بسم الله الرحمن الرحيم

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Business Administration

THE REALITY OF ORGANIZATIONAL AND BEHAVIORAL FACTORS TOWARDS KNOWLEDGE RETENTION IN ISLAMIC UNIVERSITY OF GAZA

واقع العوامل التنظيمية والسلوكية نحو الاحتفاظ بالمعرفة
في الجامعة الإسلامية بغزة

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JANUARY 2015

Verse from the Holy Quran

بسم الله الرحمن الرحيم

صدق الله العظيم (طه:114)

إهداء

إلى رجل العلم الأول في حياتي

سعادة المربي الفاضل والأب الحنون/ الأستاذ حلمي علي حماد

إلى والدتي الحنون

ندى عبد العزيز العطار

التي كابدت عناء الحياة، وعاركت قسوة الزمان لنصل إلى ما وصلنا إليه

إلى زوجتي الغالية هدى

وإلى أولادي

حلمي، سندس، حمزة، رزان، عز الدين، علم الدين وشمس الدين

إلى إخواني

ابتسام، نبيل، سمير، سوسن، أمين، رمزي، ريم، باسل ومها

إلى أصدقائي الذين أقنعوني بالعودة إلى مقاعد الدراسة

عبد الكريم رضوان، إسماعيل قاسم، سمير مطير، محمود الكرد وعائد الربعي

لهم جميعاً أهدي هذا النجاح

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Isam H. Hammad

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Abstract

This study aims to test the reality of organizational and behavioral factors towards knowledge retention at the Islamic University of Gaza. The researcher used the descriptive analytical method and utilized both primary and secondary sources in order to design a structured questionnaire including (62) close ended questions was distributed and used in this study as an instrument tool. The study population consisted of all the 88 IUG top ranking employees who are the president and his deputies, deans and their deputies, heads of departments and finally college directors. The researcher achieved a response rate of 78%. The researcher used (SPSS) package for data analysis and hypotheses testing.

The study found the following results.

1- IUG identifies the type of knowledge to be retained, store it in an appropriate manner; however, departure of experts did not constitute any risk to the university's performance. These factors together form the level of awareness, which is found to be at a moderate level with a total mean of (6.94).

2- IUG work constantly to create new knowledge, determine the type of knowledge needed to accomplish tasks, identify staff experiences and skills that should be retained, and sponsor the rights of innovation and excellence to their employees. These factors together form the level of attention to the issue of knowledge retention, which is found to be at a high level with a total mean of (7.11).

3- The study demonstrated a high level of knowledge retention at IUG, with a total mean (7.38).

4- The organizational and behavioral factors level of presence have also confirmed the above results and found to have a total mean of (7.33) and (7.44) respectively.

5- The study concluded that IUG observes the organizational and behavioral factors towards knowledge retention, which in turn enabled this academic institution to be considered a knowledge retention organization.

The following are the most important recommendations of the study:

- ❖ Encouraging quality dept. at IUG to include knowledge retention as sector that requires continuous observation, measurement and improvement.
- ❖ Increasing awareness to knowledge retention between IUG employees.
- ❖ Examining each factor influence on knowledge retention in an elaborated manner.

ملخص البحث

هدفت هذه الدراسة إلى اختبار واقع العوامل التنظيمية والسلوكية نحو الاحتفاظ بالمعرفة في الجامعة الإسلامية بغزة، وقد استخدم الباحث المنهج الوصفي التحليلي وكل من المصادر الأولية والثانوية لتصميم استبيان يحتوي على (62) سؤال كأداة لاختبار فرضيات الدراسة. وقد تكون مجتمع الدراسة من كافة موظفي الفئات العليا بالجامعة وعددهم 88 موظفاً وهم، الرئيس ونوابه وعمداء الكليات ونوابهم ورؤساء الأقسام ومدراء الكليات. حقق الباحث معدل استجابة بنسبة 78٪، واستخدم البرنامج الإحصائي(SPSS) لتحليل البيانات واختبار الفرضيات.

