

An Analytical Study of the Reality of Electronic Documents and Electronic Archiving in the Management of Electronic Documents in the Palestinian Pension Agency (PPA)

MOHAMMED KHAIR I. KASSAB

SAMY S. ABU NASER¹

MAZEN J. AL SHOBAKI

Department of Information Technology
Faculty of Engineering and Information Technology
Al-Azhar University, Gaza, Palestine

Abstract:

The study aims to identify the reality of management of electronic documents and electronic archiving retirement in the Palestinian Pension Agency -analytical study, as well as to recognize the reality of the current document management system in the Palestinian Pension Agency.

The study found the following results: that the reality of the current system for the management of documents in the agency is weak and suffers from many jams. Employee in the agency understand the importance and benefits of the management of electronic documents system, where the application of electronic document management system provide important features and benefits most of which reduce the loss of documents between departments, illustrates the flow path, the speed, accuracy, transparency, and reduce the proportion of damage and destruction of files. Furthermore, the electronic documents system cost will be less than the cost of the current system and it will reduce the tasks assigned for the staff. The existence of a clear adoption

¹ Corresponding author: abunaser@alazhar.edu.ps

of the agency for the policies and procedures established for the application of electronic documents management system. There are weak plans for training and developing of staff in the agency to raise their efficiency.

The study found a set of recommendations, including: increased interest and awareness of the need to implement policies, mechanisms, and procedures to ensure the success of electronic document management system through benefiting from the experiences of other organizations and the private sector. The agency need to increase and develop its services for retirees in order to encourage the private sector, universities, and institutions to join the agency, and open the way for all segments of society in Gaza and West Bank and enhance its competitiveness between international social security institutions. The need to focus its attention on developing and publishing appropriate clear plans and specific goals about management of electronic documents and the agency should be committed to apply them. The need to focus on the establishment of a public management of archiving in the structure dealing with all technical operations and having competent and qualified employees in the field of electronic document management. The need to focus on the Palestinian National Archives and the follow-up with the international standards by the International Council Archives (ICA).

Key words: Electronic documents, electronic archiving, electronic document management system, the Palestinian pension agency.

INTRODUCTION

The administrative documents are the most important source of information in the modern time. Because it contains information that other sources do not such as books. These documents are produced in a formal way within official agencies in accordance with the laws of formal legislation. Hence information in a document is characterized with accuracy and confidence than the authored information, which

is often influenced by the positions, inclinations, thoughts, and opinions of the author and culture. Al-Agha [2] see that the administrative documents record abstract facts as they happen, wherein we find the latest information from the statistics and reports on some of the topics that may be a cause to search, prior to inclusion in the articles, books or even academic theses. On the other hand [1] stated that part of these documents journey will continue through time deserving to stay as historic witnesses, and then archived in national archival institutions as an expensive state-owned sources of national history. There is no doubt that the administrative documents which turned into a conservation eternal archival institutions will come under the auspices of the state, special places are designated for it, and much is spent on protecting and developing methods suitable for its existence. It is therefore essential to succeed in the selection process, which will result in the selection of documents sets that will become part of the role of Archive holdings and even part of the heritage of the nation and the sources of its history and its culture.

The Palestinian pension agency is an important semi-governmental institution that is responsible for providing security, social justice, and ensures a decent standard of living for the individual and the family by social security.

Among the most important systems that the agency relies on is the document management system, where the system is based on dealing with documents and files and the most famous are the files of retiree whose services have finished based on the Insurance Law and Pensions, subscribers files, employees who are on top of their business and pay the value of the monthly installment of the agency based on the law(Insurance Law, pensions and its amendment, 1992[7]), because the paper documents in it contain information that will be used for the calculation of retirees entitlements and benefits involved, and because of the multiplicity of laws and the

emergence of successive amendments, it is always necessary to go to these documents for applying the amendments for several reasons:

- Expected file corruption due to its old age.
- Increasing the size of the paper archives.
- Increase the cloning process in several forms of paper copies, the high costs, and the slow process.
- Booking several stores to store the paper files that require big and expensive spaces.
- The difficulty of follow-up and reaching to paper files.

In the last decades of the twentieth century, with the advent of computers and the development of non-traditional new methods to save the necessary documents and archive them through the use of computer memory - digital memory - and the evolution of this new method with the development of mechanization of conservation and capacity of digital memory and the development of software for archiving and retrieval of information and documentation [3], and with the importance of the need for the agency personnel files, the development of a system for the management of electronic documents is the most important things that must happen as soon as possible as seen by the researchers.

In the context of the overall outlook towards the creation of a contemporary Palestinian social security institution worthy of our society, the senior executive management and Board of Directors in the Palestinian pension agency several years ago paid most of the attention to the capacity building by attracting distinct and varied persons, the development and introduction of new services in the fields of law, investment, control expertise, financial management, financial position, information systems, and office branches in the North provinces of West Bank, etc, and has struggled to create a consistent

mechanism of action consistent with the developments in the field of information technology.

STUDY PROBLEM

It is clear that the Palestinian pension agency on the verge of a new phase after the launch of the Palestinian e-government project (Ministry of Communications, 2003), leading to the need for the Palestinian pension agency to transform manual processes (traditional) to a computerized (electronic), where it met with the study of Izz a-Din [6, 42-49] that the archive size increases in inflation; because of the increased number of papers within the same file where the average file contains 200 documents in different sizes, the slowness in dealing with the current archiving system, increased costs, the possibility that some of the contents of the file to be lost after reviewing by the competent, damage is certain to get documents paper makes it more complicated to use, the urgency of this historical paper files are concentrated in that they pose in terms of information an administrative system, by integrating these files with electronic records that are on the agency database. The problem of the study is answering the following question:

What is the reality of electronic documents and electronic archiving in the management of electronic documents in the Palestinian pension agency?

The following sub-questions are branched from the main question:

1. Is there a system for management of electronic documents in the Palestinian pension agency?
2. Are there specialists in archive documents in the Palestinian pension agency?

3. Are there administrative instructions to control the work in archiving electronic documents in the Palestinian pension agency?
4. Are there laws and legislation that allows dealing with electronic documents?

STUDY OBJECTIVES

This study aims to achieve the following objectives:

1. Identify the electronic document management system.
2. Identify the advantages and disadvantages of manual document management system in the agency.
3. Recognize the importance of electronic document management system and staff concerns.
4. Explore the policies, mechanisms, procedures for electronic document management system.

STUDY IMPORTANCE

1. This is the first study in Palestine in terms of authenticity, modernity, and the scarcity of research on the subject matter that need to be enrich with studies because of its great importance in our daily lives.
2. The study may contribute to the development of the document management system it has, thus helping it to save time, effort and costs as well as increase productivity and performance.
3. Highlight the importance of the electronic document management system to keep the documents from damage and loss in the long term.
4. Studying the current document management system and to identify its negativities and try to develop solutions for it; this will show the advantages of the use of modern systems of electronic document management and its

benefits to ensure rapid delivery of services to beneficiaries.

5. Scarcity of local studies that relate to examine the electronic document management system.
6. Identify practical measures for the implementation of electronic document management system in the Palestinian pension agency.

STUDY LIMITS

Place limitation: study was conducted in the Palestinian pension agency.

Time limitation: study was conducted and preliminary data was collected during the year (2017).

Subject (Academic) limitation: subject was limited to study the reality of electronic document management in the Palestinian pension agency - analytical study.

STUDY METHODOLOGY

The study aims to identify the reality of management of electronic documents and electronic archiving in the Palestinian Pension Agency -analytical study, as well as to recognize the reality of the current document management system in the Palestinian Pension Agency, and in order to achieve the goal of the study, the researchers used the descriptive and analytical approach in conducting the study since it commensurate with the phenomenon in question, the researchers also used primary and secondary sources to gather the data for the study and extract the results.

