universities have an impact on the success and continuity of these universities, as this indicates that the researched universities are long-standing universities, and that they were established for a long period of time.
- As it is evident from the previous table that the head of the department came first in their job title, with a percentage (43.1%) from the research sample, and came in second place for their job title as dean, and (18.1%) from the research sample, and came in third place from their title. The position of Deputy / Assistant Dean, by (11.6%) of the research sample, and in the fourth place came from their job title as Director, and by (10.2%) from the research sample, and in the fifth place came from their job title, Assistant Vice President, and by (6.0%) from The research sample came in sixth place from their job title as deputy director, and by (4.2%) from the research sample, and in sixth place came from their job title Vice President of a university, and by (3.2%) from the research

sample, and came seventh from their job title as President A university and assistant chancellor, with a rate (1.4%) of the research sample, while it came in the eighth and last place for their job title, otherwise, and by (0.9%) from the research sample. The researcher attributes that the highest percentage is for the head of academic departments because universities contain a large and varied number of departments, which need a head of departments to be the link between the department and the dean of the college, and we also find that the name of a university president and assistant president of a university, although it is a small percentage compared to the rest of the job titles. It is a category with an important influence in universities, and the rest of the percentages are divided between managers and heads of departments, and these have a great influence in the universities under study.

Study Tool: A questionnaire was prepared on “Administrative Communication and a Course in Improving the Efficiency of Decision Support Systems at Islamic University- Gaza,” where the five-year Likert scale was used to measure the respondents’ responses to the questionnaire items according to Table (2):

Table 3: The degrees of the five-point Likert scale

| Response | Strongly Agree | Agree | Neutral | Disagree | Strongly Disagree |
|----------|----------------|-------|---------|----------|-------------------|
| Degree | 5 | 4 | 3 | 2 | 1 |

Validity of the study instrument: The researcher verified the validity of the questionnaire by approving the validity of the scale :

- Internal Consistency:** Internal consistency sincerely means the extent of consistency of each paragraph of the questionnaire with the field to which this paragraph belongs, and the researcher calculated the internal consistency of the questionnaire by calculating the correlation coefficients between each paragraph of the areas of the questionnaire and the total degree of the same field.
- Constructive Validity :** It is considered one of the measures of validity of the tool, which measures the extent to which the objectives that the tool wants to reach is achieved, and shows the extent to which each field of study is related to the total degree of the paragraphs of the questionnaire, and the researcher has done so.

It is concluded from the results of the validity and reliability tests that the measuring instrument (the questionnaire) is honest in measuring what it has been designed to measure, and it is very stable, which qualifies it to be an appropriate and effective measurement tool for this study and can be applied with confidence.

Normality Distribution Test: The Kolmogorov-Smirnov Test was used to test whether the data follow the normal distribution or not, as it was found that the test value is equal to (1.115) and the probability value (Sig.) Is equal to (0.166) It is greater than the significance level of 0.05. Thus, the data

distribution follows the normal distribution. Parametric tests were used to analyze the data and test the study hypotheses.

The statistical tools used: The data were extracted and analyzed from the reality of the questionnaire through the SPSS statistical analysis program, where the following statistical tests were used:

- Percentages and frequencies.
- The arithmetic mean, the relative arithmetic mean, and the standard deviation.
- Cronbach's alpha test.
- Pearson Correlation Coefficient.
- Kolmogorov - Smernov test.
- T test in case of one sample.
- Simple Linear Regression.
- Test of monolithic analysis of variance.

Data analysis and hypothesis testing

Analysis of the axes of the questionnaire:

The first axis: administrative communication

The T-test was used to find out whether the average response score had reached the average approval score of 3 or not, as in the following table:

Table 4: the arithmetic mean, standard deviation, and t-test value for all administrative communication items

| # | Item | SMA | Standard Deviation | Relative Arithmetic Mean | T-Test Value | Probability Value (Sig) | Arrangement |
|----|---|------|--------------------|--------------------------|--------------|-------------------------|-------------|
| 1. | Effective administrative communication contributes to generating managerial ideas, knowledge and experience to achieve goals. | 3.82 | 0.90 | 76.31 | * 7.31 | 0.000 | 5 |
| 2. | An internal network is available which is sufficient | 3.97 | 1.00 | 79.38 | 7.82 | 0.000 | 3 |

| | | | | | | | |
|----|---|------|------|-------|--------|-------|---|
| | nt to implement the administrative communication project. | | | | | | |
| 3. | The university uses the Internet in its internal and external communications between its employees. | 4.33 | 0.84 | 86.56 | *12.70 | 0.000 | 1 |
| 4. | There is a network that helps to speed up the work. | 3.95 | 0.82 | 79.08 | *9.40 | 0.000 | 4 |
| 5. | The available communication system facilitates the performance of electronic services to the beneficiaries. | 4.11 | 0.64 | 82.15 | *13.95 | 0.000 | 2 |
| | Administrative Communication In General | 4.03 | 0.49 | 80.66 | *16.87 | 0.000 | |

* The mean is statistically significant at a significance level of 0.05.