وقد توصلت الدراسة إلى النتائج التالية.

1-تحدد الجامعة الإسلامية بغزة نوع المعرفة التي يتوجب الاحتفاظ بها وتقوم بحفظها بطريقة مناسبة، بينما لا يشكل رحيل الخبراء خطراً كبيراً على أداء الجامعة، وهذه العوامل تشكل معا مستوى الوعي بالاحتفاظ بالمعرفة وقد وجدت على مستوى متوسط وبمعدل إجمالي (6.94).

2-تعمل الجامعة الإسلامية باستمرار على خلق المعرفة الجديدة، وتحديد نوع المعرفة اللازمة لإنجاز المهام، وتحدد الخبرات والمهارات التي ينبغي الاحتفاظ بها، وترعى حقوق الإبداع والتميز لموظفيها. هذه العوامل تشكل معا مستوى الانتباه إلى قضية الاحتفاظ المعرفة وقد وجدت على مستوى عال وبمتوسط إجمالي بلغ (7.11).

3-أثبتت الدراسة وجود مستوى عال من الاحتفاظ بالمعرفة لدى الجامعة وبمتوسط إجمالي بلغ (7.38).

4-أكدت الدراسة اهتماما عاليا بالعوامل التنظيمية والسلوكية لدى الجامعة، وهو ما أكد النتائج المذكورة أعلاه وبلغ المتوسط الحسابي للعوامل التنظيمية (7.33) بينما بلغ المتوسط الحسابي للعوامل السلوكية (7.44).

وخلصت الدراسة إلى أن الجامعة الإسلامية تراعي العوامل التنظيمية والسلوكية نحو الاحتفاظ بالمعرفة وهو ما مكن الباحث من تسمية هذه المؤسسة الأكاديمية بجامعة الاحتفاظ بالمعرفة.

وفيما يلي أهم توصيات الدراسة:

- ❖ تشجيع قسم الجودة بالجامعة الإسلامية لجعل الاحتفاظ المعرفة قضية تتطلب المراقبة والقياس والتحسين بشكل مستمر.
- ❖ زيادة الوعي للاحتفاظ بالمعرفة بين موظفي الجامعة الإسلامية بغزة.
- ❖ توسيع الدراسة لتشمل تأثير كل عامل على الاحتفاظ المعرفة بشكل منفرد.

CHAPTER ONE

General Framework

1.1 Introduction

According to Oxford dictionary, the definition of knowledge is, "facts, information, and skills acquired through experience or education". Stanley cavell (2002), the American philosopher, sees that knowledge acquisition involves complex cognitive processes: perception, communication, association and reasoning. Highly knowledgeable and experienced employees are very important to the organization, and there has been growing concern in the business and organizational sector that organizational knowledge can be lost through the exit of skilled employees, whether the exit is natural due to retirement or accidental by death or health concerns. According to DeLong and Davenport (2003), unprecedented knowledge retention problems are created in many industries through changing workforce demographics such as an aging workforce, more competitive recruiting and faster turnover in younger people. Learning from past experiences will not be valid and active in any organization, unless appropriate knowledge resides within the organization and is easily accessible to the right people to enable them to do their jobs (Du Plessis, 2003). Identifying the appropriate knowledge and retaining it may not be an easy process and requires identifying the organizational and behavioral factors towards knowledge retention within the organization.

The Islamic University of Gaza is an independent academic institution supervised by the Ministry of Higher Education, IUG was established in 1978 and ever since it has become a member of four associations: Association of Arab Universities, Federation of the Universities of the Islamic World, Community of Mediterranean Universities, and International Association of Universities. In addition, IUG works closely with numerous universities around the world. The IUG provides for its students an academic environment that adheres to Islamic principles as well as Palestinian traditions and customs. It also provides all available resources, including the most up-to-date technology in service of the education process (IUG website).