THEORETICAL FRAMEWORK

First- Electronic documents

Information is no longer just a kind of luxury that boasts its communities or institutions, but has become a key pillar in the development of society and the desired well-being. Information and communication technology has entered all social, humanitarian, and scientific fields. Our present and future is an era of electronic information in the service of society. This society is based in the key for maximizing the human intellect and the mind mechanism with computers networks and modern means of communication, artificial intelligence [27-32], and expert systems [33-41, 43-56].

Adopted archives in the past decades were based on paper documents, but after the Second World war the situation changed completely, not only to the increasing amounts of information produced by the state organizations, but for progress in the forms of media that is records and stores the information, whether text, sound, images, Information, or a video, with the possibility of linking them. It was not initially for the emergence of information technology and the development of networks a significant impact on the archival work in terms of integration and openness to global information systems the way they merged their libraries and distributed and open systems but played confidential and privacy elements a key role in keeping the insular nature of the work of archival [16-26].

But in recent years, and particularly since the beginning of the nineties technological uses have evolved in areas related to information, scientific research, electronic publisher, and databases. In the face of worsening of these huge quantities of documents and mutual phones on open networks and the information it was necessary to find appropriate technical

solutions to control and to control the various aspects of dealing with them [4].

The concept of electronic documents

Electronic documents system like any manual system that save documents in terms of use of the public structure of the means of saving documents, which includes Cabinet, Drawer, and Folder, which files are saved in them, and Files, and finally Documents that is the work of scanning them using a Scanner.

The management information systems dealing with data and documents that exceed one of the original sources in the organization, whether produced by the organization in the context of their work or received through the external environment. Dealing with this data and documents is done through the information system of the organization to prepare plans, operating procedures, transaction, and adjusting the flow of data and documents into the organization by adjusting the documentary cycle and measures the performance of administrative activities, while facilitating the means of control of these procedures and follow up its implementation. So we find that the purpose of information systems not only carry out the monitoring, collection, processing and storage, but the ultimate goal lies in the recovery and circulation and broadcast selective operations of information and documents when you need to END USER, where sophisticated systems designed to provide immediate and accurate answers in the light of the documents and data stored in the database. In addition to automating procedures to save time and effort secrecy and ensure when dealing, which determine the paths by which the completion of the procedures within each department and division in the organization through the so-called electronic document system, which manage data and documents within the organization since its inception or received until completed thus avoiding many of the problems of manual Archiving [11].

Justifications and incentives for study in technical computing work documents

It becomes difficult to handle paper documents in the traditional manual way, especially with the amount of notes and studies produced by the various departments and the presence of a number of shortcomings and difficulties related to study and the disposition of the archival documents, including:

- The limited number of search tools.
- Difficulty of improving study or preparation of structured tools.
- The difficulty of exploiting study tools.
- Slow searches.
- Many searches fail and thus depriving many of the beneficiaries of archival documents required.
- Difficult to dispose of the life stages of the document.
- Tab difficulty of archival documents in accordance with the uniform classification system and the loss of control of the balance.
- The difficulty of counting of archival documents and follow-up accumulation.

With the advent of modern technologies today in the means of massive storage space, and the development of databases and networks such as the Internet, Extranet, and Intranets, which linked the various parts of the institution, appeared electronic records of the information and electronic files - electronic documents - which is exchanged and saved through the modern technology of information, and quickly depend on clicking a button. With the pressure of interests that require interaction between different parts of the world at the same time and the same documents sometimes, and this technique cannot be provided by the reference system (manual), so that a paper document cannot be dealt with more than two parties at the same time, and the original paper document can be destroyed

and thus the basis of information lost, all of these and other factors with the rapid technological developments, the computerization of documents and electronic archiving technology emerged (digital systems) to solve all the problems mentioned.

With the advent of digital systems, it was found the so-called "computerizing documentation procedures", which is based on transferring, registration, sorting, and preparation of study report about the saved documents electronically, thus data and information are available and can be retrieved quickly which can be dealt with remotely over the network at a later date to become a collective deal with documents at the same time which is the maximum an employee aspired to have in his office [4, 42-46].

Types of electronic archive:

1. Archive product electronically updated origin across systems and equipment born digital, any electronic recordings and applications created by computer in its various forms /xml /xls /doc...etc. and these electronic documents are also set its electronic processing to save, search, and retrieval as other documents.
2. Archived papers converted to digital: paper-based documents that have been scanned through the Scanner, and this strategic value with respect to the documents that shall be saved for the long term [4].

Electronic archiving purposes

For the electronic documents purposes one aims to reach them including [5]:

- Management without papers.
- Electronic documents exchange.
- The application of e-government methodology.
- Saving office space consumed in storing paper files.

- Providing a backup copy of the documents in case of any damage due to any natural or human factors such as fire, theft, loss of documents, or others factors.
- Ease of retrieval of the required documents using different ways of searching.
- Ability to search the content of the documents either through indexing or using OCR techniques.
- Easily share documents inside and outside the institution.
- Availability of documents for many people to see at the same time.
- Increase the effectiveness of the powers of access to documents.
- Weeding files and removing repetitive and unnecessary documents.

Electronic archiving objectives

The two main goals of Electronic archiving are [4]:

1. The strategic objective of electronic archiving is reaching paperless environment, electronic government without movement, queues, nor paper documents.
2. Immediate goal of the institution of electronic archiving is facing a massive flow of documents and control of the stacked archival by processing, saving, and retrieving it quickly.

The electronic archive supposed to speed the processing of documents by indexing them automatically, store them in more than one original copy, and distribute these "original" copies to the various parties concerned. Therefore the employee is no longer afraid of slow access to the document. The document retrieval became more rapid and in a diverse ways. The document which is not ranked considered in the science of archival lost piece of information and how can a person control

the order of millions of documents and save them without using electronic archiving system?

Procedures for securing documents and data in the electronic document management system:

The documents and data are secured in more than one way in the electronic systems to increase the emphasis and to ensure security against all chances of damage, loss, or disasters, we find them in insurance on the level of time, place, physical medium, qualitative, as follows [11] :

1. Insurance on the level of time: to make backup copies of all data with different levels of insurance specified in intervals like backups on the level per day, the level per week, the level per month, and level per instance.
2. Insurance at the level of the place: make backup copies of data on the level of time and choose one of these levels, day, week, or month, and then save this insured temporal level and save copies of them in more than one place, where it can be backed up in the workplace, another copy at the headquarters of the institution, a copy in a bank, and a copy of the outside the state in safe countries.
3. Insurance on the level of physical medium: where backup copies of all data on more than one physical medium level, copying the work on the same hard drive, another copy on another hard disk in the same machine, another copy on laser discs, and other copy on magnetic strips, and so on.
4. Insurance on qualitative level: where backup copies of all the data either automatically where computer is configured to do backups periodically every certain period of time, or that the backups are done by the official system administrator as doing backups on

different periods, media, and saving them in different places.

Through these actions to secure documents and data it is clear with the different insurance systems, more than one way of various insurance procedures can be combined, depending on the importance of what is being run from the actions and data, as well as on the organization's ability to provide and use more than one way to secure the system it has.