It is clear from the previous table (4) that the arithmetic mean of all paragraphs Administrative contact Equal 4.03, And that the relative arithmetic mean is equal to 80.66,% Test value 16.87, And that the probability value (Sig) Equal 0.000 This means that there is agreement to a large degree by the sample members on the paragraphs of the administrative communication axis generally.

Paragraph has obtained the university uses the Internet in its internal and external communications between its employees the highest degree of agreement in the axis by 86.56,% While the paragraph got "Effective administrative communication contributes to generating managerial ideas, knowledge and experiences to achieve goals "at the lowest degree of agreement by a percentage". 76.31%.

The Second Axis: Decision Support Systems

A test was used T to find out whether the average response score has reached the average approval score of 3 or not, as in the following table:

Table 5: the arithmetic mean, standard deviation, and test value t for all paragraphs of decision support systems

| # | Item | SMA | Standard Deviation | Relative Arithmetic Mean | T-Test Value | Probability Value (Sig) | Arrangement |
|----|---|------|--------------------|--------------------------|--------------|-------------------------|-------------|
| 1. | The top management is aware of the concept of administrative communication, which ensures progress and development. | 4.00 | 0.89 | 80.00 | *8.98 | 0.000 | 8 |
| 2. | The top management practices the principle of delegation in decision | 3.88 | 0.89 | 77.54 | *7.92 | 0.000 | 17 |

| | | | | | | | | | | | | | | | |
|-----|--|------|------|-------|--------|-------|----|--|--|--|--|--|--|--|--|
| | making | | | | | | | | | | | | | | |
| 3. | The top management provides the material and human requirements to achieve the goals. | 3.77 | 0.91 | 75.38 | *6.78 | 0.000 | 26 | | | | | | | | |
| 4. | Senior management encourages employees to introduce initiatives to improve performance. | 4.18 | 0.75 | 83.69 | *12.77 | 0.000 | 1 | | | | | | | | |
| 5. | Top management provides encouraging incentives to attract distinguished human cadres. | 3.75 | 0.73 | 75.08 | *8.33 | 0.000 | 27 | | | | | | | | |
| 6. | The top management forms work teams from multiple organiz | 3.71 | 0.98 | 74.15 | 5.82* | 0.000 | 30 | | | | | | | | |
| | ational levels. | | | | | | | | | | | | | | |
| 7. | The top management is concerned with the principle of creativity and continuous improvement. | 3.82 | 0.93 | 76.31 | *7.04 | 0.000 | 23 | | | | | | | | |
| 8. | Universi ty plans are linked to the set goals. | 4.03 | 0.85 | 80.62 | *9.81 | 0.000 | 4 | | | | | | | | |
| 9. | The universi ty analyze s the strengt hs, weaknes ses, opportu nities and threats it faces. | 3.91 | 0.84 | 78.15 | 8.68* | 0.000 | 14 | | | | | | | | |
| 10. | There is a clear and written universi ty strategi c plan. | 4.08 | 0.94 | 81.54 | 9.23* | 0.000 | 2 | | | | | | | | |
| 11. | The implem entatio n of the universi ty's strategi c plan is | 3.74 | 0.94 | 74.77 | *6.33 | 0.000 | 28 | | | | | | | | |

| | | | | | | | | | | | | | | | |
|-----|--|------|------|-------|--------|-------|----|--|---|------|------|-------|--------|-------|----|
| | periodically monitored. | | | | | | | | s its goals to all subordinates. | | | | | | |
| 12. | Corrective decisions are made for the university's performance in light of the evaluation results. | 3.85 | 1.06 | 76.92 | * 6.41 | 0.000 | 18 | | Administrative procedures are achieved to the greatest extent possible in the use of available resources. | 3.78 | 0.89 | 75.69 | * 7.09 | 0.000 | 25 |
| 13. | The administrative policies in the university are clear and understandable. | 3.85 | 0.85 | 76.92 | * 8.01 | 0.000 | 18 | | Administrative procedures are considered flexible enough to meet all situations or change of goals. | 3.71 | 0.91 | 74.15 | * 6.24 | 0.000 | 29 |
| 14. | The administrative policies present in the university direct the decision-making process towards the development of performance. | 3.85 | 0.89 | 76.92 | * 7.68 | 0.000 | 18 | | The organizational structure helps in coordination, communication and exchange of information with other departments and depart | 4.02 | 0.84 | 80.31 | * 9.76 | 0.000 | 7 |
| 15. | University administration clarifies | 3.80 | 0.77 | 76.00 | * 8.33 | 0.000 | 24 | | | | | | | | |