IUG has a clear vision to be a beacon of knowledge, culture, and human services that seeks to create a comprehensive social revival, in order to achieve its vision, IUG strives to

raise the educational, cultural, and civilization levels in the Palestinian society, to keep up with current trends in higher education and technology advancements, to encourage scientific research, and to contribute in building future generations and developing the society in a framework of Islamic values (IUG website).

IUG has been attacked by the Israeli Occupation several times, air attack, killing of personnel and jailing professors at the border crossing, for this reason knowledge retention is an important issue for the wellbeing of the university.

Studying the reality of the organizational and behavioral factors towards Knowledge retention shall enable IUG to know where it stands and how it can enrich the value of knowledge retention by strengthening the weak factors.

1.2 Research Problem

The amount of knowledge that passes within an organization is directly proportional with time, expertise leaving the organization, retirement, deaths, bad repository amongst other factors shall cause a threat to this knowledge. According to Huber (1999), both the experts and their expertise represent valuable assets, and this asset may be lost from the organization upon their departure. As we are living in the fast growing era of knowledge revolution, it is vital for the organization to study the factors influencing the knowledge retention. Also, to see if it is taking the necessary measures to prepare a solid infrastructure to retain this knowledge within the organization. Hence, this study comes to answer the following question:

What is the reality of the organizational and behavioral towards knowledge retention at the Islamic University of Gaza (IUG)?

1.3 Research Objectives

This research aims to achieve the following objectives:

1. To shed the light on knowledge retention issue at the IUG.
2. To test the organizational and behavioral factors towards knowledge retention at the IUG.
3. To assess the level of awareness and attention to the issue of knowledge retention between the respondents to the questionnaire.

4. To submit recommendations towards giving more attention to the issue of knowledge retention.

1.4 Research importance

Knowledge management is gaining a growing importance in the twenty first century as a strategic source to achieve sustainable competitive advantage. The practices of learning and continuous improvement of operations is knowledge dependent. This is because knowledge represents the backbone of modern organizations in their efforts to adapt to the requirements of the knowledge economy era. Knowledge retention is a new subject that has only emerged in the last ten years to assist organizations to retain the knowledge flows within and reduces the effects of experienced personnel departure.

This study is one of the first few studies that discusses knowledge retention and investigates the reality of organizational and behavioral factors towards knowledge retention in IUG which has been the target for the Israeli attacks several times and in several forms.

In the war on Gaza in 2012, IUG has been attacked by the Israeli air force and left a total destruction to the laboratories building. In the war of 2014 IUG has lost a number of employees, the Israeli authorities has also jailed a number of professors and employees at the border crossing with Gaza.

In the light of the above, studying the reality of the factors towards Knowledge retention shall enable IUG to know where it stands and how it can enrich the value of knowledge retention by strengthening the weak factors and also enables the institution to be able to develop and grow continuously without fear of the loss of skilled cadres and expert, something that occurs naturally through several factors including, retirement, travel, scholarships, transition to another job, illness or even death which can happen naturally or by bullets and missiles of the treacherous Israeli occupier.

In addition to the above, the researcher hopes to attract attention of IUG top management to this important subject, guides the Arab researchers towards the exploration of the relationship between organizational and behavioral factors and knowledge retention, and its role in advancing development and innovation and continuous improvement processes, and also hopes that this study be a breakthrough for further Studies in this growing field.

1.5 Research Variables

Independent Variable	Dependent Variable
Organizational Factors	**Knowledge Retention at IUG** • **Knowledge Retention Dimensions** 1. Knowing & Learning 2. Creating 3. Sharing 4. Transferring 5. Applying
Strategy implementation	
Performance management	
Knowledge at risk	
Organizational support	
Behavioral Factors	
Power play	
Knowledge growth	
Leadership	
Knowledge attitudes and emotions	

Table 1.1: Dependent and independent variables of the study.

1.6 Research Hypotheses

H1: There is low level of awareness to the issue of knowledge retention at the IUG, (at $\alpha = 0.05$ level).

H2: There is low level of attention given to the issue of knowledge retention at the IUG, (at $\alpha = 0.05$ level).