Electronic archiving problems

Al-Jimi state that the most famous problems that can occur due to work on the electronic archiving [4]:

1. The problems of the development of electronic systems and devices:

Archive experts warn about the electronic archiving virtue of the rapid development of electronic software systems, so that the electronic archive as records shall be preserved and archive must enter the system through the traditional archival methods, so treat it and save it even maintains its characteristics and its scientific, research, and historical value. In this framework official Digital Archive of American in Washington State, "Adam Johnson" say that content is what should be retained and not the medium which was written on it. Furthermore, the importance of content is equivalent to the storage vessels, because the loss of the vessel the loss of the information that it has. However, the development of hardware and software gives it the ability to deal with old electronic documents and not vice versa.

2. Electronic document subject to the depreciation and amortization, whether deliberate or even normal:

The assumptions has identified the life of electronic document to thirty years, but we did not get to this time since the electronic document appeared because of its novelty, but we consider that this period is not sufficient for permanent preservation of the electronic archive, so technical people in the field need to displace the electronic document periodically from a one type of storage to another throughout the life of the archival document electronic so it can keep abreast of the developments devices of electronic systems, but this in itself represents a danger to the original content of the document, which could change or destroy part of it and also would change the data associated with the document or the so-called (meta data) which is archival data taken in consideration during the final stage of the document.

3. Some technicians suggest that information to be stored in the form of plain text such as ASCII / Unicode:

It can be read from various systems and hardware no matter of its development, but this method also can be messing with the content of the document and wasting parts of specially photos and graphics. The storage in the form of PDF can lead to practical problems and that the "Adobe" company saw this coordination solution to this problem through the PDF /A. Files stored in XML format which is a separate file independent of for all systems and devices used today because it is not influenced by the changes that you get. As for the pillars or storage media that affected the development of systems and equipment, the storage networking industry association see that this is the real problem for electronic archiving and called it a "one hundred years archival trouble " is the predicament in which the technical about archive of the one hundred years in

which traditional archiving methods managed archive for more than 100 years.

4. Digital document security and preserving its identity problem:

Archive experts today warns about the security of electronic document prone intentional and unintentional sense technical or normal, so that the balance of the electronic documentary stored in one medium can be damaged at a glance thus, the contents of the information is lost. The technician who made the electronic document and hardware reader for it, and put the protection techniques for it can spoil this protection and may change it and thus leading to forgery or alteration of content and the destruction of a part of it and thus the loss of basic identity. No matter how successful technology today in reassuring specialists in that registration electronic document on compact WORM which means "Write One and Read multiple" that means one could read document contents, but cannot change it. That remains a matter of positive endeavor for the technical writers of this document and the reader for it. Who guarantee something else happen to it?

As for the possibility that the document is exposed to natural devastation whether it is technical or deliberate, the technical solutions assure us a copy of the document in several other versions similar to CDs, a method called conservation reserve for information or in the central server or subsystem (server) called Mirroring or Clustering which means the use of two domestic servers or suppliers working together as one group to increase performance. But all that remains to technical solutions, and technology is man-made, he can dispose of it as he wishes, according to his intention and purpose.

5. The problem of the digital signature and maintaining the legitimacy of electronic document:

Technology featured electronic signature to compensate handwritten signature on the electronic document even give it formalization (legal legitimacy) means legal proof of the document and establish a legal guide on the official form of it. Today there is a pairing between the uses of technology to save documents, maintain the legal strength by not playing with its content. Thus signature is the only way to ensure the document officially and identity for that the "digital signature" of the document was invented.

6. Cost problem of electronic archiving:

Electronic archiving technique requires a high cost compared to traditional paper archiving, so that today's technology novelty still cost a lot, and perhaps one of the main reasons why some people did not enter the midst of experience yet. However, due to the anticipated goals of this new technology, so as to save documents in the best special climatic conditions, there is an impressive dust, such as those on a paper document, and obsolescence due to continuous touching it as is the case for classic archive, especially and most importantly minimize huge space, such as those required by the paper archive, which is one of the main problems caused by traditional archiving institutions today, all of this and the other would cover the cost of the electronic archiving, especially if they are correct technical solutions to the problems that were mentioned.

In summary to say that the electronic archiving today posed several problems requiring strategic studies because the technology today is still fledgling and cannot test its efficacy particularly in terms of durability, withstand the statute of limitations, and time problems. We should be waiting for the next time to judge it. Also, some believe that the archiving using (microfiche / microfilm), which is called the standard

archiving is still the best way in the long term, so that the values of the document age of more than a century, it has been possible judge it to a certain extent now by virtue of obsolescence compared to the electronic archiving, provided that periodic maintenance of the films is done and also provided work to find the integration of these documents with electronic documents solution.

The US National Archives used archiving through "fixed figure" in the long term which is a strategy aimed at a way to reduce the risk of the development of electronic devices and software, and the reservation of the downsides of dependency for these devices and systems.

It has been acknowledged that modern technology has caused problems to the system of archiving of paper documents mainly related with features of electronic document and fragility about the long-term with conservation, worth of legal and technical problems linked through the relevant organs and systems, so it should reconsider the restructuring Archiving system that takes into account these and other problems so the system becomes integrated, taking into account the different types of documents, especially since the old concept of the archive stipulates that the Archive is every document regardless of its type any shape.

7. The problem of creating electronic document:

The first confusion caused by the electronic document is the matter of establishment first precisely where it was created collectively, cross-media system, cross-linking between the various parties involved techniques so electronic document is not necessarily has to be in one unit as it is for paper document in which the establishment was personalized, and as the source represents an important sign of the archival which is enshrined in the principle with respect for origination or origin especially during the last period and final archival. The source or

shareholders in the creation of the document should be known and that it was a problem for interactive sites of the document. So that decades later it becomes not worthy and not useful to refer to the documents if its source cannot be specified and the content of the documents organically linked to the functions of the source that created them.

On the other hand, electronic document has added new information about document or the so-called Metadata from the used information system and its provider, and the date of origination, brand, transaction... etc., which are essential data for the use of the document especially outside the perimeter of growing up and the length of the stages of life. There have been issued techniques (EAD = Encoded Archival Description) to adjust these data and the method of recording and archiving to track document throughout its life. This method is described as the physical description of the document or cataloging and indexing, the two processes that enable us to identify the document data define its identity and terminology enables retrieval and know their content.

The method of (Metadata) today is one of the most advanced method in the world to build open information and distributed systems, and the metadata method as well as classification of documents, which adds the symbols of the documents make it easier to use and adjust its position within the total documents as in the case of paper documents, but the difference between this and that is paper document is classified for safekeeping inside the office, while the electronic document by default is classified and archived electronically [5].

8. Conversion problem of electronic document from the active to semi-active.

As for the problem of converting electronic documents from the active phase to the semi-active, the principles of the science of archiving impose it, it is true to say that the electronic

document does not represent a burden like the paper document in the office where it is converted to a larger space, but also the employee is not qualified to deal with the semi-active document even if it is electronic which is the duty of the archival person, and here enters the functional relationship between the document and its origin not only a matter of a place saved and the possibilities of storage. Therefore there is a need to identify the saving techniques and adjust the extended saving of electronic documents from the outset in order to determine its fate and assess their value. The archival person is demanded to intervene and support administrative, technical persons from the creation of the document to determine the outset on the important descriptive archival data that aforementioned during the final stage of the document, and thus the change and the development of the archival profession is essential to keep pace with these developments archival.

Modern information technology has impacted on the reality of archive serious and rapid impact even exceeded the dream reality, the world has realized that humanity will reach the level of the open archives across networks without paying attention to the extent of modern technology to respond to it, and did not take into account the main concept of the archive and the developments that have occurred the emergence of new professional disciplines such as electronic trade, virtual and calculated management, which has collided with the basic concept of archiving.