| | | | | | | | | | | | | | | | | | | | | | | | | |
|----|---|------|------|-------|------------|-------|----|--|--|--|--|--|--|--|--|--|----------------------------|---|------|------|-------|-----------|-------|----|
| | ments within the university. | | | | | | | | | | | | | | | | e of delegation of powers. | | | | | | | |
| 19 | The organizational structure helps to communicate, coordinate and exchange information with bodies outside the university such as the Ministry of Higher Education, and research centers. | 3.91 | 0.86 | 78.15 | * 8.50 | 0.000 | 14 | | | | | | | | | | 22 | There is a job description that clearly defines the powers and responsibilities. | 3.92 | 1.02 | 78.46 | * 7.29 | 0.000 | 13 |
| | | | | | | | | | | | | | | | | | 23 | The use of information technology leads to the ability to coordinate operations in various colleges, departments and departments. | 4.03 | 0.87 | 80.62 | 9.60* | 0.000 | 4 |
| 20 | The organizational structure of the university suits the nature of its activities. | 3.91 | 0.70 | 78.15 | * 10.44 | 0.000 | 14 | | | | | | | | | | 24 | The use of information technology in the university features a course in the ability to redesign adminis | 3.85 | 0.87 | 76.92 | 7.84 | 0.000 | 18 |
| 21 | The university's organizational structure adopts the principl | 3.97 | 0.85 | 79.38 | 9.22* | 0.000 | 9 | | | | | | | | | | | | | | | | | |

| | | | | | | | |
|-----|---|------|------|-------|--------|-------|----|
| | trative process es. | | | | | | |
| 25. | The univers ity is improvi ng its process es and proced ures to ensure quality perfor mance. | 4.03 | 0.95 | 80.62 | 8.73 | 0.000 | 4 |
| 26. | The technol ogy used provide s the informa tion needed in making decisio ns. | 3.85 | 0.97 | 76.92 | * 7.02 | 0.000 | 18 |
| 27. | The univers ity provide s protecti on progra ms that are safe and private. | 3.97 | 1.07 | 79.38 | * 7.27 | 0.000 | 9 |
| 28. | The univers ity is charact erized by its high pace with technol ogical develop ments in the surroun | 4.08 | 1.02 | 81.54 | * 8.51 | 0.000 | 2 |

| | | | | | | | |
|-----|--|------|------|-------|---------|-------|----|
| | ding environ ment. | | | | | | |
| 29. | The univers ity coordin ates its internal operati ons using informa tion technol ogy | 3.94 | 0.88 | 78.77 | * 8.58 | 0.000 | 12 |
| 30. | The univers ity include s its employ ees in training courses related to informa tion technol ogy | 3.97 | 1.05 | 79.38 | * 7.36 | 0.000 | 11 |
| | Decision support systems in general | 3.90 | 0.44 | 78.08 | * 16.57 | 0.000 | |

* The mean is statistically significant at a significance level of 0.05.

It is evident from the previous table (5) that the arithmetic mean of all the paragraphs of decision support systems is equal 3.90, And that the relative arithmetic mean is equal to 78.08,% Test value 16.57, And that the probability value (Sig) Equal 0.000 This means that there is agreement to a large degree by the sample members of the paragraphs of the axis of decision support systems generally.

The paragraph "encourages senior management employees to submit initiatives to improve performance" received the highest approval score in the axis 83.69 While the paragraph "The senior management shall form work teams from multiple organizational levels" at the lowest level of approval, percentage obtained 74.15%.

Test hypotheses of the study.

Ho1: There is a statistically significant relationship at the level of significance ($\alpha \leq 0.05$) between administrative communication and improving the efficiency of decision support systems at Islamic University- Gaza.

To test this hypothesis, the "Pearson correlation coefficient" test was used, and the following table illustrates that.

Table 6: The correlation coefficient between administrative communication and improving the efficiency of decision support systems at Islamic University- Gaza

| The Premise | Pearson Laboratories For The Link | Probability Value (Sig). |
|---|-----------------------------------|--------------------------|
| There is a statistically significant relationship at the level of significance ($\alpha \leq 0.05$) Between the administrative contact and improve the efficiency of decision support systems at Islamic University- Gaza | 674 | * 0.000 |

* Correlation is statistically significant at a level of significance ($\alpha \leq 0.05$).

The previous table (6) shows that the correlation coefficient Equal 674, And that the probability value (Sig.) Equal 0.000 It is below the significance level of ($\alpha \leq 0.05$) This indicates the existence of a statistically significant direct relationship between Administrative communication and improving the efficiency of decision support systems at Islamic University- Gaza.

Ho2: There is a statistically significant effect at the level of ($\alpha \leq 0.05$) for administrative communication in improving the efficiency of support decision systems in Islamic University- Gaza.