H3: There is a significant relationship between the organizational factors and the level of knowledge retention at the IUG, (at $\alpha = 0.05$ level).

H4: There is a significant relationship between the behavioral factors and the level of knowledge retention at the IUG, (at $\alpha = 0.05$ level).

H5: There are no significant differences among respondents at ($\alpha \leq 0.05$) towards the organizational and behavioral factors towards knowledge retention due to personal characteristics (experience, age, gender, educational level and job in IUG).

1.7 Research Framework

This study aims to investigate the reality of the eight organizational and behavioral factors towards Knowledge retention in IUG, test the level of knowledge retention in IUG and also test the level of awareness and attention to knowledge retention between top rank employees of IUG. The main five dimensions of knowledge retention shown in the center of the framework diagram and named, knowing and learning, creating, sharing, transferring, and applying, are thought to have a significant relationship with the organizational and behavioral factors shown in the right and left boxes of the diagram below respectively.

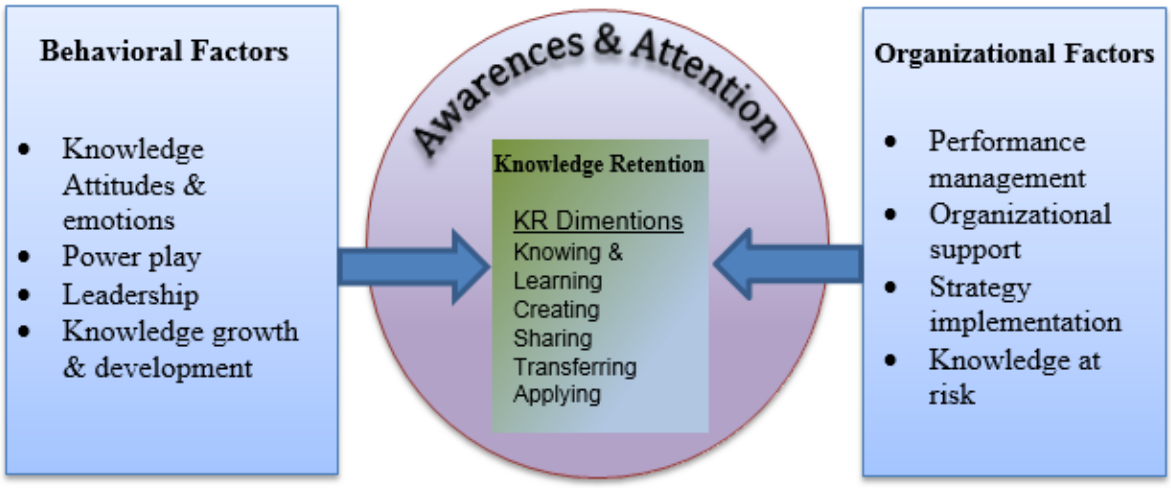

Figure 1.1: The interrelationship between and among study factors. Source: Adapted by the researcher

1.8 Keywords

Knowledge management; knowledge loss; knowledge retention; knowledge behaviors; tacit knowledge; cognitive knowledge; strategy implementation; leadership; knowledge at risks; knowledge attitudes and emotions; power play; knowledge growth; performance management; and organizational support.

- ***Knowledge Management:*** Davenport (1994), claims that knowledge management is the process of capturing, distributing, and effectively using knowledge.
- ***Knowledge Loss:*** It is about a decrease in the capacity to solve problems, make decisions, and perform effective actions (DeLong 2004).
- ***Knowledge Retention:*** The capture of knowledge/expertise from employees before they leave an organization (Kim 2005).
- ***Tacit Knowledge:*** Knowledge that cannot be adequately articulated by verbal means (Wellman, 2009).
- ***Explicit Knowledge:*** Knowledge that is fairly easy to identify, store, and retrieve (Wellman, 2009).
- ***Knowledge Related Behaviors:*** Behaviors related to learning, knowing, creating, sharing, transferring and applying knowledge in an organization (Martins, 2010).
- ***Strategy Implementation:*** Putting the process through which a chosen strategy is put into action.
- ***Leadership:*** Leadership has been described as a process of social influence in which one person can enlist the aid and support of others in the accomplishment of a common task (Chemers, 1997).
- ***Power Play:*** According to Collins dictionary, power play is the set of behaviors or tactics intended to magnify a person's influence or power.
- ***Perceived Organizational Support:*** Is the degree to which employees believe that their organization values their contributions and cares about their well-being and fulfills employees' socioe-emotional needs (Rhoades and Eisenberger, 2002).