Advantages and disadvantages of electronic documents (automatic save)

Automated saving lacks legal credibility to the outputs, where so far it does not count the output of the computer before the courts unless they are certified with signatures and seals, as well as the possibility of modifying and changing in what is dealt with in automated systems in the event of failure to

tighten supervision and control of the system, but automatic saving of documents and files features many advantages including [10]:

- Eliminating the problems of saving and dealing with manual files which results in damage, loss, theft, or other manual trading risks.
- Participation at the level of the file subject, the documents, and data related to the topics.
- Elimination of the problems of saving provides spaces of up to 90%.
- Define password for each user.
- Define password for each and every application archive of software applications within an organization.
- Define paths for the sessions of documents between more than one user.
- Characterize attachments tracks that are on the basis of documents to go through.
- Dealing, retrieving, transmitting capabilities and speed of transfer of documents and information to others in multiple locations in real time.
- Management of documentary cycle since its inception and until the completion of all the procedures and the possibility to follow all the procedures on the network, and print the report for all stages of the documentary cycle.
- Quick access to the substantive content of files and information directly due to the classification and indexing systems used.
- Access to reports and statistics and comparative tables easily and conveniently through the databases that contain data and all related organization documents.
- Elimination of chronological and geographical separation between the categories of beneficiaries to

meet the immediate needs of the information and documents.

- Make connections with others at the same time without problems in the transmission of documents and information.
- The integration, coordination in handling operations of documents and information within and outside the organization.
- Provide an opportunity for employees to deal with the technical regulations of the documents and information at the international level through their dealings with other local and international organizations.
- Provide selective broadcasting of information and documentation services immediately after the data and documents updated.
- Confirm the credibility and validity of the technical systems for documents and information when dealing with others with high confidence.
- Accuracy, speed, insurance and maintaining files and information against all types of risk by the existence of alternative copies in multiple places.
- Save time, effort, and the rationalization of fiscal expenditure, including works to improve the economic optimum utilization of available resources.

Second- Palestinian Pension Agency (PPA)

The idea of establishing the Palestinian Pension Agency was in the year (1964), to provide a decent life for the social categories of its beneficiaries and the provisions of the law, for themselves and their heirs. In the form of insurance fund and pensions for officials and employees and workers of the public sector in Gaza Strip, according to a decision issued by the Egyptian ruler at the time, and so after reviewing the article (28) of the constitutional order in the Gaza Strip issued on 05.03.1962 and

the Order No. (311) for the year (1954). It was the work of insurance and pension law No. (8) For the year (1964)[8]. The work continued under Israeli control as well. And it was followed by some of the amendments and additions to the law in order to develop and improve the law and convenient ambient conditions to resolve the issues faced by the private fund after passing through different stages of the Israeli occupation and then to the Palestinian Authority, but finally the fund was able to achieve some sort of administrative and financial autonomy, in order to preserve funds and benefits for beneficiaries.

Authority has won the confidence of the local and the official community, which was gained through successful implementation of the law to the fullest and the best of the proper techniques for achieving the objectives and keep pace with our time and fit our society and comparable systems in other countries. Agency is a full member of the World Social Security Corporation (ISSA), which is the only member representing Palestine in the field of social security to the (ISSA) since 1998, giving it the opportunity to train and participate in conferences, seminars and workshops of local, regional and international action in the field of social security. One sign of that success is the actuarial studies prepared to fund the agency. In addition to the desire of many sectors of society to benefit from public pension law No. (7) of 2005, as most of NGOs and universities involved with the agency benefit from this law. The government also relied fully on the agency to apply the law of insurance and pensions for the Palestinian security forces from the technical and legal terms (Approved General Structure of the Palestinian pension agency, 2005).

User categories of the Palestinian pension agency

According to Law No. (8) of 1964, and two decisions of the president, the beneficiary categories are:

- Staff, users, and workers of civil administration, and police officers tethered salaries described in the first section of the administration's budget.
- Staff, users, and workers of the management of Palestinian pension agency, or their salaries paid within any section of the budget or subsidies.
- Staff, users, and workers of municipalities and village councils in the Gaza Strip, and the Department of Islamic Awqaf.
- Staff, users, and workers of the electricity distribution company, and the staff, users, and workers of civil management in the West Bank.

Finally, according to for the security forces number (16) for the year 2004, pensions of members of the Palestinian security forces are settled in Palestinian pension agency.

Sources of funds and resources of the Palestinian Pension Agency

Palestinian Authority pension agency funds made up, according to the law, from the following sources:

1. Contributions deducted monthly (10%) of the salaries of the beneficiaries to the provisions of the law.
2. Amounts performed by entities that are committed to salaries of beneficiaries by 12.5% of them.
3. Proceeds of Agency invest funds.
4. Other resources resulting from the activity of the Agency.

Palestinian Pension Agency Department

Administrative Affairs Department

It is one of the key departments that provide the necessary services to all acts of Palestinian **Pension Agency**, where it is

divided into three main sections as follows (Approved general structural of Palestinian pension agency, 2005):

First: Department of follow-up and files.

Second: Department of Personnel.

Third: Department of Supplies and Procurement.

Administrative Affairs Department tasks

The tasks of the administrative affairs department in the following points:

First: Department of follow-up and files:

1. Make sure to complete files, documents and data for new appointment of staff and follow-up during the service in addition to the completion of the retired files, while providing the technical departments in the agency with documents, data, forms, and correspondence that is in line with the law and regulations in this regard, which requires the application of electronic document management system for the control and the proper functioning and regularity of work in all competent departments starting with the administrative Affairs Department to all the other departments.
2. Address all government ministries, municipalities and other entities concerning their employees and provide them with information about the staff in coordination with jurisdiction over the contributions and quotas of these entities.

The researchers believe the certainty of the application of electronic document management system for the same reason described in the previous paragraph referred to above.

1. Receive public employees and retired staff and provide services to them and provide them with the necessary

files to complete the procedures and requirements of the exchange dues in the agency.

2. Follow-up the completion and modification of personnel data of beneficiaries by law and supplying various departments with classified documents, according to the needs of each department.
3. Save, edit, and arrange all National Authority personnel files of users whether they are on top of their work or retired and in line with legal regulations and instructions.

Second, the functions of the Personnel Department:

1. Follow-up and save files of staff of the Agency to ensure the completion of their data in line with the variables pertaining to each employee.
2. Follow-up ongoing and everyday things such as vacations, record attendance, and movement during the work hours and others.
3. Preparing correspondence and address the General Personnel Council and all the other operators on any functional changes concerning personnel stakeholders.
4. Preparation of monthly and regularly reporting with respect to the staff of the agency and forwarded them to the General Personnel Council, which also includes lists of extra hours, attendance sheets, confidential reports, affidavits, family situation, and other reports.

The researchers see that all of these tasks can be set in a scientific and better through electronic document management system for fast delivery in all these tasks.

Third: the functions of the Department of Supplies and Procurement:

1. The department supplies and procurement specialized in purchasing supplies and the provision of all the

requirements of the agency of goods and materials required for all acts of agency and services, taking care to abide by the law of public supplies, issued by the Ministry of Finance of the Palestinian National Authority.

2. Retain business purchases and stores records and preparation of annual and periodic follow-up to the annual inventory and provide the league with all the requirements of the committees report.
3. Do all the work of the stores in the agency from saving fixed assets and under-use and following-up, registering, and concerning for their safety.
4. Following-up materials consumed and providing employees with their needs and in line with instructions issued by the Senior Executive Management in the agency.

From here, the researchers see that the best system to guarantee the functioning of the Department of Supplies and Procurement is the application of electronic documents management system to ensure good workflow more accurately and better.