To test this hypothesis, the "simple linear regression" test was used, and the following table illustrates that.

Table 7: Simple Linear Regression Analysis

| Independent Variable | Regression Coefficient | T-Test Value | The Probability Value Sig. | Correlation Coefficient | The Coefficient Of Determination |
|------------------------|------------------------|--------------|----------------------------|-------------------------|----------------------------------|
| Constant amount | 1.480 | 4.392 | 0.000 | 0.674 | 0.454 |
| Administrative contact | 0.601 | 7.244 | 0.000 | | |

From the results shown in the previous table (7), it was found that:

- There was a statistically significant effect at the significance level ($0.05 \geq \alpha$) for administrative communication in improving the efficiency of decision support systems at Islamic University- Gaza, as it was found that the probability value is 0.000, which is less than the significance level 0.05.

- Correlation coefficient = 0.674, and the modified coefficient of determination = 0.454, which means that 45.4% of the change in improving the efficiency of decision support systems in Islamic University- Gaza was explained by the

linear relationship and the remaining percentage may be due to other factors that affect the improvement of the efficiency of decision support systems at the university Islamic Gaza.

Ho3: There are statistically significant differences at the level of significance ($\alpha \leq 0.05$) between the averages of respondents' responses about administrative communication and improving the efficiency of decision support systems in Islamic University- Gaza due to personal and organizational data (Age Group, Academic Degree, Years Of Service, Job Title).

To test this hypothesis, a "single-contrast" test was used. The results are shown in the following table.

Table 8: The results of the "mono-variance" test-Personal and organizational data

| Personal And Organizational Data | Name Of The Test | Test Value | Probability Value (Sig) |
|----------------------------------|------------------------|------------|-------------------------|
| Age group | Monochromatic contrast | 1.943 | 0.152 |
| Degree | Monochromatic contrast | 0.744 | 0.480 |
| Years of service | Monochromatic contrast | 0.656 | 0.582 |
| Job title | Monochromatic contrast | 2.122 | 0.049 |

From the results shown in the previous table (8) it was found that the probability value (Sig.) below the significance level 0.05 The job title variable, and thus it can be concluded that there are statistically significant differences between the averages of the respondents' answers attributable to the job title, while the rest of the variables have been found to be the probability value (Sig.) is greater than the level of significance 0.05 Thus, it can be concluded that there are no statistically significant differences between the average of the respondents' answers attributable to (age group, academic degree, years of service).

Study Results

The analysis of field research results related to hypothesis testing revealed the following:

1. The results confirmed the existence of a statistically significant positive relationship between Administrative communication and improving the efficiency of decision support systems at Islamic University- Gaza.
2. The results highlighted the existence of a statistically significant effect of administrative communication in improving the efficiency of decision support systems at Islamic University- Gaza.
3. The results confirmed that there are statistically significant differences between the average of the respondents' answers regarding administrative communication and improving the efficiency of decision support systems at Islamic University- Gaza. Attributed to the job title.
4. The results showed that there were no statistically significant differences between the average of the respondents' answers about administrative

communication and improving the efficiency of decision support systems at Islamic University- Gaza. It is attributed to (age group, global degree, years of service).

system with employees' needs for training accurately, in order to improve and develop their skills, which increases the quality and efficiency of their performance.

Study Recommendations

The researcher suggested a set of recommendations, the most important of which are:

1. Recommendations related to administrative communication

- The importance of universities to re-drafting procedures and the nature of work and organizational structure in those universities, including works to improve the application of administrative communication, as well as to alleviate the central, and avoids duplication and red tape and control repeated, thus contributing to the improvement of the level of performance and achievement of objectives, and the implementation of the line i strategy and executive.
- Explaining the importance of universities developing the information technology infrastructure in line with recent developments, as it is a major factor and basis for any modern university to develop its performance, and work to develop the capabilities and skills of workers in the field of information technology
- The need to adopt the principle of integration in the work of information technology and move away from duplication, and to continue administrative communication and feedback to reveal any developments, and to build an information technology platform that provides an opportunity for universities to use it as an infrastructure in administrative communication.

2. Recommendations related to decision support systems

- The need for higher management of universities to pay attention to decision support systems and to make intensive and continuous efforts to support and enhance efforts aimed at enriching and enhancing the role of decision support systems in universities .
- Universities should actively contribute to increasing interest in providing material and technical capabilities and making them available to all users, while continuing to keep pace with modern technological means and techniques.
- Increasing interest in human potentials by developing and developing human resources, developing their capabilities, skills and knowledge, and attracting competencies with creative capabilities .
- Increasing interest in the organizational capabilities available through an independent unit for decision support systems that directly reports to the higher management in Palestinian universities, and allowing the organizational structure to easily flow information between colleges, departments and departments.
- Focusing on training as a major component of decision support systems, allocating a special budget for training on the systems to be applied, and linking the training

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