CHAPTER TWO

Knowledge Management and Knowledge Retention

2.1 Introduction

This section consists of nine subsections. The first section conceptualizes knowledge and discusses the difference between data, information and knowledge. The second section defines knowledge. The third section introduces the two types of knowledge. The fourth section addresses the carriers of knowledge. In the fifth section, the importance of knowledge as an organization asset is enlightened. The sixth sections demonstrates the relation between knowledge and the organizational competitive advantage. The seventh section discusses knowledge management. Knowledge retention is introduced in the eighth section, and the ninth section discusses knowledge retention dimensions.

2.2 Knowledge

2.2.1 Conceptualization of Knowledge

The complex nature of the concept of knowledge requires a thorough investigation of different definitions to knowledge. This would enable the researcher to define and conceptualize knowledge in order to differentiate between the types of knowledge to identify the knowledge that could be lost and should be retained within the organizations. However, the researcher is emphasizing on knowledge with a strong focus on knowledge management, especially tacit knowledge that is embedded in the brain of employees and in the structure, processes and procedures of the organization. However, the researcher for reasons related to the title of this study will emphasize on knowledge retention from an organizational and behavioral development perspective. Shedding the light on the differences between ***Data, Information and Knowledge*** would constitute a suitable entrance to this chapter.

1. **Data**

Data is a set of discrete, objective facts about events (Davenport and Prusak, 1998). It could be considered as the raw materials that can be processed to produce information. In an organizational context, data is most usefully described as structured records of transactions.

To explain the concept of data we may consider the following scenario in which a customer goes to a market to buy fruit, this purchase can be partly described as data: The data tells nothing about why he went to that market and not another one, and can't predict how likely he is to come back. When he made that purchase we cannot tell how many kilos he bought, or what type of fruit he bought and how much he paid, this little piece of data has no information in it. Information is "data endowed with relevance and purpose", which suggests that data by itself has little relevance or purpose (Drucker, 2008).

2. Information

Information is an organized data that provides judgment and interpretation (Meadows, 2001). It could be described as a message, usually in the form of a document or an audible or visible communication (Davenport and Prusak, 1998). As with any message, it has a sender and a receiver. Information is meant to change the way the receiver perceives something, to have an impact on his judgment and behavior. It must inform. The word "inform" originally meant "to give shape to" and information is meant to shape the person who gets it, to make some difference in his outlook or insight.

3. Knowledge

Knowledge is derived from information as information derived from data. Information becomes knowledge once it is processed in the mind of individuals (Alavi and Leidner, 2001). Knowledge is obtained from individuals or groups of knowers, or sometimes from organizational ro1utines. It is delivered through structured media such as books and documents, and person-to-person contacts ranging from conversations to apprenticeships. Knowledge allows us to act more effectively than information or data and provides us with a greater ability to predict future outcomes (Jashapara, 2004).

2.2.2 Definitions of Knowledge

Oxford dictionary defines knowledge as facts, information, and skills acquired through experience or education (Oxford, 2013). Webster dictionary describes knowledge as the fact or condition of knowing something with familiarity gained through experience or association (Webster, 2013). Quintas (2002) sees knowledge as the accumulated experience that resides in the minds of employees and has not been codified or made explicit. Davenpoort and Prusak (1998) define knowledge as a fluid mix of framed experience, values, contextual information and expert insight that provides a framework for evaluating and incorporating new experience and information. It originates and is applied in the mind of

knower's. In organizations, knowledge often becomes embedded not only in documents or repositories but also in organizational routines, process, practices, and norms.