Overall, dealing within the same department in Palestinian Pension Agency or the relationship with the General Personnel Council or the relationship with the organization and management with regard to military personnel, as well as all other operators or relevant ministries such as the Ministry of Finance or the Department of Finance Central or social affairs, etc. all require accurate organization and deserves management system to manage these documents, which will be faster in electronic form, can be saved, requested any time it's needed, and helps in the fast delivery of all walks of life and all other third parties. As for dealing with the public retirement employees from the civil or brothers in the military

cadre could, the electronic document management system can serves them in a manner that ensures the safety of their actions and their documents to complete their procedures of giving them their rights at the agency.

From the standpoint of the researchers, there is an urgent imperative to actually begin to apply the mechanisms and procedures for electronic document management system in all internal and external business of the agency.

General management of the affairs of offices and branches

Overall management of the affairs of offices and branches according to the map key organizational structure and management in addition to the main administration offices, one in Ramallah and one in Nablus. Thus, the overall management of the affairs of offices and branches that position Ramallah in addition to offices and its affiliates, represent one of the largest three major departments in the organizational and administrative structure of the agency, it is worth emphasizing the existence of bottlenecks in the organizational and administrative structure in terms of the amendment and additions, according to the evolution and needs of the administrative work, it is currently linked to the of numbers of beneficiaries in insurance and pensions and the possibility of providing services equally and as quickly as possible in all the territory of the Palestinian state. The researchers can summarize the most important tasks and functions as follows:

Functions and tasks of the general management of the affairs of offices and branches in the Palestinian Pension Agency

1. Organize, coordinate and follow up with offices and branches with the senior executive management of the General Pension Agency.

2. Preparation of periodic reports, memos and studies on the work and achievements of branch offices and departments and discussing them with the President of the agency and following them.
3. Follow-up and ensure the implementation of the decisions and instructions issued by the supreme executive management and Board of Directors.
4. Management and supervision of all activities of the offices and branches administratively, financially, legally, technically and make sure the procedures for implementing the activities according to the requirements of the law.
5. Follow-up and supervision of the legal work in offices and branches in the West Bank in coordination with senior executive management and specialized department in general Pension Agency which include the provision of legal advice, representation of the agency in front of the courts and the ministries and institutions of the Palestinian National Authority and third parties involved in related the work to the agency.
6. Contribute to the preparation and development of the organizational and administrative structure of the job description of the general pension agency.
7. Participation in the preparation of various studies, notes and discussing them with President of the agency for submission to the Board of Directors to discuss them and take the right decisions.
8. Participation in the preparation of the general annual reports of the agency according to the needs of the administration and the requirements of law.
9. Participation in various meetings and discussions with the senior executive management in the agency in various areas of the strategy and the daily activities of the agency.

10. Participation in the development of strategic and operational plans of the General agency of insurance and pensions.
11. Participate in the preparation and development of a system to work in offices and branches, according to the need of the administration and the requirements of the law.
12. Participation in the work of the various committees in the agency and prepare and follow-up reports .
13. Make the necessary Settlements of personnel files whose services ended according to the law and followed up with major jurisdictions in the agency.
14. Carry out the registration and examination of financial, legal and preparing of financial documents and review them and followed up with core competencies until paid.
15. Manage and organize special archive files of beneficiaries in staff offices, branches, according to the law of insurance and pensions.
16. Supervision and follow-up to the requests of branches regarding for checking, recording and following up until paid.
17. Follow the work of the agency with the Ministry of Finance and the General Personnel Council, ministries and other agencies on the application of the Pension Insurance Act with respect to offices and branches and activities, which include the following:
 - Screening and follow-up the supply of annual contributions and ensure that it is collected in accordance with the law.
 - Overseeing the receipt of correspondence, sort, and follow-up files and card processing function.
 - Overseeing the receipt of appointment decisions and conduct the examination and follow-up files of users and the cards function.

- Continue to record of the files of the beneficiaries in accordance with law.
- Management and supervision of receipt, examination and processing of employees who ended their services from civil or military personnel or retirees of the Palestine Liberation Organization and receive purchase orders for the period for the purposes of pension files, processes, thus leading financial settlements setup necessary according to the law and followed up with core competencies in the agency.

Information Technology Department

The researchers took two detailed models to talk about the need of the Administrative Affairs Department and the Department of offices and branches in the West Bank to implement document management system being the first department that audit go through them and being on direct relationship with the third party, which came by the researchers while talking about the Administrative Affairs Department as well as the office of the agency in Ramallah, since the department of information system is the relevant department to implement and monitor the document management system electronically we had to talk about the duties of this department:

Tasks of the IT department in the Palestinian pension agency

1. Organization and implementation of the activities of the Information Technology Department according to the needs of management and development, and the law requirements.
2. Participation in the development of strategic and operational plans of the agency with regard to the management of systems, information, and follow-up implementation.

3. Management and supervision of all of the Information Technology Department in the agency of the administrative and technical terms in accordance with the law.
4. Preparation of periodic reports and memos and studies on the work and achievements of the IT department of information and discuss them with the President of the agency and following them up.
5. Follow-up and coordination with financial ministry and the General Personnel Council, ministries and other bodies operating points as the electricity distribution or central financial management or organization and management with regard to cooperation and exchange of information in the field of systems management, information technology, according to the requirements and needs of the executive management and the requirements of the law.
6. Perform periodic maintenance and emergency of the devices and computer network and its accessories.
7. Preparation and follow-up of the development of computer software and systems.
8. Maintaining the integrity of the database through the maintenance and development of methods of handling data stored, resolve any problems or bottlenecks during daily use and follow-up in saving data and provide guidance and technical support to computer users in the Palestinian Pension agency.
9. Provide support and assistance in the conduct of actuarial, financial and technical studies, and through the provision of statistical data and information necessary in this regard according to the requirements and needs of senior executive management.

10. Printing and processing of cards for the staff of the agency and retired employees to give them the appropriate card.
11. Exchange of information and correspondence through e-mail locally and internationally, according to the requirements and needs of the executive management.
12. Preparation, management and design of the website of the agency <http://www.ppag.ps>.
13. Provide Palestinian banks in (Gaza - Ramallah) detailed electronic copy of civilian and military retirees, according to the instructions of the executive management.
14. Provide the Board with the Office of Ramallah and branches in the provinces of North West Bank with all the required data, as well as the monthly pension of civilian and military retirees voucher through e-mail to be sent their owners in time.

The researchers note to the terms of reference for the work of all the other departments, especially the Office of the President of the agency, the Department of Legal, Technical Affairs, the Department of the periodic pension, the Department of the settlement, drainage and department of loans, replacements, the Department of accounts, financial position, the Investment Office, branches provinces of the north West Bank, all of which have hard work cannot be overlooked, but researchers do not see the need to explore their works because the study deals with the application of electronic document management system in all departments of the Palestinian pension agency.

For example, the implementation of the secretarial work and the coordination of all acts of the Office of President of the agency with the various departments and the Office of the archive Chairman of the agency, reports, information, and

studies all events that require a system through which electronic authentication to organize the daily work and the internal and external are referenced as needed.

The life cycle of the documents required for the files of (beneficiaries, retired)

The figure below illustrates the most required documents to exist in the file for authentication to convert it to distract his dues, and illustrates the flow path of this file between the agency's departments to be placed in the archives of the administrative affairs or pension archive.

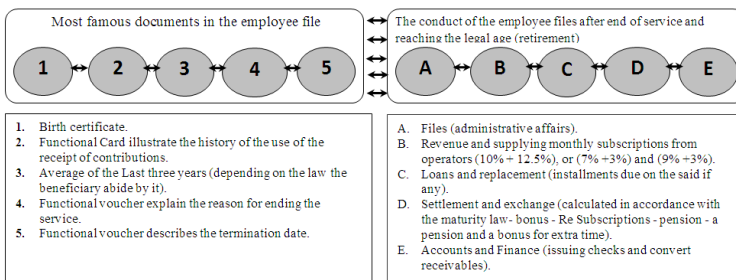


Figure 2: Documents in the file of a beneficiary in the Palestinian Pension agency and retired in accordance with law

Source: Designed by researchers

Movement within the competent departments of the Palestinian Pension Agency in preparation for paying the dues of the beneficiaries in accordance with law:

The main objective of the existence of Administrative Affairs Department is to enable departments and other departments to carry out its work to the fullest. It is distinguished from the rest of the administrative affairs departments in the ministries of various in that they follow up, receive, record and save all correspondence that pertain to all employees of the Palestinian National Authority as a new archive exceeds the archive any ministry or body being includes all correspondence of General

Personnel Council, the Finance Ministry, local authorities, municipalities, universities, Electricity distribution company, and all other beneficiaries law (insurance Law and pensions, as amended, to the staff of the Gaza Strip, 1992[7]) and (General pension Law No. (7) of 2005, as amended) .

Here, there is an urgent need for a system to manage these documents electronically and rapidly and meets all requirements meticulously as you apply the instructions and rules and regulations regarding this correspondence from all entities subject to the provisions of this law, in addition to the work of the conventional department in the ministries and institutions of authority on the work related to the unit Affairs staff, the unit of supplies purchases, stores, services, some other regular administrative work, in accordance with the requirements of the civil Service Act, as well as the requirements of the civil Service Act is amended, which requires the existence of a document management system electronically to manage it quickly and precisely, and ease the burden of the vast amount of assigned to the department.

It is worth mentioning that these departments are unique and other administrative acts specifically and particularly concerning the privacy requirements of the law and the amendments thereto, as shown in the public pension law No. 7 of 2005 and the recent amendments issued under the decisions of President Mahmoud Abbas in his capacity as President of the Palestinian National Authority.

The researchers note that the Administrative Affairs Department concerned with following up the management of all personnel files in service, users of the law of insurance, pensions and public retirement and which have increased recently as a natural result of increasing the number of staff where the correspondence relating to appointments, promotions and grades, allowances and leave without pay and transfer, loan and so on.

It has become necessary to pursue these things in document and electronically even after the employee's termination of service (either resignation, dismissal, termination due to reaching the legal age, referral to the pension, early referral to retirement, death, or invalidity). Where follow-up and processing of files of staff that their services ended, and so by the evacuation of a party files on the same document of service on other side of the form, as follows:

A. Administrative Affairs:

Where the reason of the decision to terminate his service and the date of the beneficiary's separation from service after the audit is done by specialists are checked, decisions issued in connection with the said service terminated whether violating the law and regulations or not provided that they conform to the instructions of the Council of the Palestinian pension agency, as well as the policy of senior Executive management Authority.

B. Revenue:

Where the codification of the value of the last subscription, as well the subscription of the last three years so the value from which to determine the value of maturity, as well as the differences are recorded incoming and outstanding whether received or not to claim it in accordance with the law.

C. Loans:

Where the codification of all debts due from loans in installments in the mentioned custody, if any, are deducted up towards the necessary work of the said body or installments receivables as the case.

D. Settlement and disbursement:

Where the file is converted after the specific documents required for the disbursement of entitlements in accordance with the requirements of the law and the demands are met, to study the file in the settlement and disbursement department to determine the maturity of response subscriptions, exchange bonuses, pension, or only a pension and a bonus for excessive length according to the case, and entitlements are determined in accordance with specific variables and taken into account (the beneficial service period, the reason for termination, other premium subscription of the last three years, age at the termination date, class, category, bonuses), through these determinants according to the amended law the civil service, according to the law of insurance and pensions No. 8 of 1964 or according the Law of the public pension No. 7 of 2005 [8], under the law of insurance and pensions for the security forces No. 16 of 2004, or according to the civil Service Retirement Act No. 34 of 1959 which defines maturity according to the law.

E. Accounts:

Where the file is converted after the completion of the work done in the settlement department and the exchange rate for the implementation of financial entitlement in accordance with the settlement form and disbursement of the beneficiary to check the calculations after your payment order processing transaction, each according to his entitlement and are accounting entries in preparation for final scrutiny and processing of the required checks or transfer according to requirements of the law and building on the willingness of the beneficiary, especially with regard to beneficiaries entitlement of the provinces of the north West Bank. With a note that direct coordination with the department of retirement in the Palestinian pensions agency to link the pension.

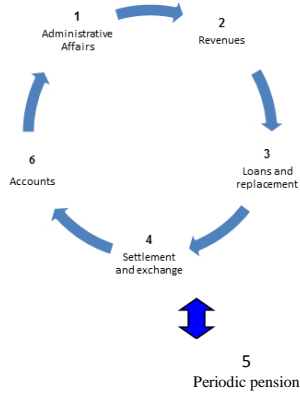


Figure 3: The file movement within the competent departments of the Palestinian agency in preparation for retirement pays of the dues to the beneficiaries in accordance with law

Source: Designed by researchers

Through the study, it is clear that the Palestinian retirement body needs an electronic system for document management in all departments of the agency, the increasing demand of many third parties dealing with electronic documents, they need of unified electronic archive with the presence of several archives and paper distributed geographically to 10 archives in Gaza (Archive subscribers municipalities and electricity company in the floor under the ground, a government sector subscribers in the archive under the ground floor, Archive subscribers government sector is on the fourth floor, beneficiaries of 8-1964 Archive by law in the basement, beneficiaries of 7-2005 Archive by law in the basement, beneficiaries Security forces Archive by Law 16-2004 on the first floor, archive of beneficiaries of the security forces by Law 7-2005 on the third floor, the main beneficiaries of the archive decision to retire by Law 7-2005 on the third floor, archive of financial accounts transactions on the second floor, archive of transactions Subscriptions on the first floor), and two archives in Ramallah headquarters (beneficiaries of archives of civil Service Retirement Act No. 34

of 1959 under the Ground floor, Archive of subscribers sector is a government bank in the basement) and with increasing numbers of subscribers and users has reached the number of subscribers - government sector 90,382, the number of subscribers in non-governmental sector 5364, civil beneficiaries government sector 11,740, the civil beneficiaries - a non-governmental sector 50, the beneficiaries of the security forces 9175, beneficiaries of the PLO in 1150 and users basic retirement is 1265 cases according to the president's decision in the public pension law No. 7 of 2005.

Thus the project archiving electronic documents was launched in the archives of paper in the agency. A contract with a specialized consulting firm, namely, (Pal Tech) was made for a period of six months to transfer the papers to electronic copies. More than one million, three hundred thousand civilian's paper (1,338,935) has been completed as follows:

- The number of papers that have been archived in West Bank (329,781).
- The number of papers that have been archived in Gaza (1,009,154).

Still remaining one million and two hundred thousand civilians papers, and two million military papers, which is required from Palestinian Pension agency to complete the archive of the remaining three million two hundred thousand papers. This number is increasing every day because of the daily movements on the subscriber files, where the current study met with the study of Izz al-Din [6] that the archive size increases in inflation; where each file may have around 200 document in different sizes, the slowness in dealing with the current archiving system, increased costs, and the possibility that some of its contents to be lost after using them by competent, damage is certain to some paper documents makes it more complicated to use, and the urgency of this historical paper files are concentrated in that it constitutes a system in terms of

information administratively, so by integrating these files with electronic records that are on the Agency database.