Knowledge can be defined as the theoretical or practical accumulated experience, values, contextual information and expert insight that grows in the minds of the knower with time and has not been codified or made explicit.

2.2.3 Types of Knowledge

Organizational knowledge can be categorized in two main types: explicit knowledge and tacit knowledge (Pan and Scarborough, 1999). The following paragraphs explain the differences between the two types of knowledge.

1. Explicit knowledge

Explicit knowledge is the knowledge that has been or can be articulated, codified, and stored on a certain media and can be readily transmitted to others. The explicit part of knowledge is systematic and easy to communicate in the form of hard data or codified procedures. This means that explicit form of knowledge can be transmitted across individuals formally and easily. Explicit knowledge is easily articulated or reduced to writing, most often it is impersonal and formal in nature, and frequently takes the form of documents, reports, white papers, catalogues, presentations, patents, formulas, etc. (Nonaka and Konno, 1998).

2. Tacit Knowledge

The term tacit knowledge was first introduced into philosophy by Michael Polanyi in 1958. He believes that "we can know more than we can tell" (Polanyi, 1966). Tacit knowledge is difficult to transfer to another person by means of writing it down or verbalizing it. For example, stating to someone that London is in the United Kingdom is a piece of explicit knowledge that can be written down, transmitted, and understood by a recipient. However, the ability to speak a language, use algebra or design and use complex equipment requires all sorts of knowledge that is not always known explicitly, even by expert practitioners, and which is difficult to explicitly transfer to users (Collins, 2001). An in-depth discussion of the tacit knowledge shall be expressed under the carriers of knowledge.

2.2.4 Carriers of Knowledge

In order to understand the types of knowledge that are applicable to this research, it is necessary to discuss in more detail the knowledge possessed by individual persons, social

knowledge possessed by groups, and knowledge possessed by organizations. These constructs are referred to as ***personal knowledge, collective knowledge, and organizational knowledge.***

1- Personal Knowledge

Personal knowledge, or tacit knowing relates to the knowing of people from an individual perspective, this type of knowledge resides in the minds of people (Campos and Sanchez 2003). Tacit knowledge is composed of an accumulation of experience in the form of insight and wisdom. The individual's experience is reflected on the individual's actions (the way they do things). Li and Goa (2003) refer to this type of knowledge as "tacit knowing" and describe it as "elusive and subjective awareness of individuals that cannot be articulated in words". McInerney (2002) suggests that tacit knowledge is unspoken and hidden. Tacit knowledge should be contrasted with conscious mental states and speech acts instead of explicit, or codified knowledge (Nightingale, 2003). Tacit knowledge is extremely difficult to articulate and perhaps impossible to put into writing or codify (Wong and Radcliffe, 2000). Tacit knowledge is most critical to organizations because it is based on the knowledge and skills that accumulate over time through the experience of its individual employees (Noe, et al., 2003). This type of knowledge may play an important role in the strategic planning performance of managers and professional staff (Bennett, 1998).

Tacit knowledge from the behavioral perspective can be defined as the assumptions and expertise of individuals that develop over years and may never have been documented or recorded. In other words, it is experience based, subconscious, perceived, held within the self, transferred through conversations and demonstration and embedded in stories and narratives.

2- Collective social knowledge of groups

The term "collective social knowledge" is used to differentiate individual knowledge from knowledge shared in social groups. McInerney (2002) refers to the type of knowledge shared and used in social groups as collective knowledge. It is the knowledge developed where groups of people learn from one another, master the knowledge and solve work-related problems in particular situations. This type of knowledge is collective tacit knowledge developed over time through group interactions and exists in the minds of each individual member of the group. In addition, this shared collective knowledge remains as accepted organizational routines and standards that stays in the organization if one of the group

members leave the group (Leonard and Sensiper, 2002). However, when it comes to specific problem solving, the knowledge and experience of individual experts may be needed as a contribution to find solutions, and this could be lost to the organization when individual experts leave. Group knowledge may also be affected if more than one person from a particular group or community leaves the organization (Martins, 2010).