In parallel, the information technology department have converted the models and manual applications in public administrations to subscribers only as an electronic and adding bard code to them, developed the agency programs to integrate them with the electronic archiving system, and to date hand models in the rest of the departments has not been delivered to information technology to turn them into electronic models, add barcode to them, and incorporate them with the archiving system. This increases the problem of rising manual accumulation and not entering them into the electronic archiving system.

STUDY RESULTS

Through the analytical empirical study, and interviewing the staff in the agency, the researchers conclude the following results:

1. That the reality of the current system for the management of documents in the agency is weak and suffers from many bottlenecks. After studying the system it is clear there is a lack of the following requirements: a written plan for current document management, systems, computerized document management (incoming and outgoing), a qualified archive employee who is scientifically competent to manage the archive, a unified classification system, the use of international standards ISO-15489, mechanisms for migrating documents to the Palestinian National Archive, a plan for the security of documents in the case of disasters, training in the field of documentation and archiving management; and because of the refusal of staff to Handle files and follow-up specific times between

different departments easily and regularly with the absence of the role of the administrative control with the work in the agency largely dependent on document management.

2. There is a commitment by senior management in the development and support of electronic document management system, by providing both financial support and laws of the electronic system. Members of the community of study have a weak degree of agreement on both the deployment of the senior management of the culture of the use of electronic documents and benefits of the management system, and informing senior management on the experiences of other institutions and companies with regard to electronic document management system.
3. Employee in the agency understand the importance and benefits of the management of electronic documents system, where the application of electronic document management system provide important features and benefits most of which reduce the loss of documents between departments, illustrates the flow path, the speed, accuracy, transparency, and reduce the proportion of damage and destruction of files. Furthermore, the electronic documents system cost will be less than the cost of the current system and it will reduce the tasks assigned for the staff.
4. Provide technical background (dealing with computer and its accessories) and the level of education among the staff.
5. Availability of infrastructure at the agency and its ability to provide a suitable infrastructure able to adapt to the electronic document management system.
6. Employing the latest computer to work in the agency. This result is due to the presence of a great interest by

the administration in the provision and employing of computers in the agency; which contributes significantly in provide funds and technical measures for the implementation of the electronic system.

7. The existence of a clear adoption of the agency for the policies and procedures established for the application of electronic documents management system.
8. There are weak plans for training and developing of staff in the agency to raise their efficiency.

STUDY RECOMMENDATIONS

Through the analytical empirical study, and interviewing the staff in the agency, the researchers conclude the following recommendations:

1. Increased interest and awareness of the need to implement policies, mechanisms, and procedures to ensure the success of electronic document management system through benefiting from the experiences of other organizations and the private sector.
2. The agency needs to focus on identifying its strategic objectives and progress and the selection of appropriate policies and methods to achieve them in a careful and thoughtful way.
3. The agency need to increase and develop its services for retirees in order to encourage the private sector, universities, and institutions to join the agency, and open the way for all segments of society in Gaza and West Bank and enhance its competitiveness between international social security institutions.
4. The need to focus its attention on developing and publishing appropriate clear plans and specific goals about management of electronic documents and the agency should be committed to apply them.

5. The need to focus on the establishment of a public management of archiving in the structure dealing with all technical operations and having competent and qualified employees in the field of electronic document management.
6. Preparation of training plans for employees in the agency that is interactive within the general framework for computer literacy and to provide the necessary training for administrative development in all its branches and forms. This requires identification of training needs on a scientific basis so that appropriate training can be useful.
7. Enhance interest in the development of a centralized computer network linking the headquarters of the agency in Gaza Strip to the rest of the branches in the West Bank, in order to ensure the implementation of electronic document management system and the ability to hold meetings through video conference and the ability to exchange electronic copies of data.
8. Enhance interest in the website of the agency by activating it to be able to provide e-services; by linking it with interactive database, deployment of plans, policies, and decisions, activities, news, and set up e-mail to all employees in order to allow them to correspondence by mail, automating all transactions with the document management system.
9. The need to focus on the Palestinian National Archives and the follow-up with the international standards by the International Council on Archives (ICA).
10. The need for the attention to developing strategic plans and policies to suit the electronic government in the field of electronic document management, so that it is linked to the central computer network of the agency with its own e-government computer network in order to ensure

the success of the electronic communication of correspondence process incoming and outgoing between the agency and the General Personnel Council and other ministries, agencies, institutions, private sector, and universities.

REFERENCES

1. Al-Sherif, Ashraf, "Evaluation of archival documents," aware of the House of Culture, Cairo University, Cairo, Egypt, 2002.
2. Al-Agha, Bassam, "works of modern offices and secretarial," the prospects for a library, Gaza, Palestine, 2007.
3. Hammouda, Mahmoud, "Archive and its role in information services ", Dar ghareb for printing, publishing and distribution, Cairo, Egypt, 2003.
4. Al-Jimi, Nasser, "The modern system for the management of historical documents and databases," Journal of Arabic 3000, No. 3, Riyadh, Saudi Arabia, 2001.
5. Bjajh, Abdul Karim, "electronic documents: a guide Alorchiven (ICA)", International Council on Archives, Paris, France, 2006.
6. Izz al-Din, hebatoallah, "preservation and retrieval of documents and social security archives of the Ministry of Interior methods," (Master Thesis), Cairo University, Cairo, Egypt, 2004.
7. Insurance Act, as amended, and pensions for the staff of the Gaza Strip, issued by the Department of Insurance and Pension Fund in Gaza, 1992.

8. Insurance Act, pensions, issued the decision-Law No. 8 of 1964, according to the latest amendments in May 1999.
9. <http://www.e-gov.ps>.
10. Jacquelyn K. Sundstrand,"Placing Manuscript and Archival Collections into an Automated Storage and Retrieval System at the University of Nevada, Reno", *Journal of Archival Organization*, 6:1-2, 71-80, oct 2008.
11. Simon, J., Chaney & Lillian H., "SYSTEM AND PROCEDURES FOR THE MODERN OFFICE", NJ., USA. 1998.
12. UK National Archives,"e-records: route map and milestones to achieve electronic records management", *Journal of the Society of Archivists*, Volume 25, Issue 1 April 2004 , pages 63 - 70. <http://www.pro.gov.uk/recordmanagement/erecords/route-map7.pdf>
13. http://www.records.snw.gov.au/recordkeeping/dirks-recordkeeping-systems_1783.asp
14. <http://www.Archives.gov>
15. <http://www.ppag.ps>.
16. Abdelwahed, A. S., Mahmoud, A. Y., & Bdair R. A. (2017). Information Security Policies and their Relationship with the Effectiveness of the Management Information Systems of Major Palestinian Universities in the Gaza Strip. *International Journal of Information Science and Management*. 15(1) 1-26.
17. Ahmed, Y. M., & Chefranov, A. (2011). Hill cipher modification based on pseudo-random eigen values HCM-PRE. *Applied Mathematics and Information Sciences (SCI-E)*, 8(2), 505-516.

18. Chefranov, A. G., & Mahmoud, A. Y. (2010, September). Elgamal public key cryptosystem and signature scheme in GU (m, p, n). In Proceedings of the 3rd international conference on Security of information and networks (pp. 164-167). ACM.
19. Doukhnitch, E., Chefranov, A. G., & Mahmoud, A. (2013). Encryption Schemes with Hyper-Complex Number Systems and Their Hardware-Oriented Implementation. Theory and Practice of Cryptography Solutions for Secure Information Systems, 110.
20. Mahmoud, A. Y. A. (2012). Development of Matrix Cipher Modifications and Key Exchange Protocol.
21. Mahmoud, A. Y., & Chefranov, A. G. (2009, October). Hill cipher modification based on eigenvalues hcm-EE. In Proceedings of the 2nd international conference on Security of information and networks (pp. 164-167). ACM.
22. Mahmoud, A. Y., & Chefranov, A. G. (2010, May). Secure Hill cipher modifications and key exchange protocol. In Proc of 17 th IEEE International Conference on Automation, Quality and Testing, Robotics AQTR.
23. Mahmoud, A. Y., & Chefranov, A. G. (2012). Secure hill cipher modification based on generalized permutation matrix SHC-GPM. Information Sciences Letters, 91-102.
24. Mahmoud, A. Y., & Chefranov, A. G. (2014). A Hill Cipher Modification Based on Eigenvalues Extension with Dynamic Key Size HCM-EXDKS. International Journal of Computer Network and Information Security, 6(5), 57.

25. Mahmoud, A. Y., & Mahdi, A. O. (2016). Comments On Multi-window Against Mobile Application Lock. *Journal of Multidisciplinary Engineering Science Studies (JMESS)*, 2(Issue 5, May - 2016), 494-497.
26. Mahmoud, A., & Chefranov, A. (2014). Hill cipher modification based on pseudo-random eigenvalues. *Appl. Math*, 8(2), 505-516.
27. Naser, S. S. A. (2015). SL5 Object: Simpler Level 5 Object Expert System Language. *International Journal of Soft Computing, Mathematics and Control (IJSCMC)*, 4(4), 25-37.
28. Naser, S. S. A., & Hasanein, H. A. A. (2016). Ear Diseases Diagnosis Expert System Using SL5 Object. *World Wide Journal of Multidisciplinary Research and Development (WWJMRD)*, 2(4), 41-47.
29. Naser, S. S. A., & Akkila, A. N. (2008). A Proposed Expert System for Skin Diseases Diagnosis. *Journal of Applied Sciences Research*; www.aensiweb.com/JASR/, 4(12), 1682-1693.
30. Naser, S. A., & Lmursheidi, S. (2016). A Knowledge Based System for Neck Pain Diagnosis. *World Wide Journal of Multidisciplinary Research and Development (WWJMRD)*, 2(4), 12-18.
31. Akkila, A. N., & Naser, S. S. A. (2016). Proposed Expert System for Calculating Inheritance in Islam. *World Wide Journal of Multidisciplinary Research and Development*, 2(9), 38-48.
32. Naser, S. S. A., & Al-Bayed, M. H. (2016). Detecting Health Problems Related to Addiction of Video Game Playing Using an Expert System. *World Wide Journal of Multidisciplinary Research and Development*, 2(9), 7-12.

33. Naser, S. S. A., & AlDahdooh, R. M. (2016). Lower Back Pain Expert System Diagnosis And Treatment. *Journal of Multidisciplinary Engineering Science Studies (JMESS)*, 2(4), 441-446.
34. Naser, S. S. A., & Al-Hanjori, M. M. (2016). An expert system for men genital problems diagnosis and treatment. *International Journal of Medicine Research*, 1(2), 83-86.
35. Naser, S. S. A., & Bastami, B. G. (2016). A Proposed Rule Based System for Breasts Cancer Diagnosis. *World Wide Journal of Multidisciplinary Research and Development*, 2(5), 27-33.
36. Naser, S. S. A., & El-Najjar, A. E. A. (2016). An expert system for nausea and vomiting problems in infants and children. *International Journal of Medicine Research*, 1(2), 114-117.
37. Naser, S. S. A., & Haddad, I. A. E. (2016). An Expert System for Genital Problems in Infants. *World Wide Journal of Multidisciplinary Research and Development*, 2(5), 20-26.
38. Naser, S. S. A., & Hamed, M. A. (2016). An Expert System for Mouth Problems in Infants and Children. *Journal of Multidisciplinary Engineering Science Studies (JMESS)*, 2(4), 468-476.
39. Naser, S. S. A., & Hilles, M. M. (2016). An expert system for shoulder problems using CLIPS. *World Wide Journal of Multidisciplinary Research and Development*, 2(5), 1-8.
40. Naser, S. S. A., & Shaath, M. Z. (2016). Expert system urination problems diagnosis. *World Wide Journal of Multidisciplinary Research and Development*, 2(5), 9-19.

41. Naser, S. S. A., & Zaqout, I. S. (2016). Knowledge-based systems that determine the appropriate students major: In the faculty of engineering and information technology. *World Wide Journal of Multidisciplinary Research and Development*, 2(10), 26-34.
42. Naser, S. S. A., & Shobaki, M. J. A. (2016). 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)*, 2(5), 505-512.
43. Naser, S. S. A., & Shobaki, M. J. A. (2016). 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*, 2(4), 32-40.
44. Naser, S. S. A., & Shobaki, M. J. A. (2016). The Impact of Management Requirements and Operations of Computerized Management Information Systems to Improve Performance (Practical Study on the employees of the company of Gaza Electricity Distribution). In *First Scientific Conference for Community Development*, 5-6 November, 2016 (pp. 1-28). Al-Azhar University of Gaza, Palestine.
45. Al Shobaki, M. J., & Naser, S. S. A. (2016). Decision support systems and its role in developing the universities strategic management: Islamic university in Gaza as a case study. *International*

- Journal of Advanced Research and Development, 1(10), 33-47.
46. Al Shobaki, M. J., & Naser, S. S. A. (2016). Performance development and its relationship to demographic variables among users of computerized management information systems in Gaza electricity Distribution Company. *International Journal of Humanities and Social Science Research*, 2(10), 21-30.
 47. Al Shobaki, M. J., & Naser, S. S. A. (2016). The Dimensions of Organizational Excellence in the Palestinian Higher Education Institutions From The Perspective Of The Students. *Global Journal Of Multidisciplinary Studies*, 5(11), 66-100.
 48. Naser, S. S. A., & Al Shobaki, M. J. (2016). Computerized Management Information Systems Resources and their Relationship to the Development of Performance in the Electricity Distribution Company in Gaza. *European Academic Research*, 9(8), 6969-7002.
 49. Al Shobaki, M. J., Amuna, Y. M. A., & Naser, S. S. A. (2017). Strategic and Operational Planning As Approach for Crises Management Field Study on UNRWA. *International Journal of Information Technology and Electrical Engineering*, 5(6), 43-47.
 50. Naser, S. S. A., Baraka, M. H., & Baraka, A. (2008). "A Proposed Expert System For Guiding Freshman Students In Selecting A Major In Al-Azhar University, Gaza", *Journal of Theoretical & Applied Information Technology*, 4(9).
 51. Abu Naser, S. (1993). A methodology for expert systems testing and debugging. North Dakota State University, USA.

52. Abu-Naser, S. S., Kashkash, K. A., & Fayyad, M. (2010). Developing an expert system for plant disease diagnosis. *Journal of Artificial Intelligence ; Scialert*, 3(4), 269-276.
53. Abu-Naser, S.S., El-Hissi, H., Abu-Rass, M., & El-Khozondar, N. (2010). An expert system for endocrine diagnosis and treatments using JESS, *Journal of Artificial Intelligence, Scialert*, 3, 4,239-251.
54. Azaab, S., Naser, S. A., & Sulisel, O. (2000). A proposed expert system for selecting exploratory factor analysis procedures. *Journal of the College of Education*, 4(2), 9-26.
55. Naser, S. A., Al-Dahdooh, R., Mushtaha, A., & El-Naffar, M. (2010). Knowledge Management in ESMDA: Expert System for Medical Diagnostic Assistance. *AIML Journal*, 10(1).
56. Naser, S. S. A. (1999). Big O Notation for Measuring Expert Systems complexity. *Islamic University Journal - Gaza*, 7(1), 77-57.