Parise, et al., (2006) suggest that Individuals rarely get things done on their own because they need to rely on both co-workers and relationships with external parties. This enlightens the role of relationships between group members where Von Krogh and Roos, (1998) see relationships with people inside and outside the organization specially the people they know and collaborate with to get their work done on time, as a vital part of social knowledge that resides in individuals.

3- Organizational knowledge

Nonaka and Takeuchi (1995) define organizational knowledge as what is commonly known in a group of people associated with an organization. Another definition of organizational knowledge is "the accumulated know-how, expertise, and ways of working identified with a particular organization that becomes so embedded in the physical and social systems that the knowledge essentially remains accessible to the organization, even if key individuals leave" (Allee, 2003). However, no organization can be aware of, mobilize and exploit all the knowledge possessed by all employees. Furthermore, knowledge is not static because employees are constantly on a journey of storytelling (conversation), sense making and creation. Knowledge is reshaped to fit new circumstances and the same knowledge is never experienced twice (Allee, 2003). This means that organizational knowledge can change and reshape itself. It could imply that if large amounts of key knowledge are lost from an organization, this could affect the organization's overall functioning and success. Organizational knowledge includes captured and embedded organizational routines, processes, systems, products, customers, cultures and competitive environments (Cummings and Worley, 2005). This knowledge may be explicit and codified in documents, manuals or databases, or it may be tacit in the form of employees' skills, memories and intuitions (Droege and Hoobler, 2003). Organizational knowledge is the key outcome of organizational learning processes and it also contributes to organizational performance to the extent that it is relevant and applied effectively to the organization's competitive strategy. The link between the learning processes and organizational performance generates knowledge capabilities that have been referred to as "core competencies", "invisible assets" and "intellectual capital".

These terms suggest the contribution of organizational knowledge to organizational performance (Cummings and Worley, 2005).

2.2.5 Knowledge as an Organizational Asset

Organizational knowledge is described earlier as the collective knowledge held by individuals within the organization and the human resource capital that makes up the capabilities of the organization. Organizational knowledge in the knowledge economy, is seen to be the most important organizational asset. Knowledge is the key factor in every organization. Therefore, most of the large organizations differentiate themselves on the basis of what they know. The organizational knowledge exists in the form of routines resulting from an accumulation of past experience that guide future behavior (Levitt and March, 1996). Routines include the rules, operating procedures, norms, beliefs and frameworks that determine how the organization is designed and operated. The success of organizations largely depends on continual investment in learning and acquiring new knowledge that creates new businesses and improve existing performances. In the current business circumstances, the continual employees' education and training is becoming imperative. The investing in employees is not considered to be cost anymore, but an investment. To keep up with the time and, very often, to predict certain situations and events, it is essential that employees continually improve, learn, and develop corporate culture and attitudes with respect to individual and corporate advances. In any case, learning and development are essential foundation for the success of any organization that is facing continuous improvement. Learning is more than "training" as it involves facilitated communication between employees at all levels and sharing organizational knowledge.

In short, companies can no longer expect that the products and practices that made them successful in the past will keep them viable in the future. Pricing pressures leave no room for inefficient production. The cycle time for developing new products and getting them on the market is becoming more and more compressed. Companies now require quality, value, service, innovation, and speed to market for business success, and these factors will be even more critical in the future.

2.2.6 Knowledge: The New Competitive Advantage

A company's value is not based on its physical assets such as plant, equipment, and machinery. Rather, it is based on knowledge, know-how and intellectual assets that are all

embedded in people (Dess and Lumpkin, 2002). In the light of globalization and modern business, companies are exposed to the challenges posted by the unpredictable and complex competitive environment. The globalized business environment is characterized by dynamic business conditions, market liberalization, high production, information and communication technology, flexible organizational structure of companies and partnership development. In such an environment, the competition among companies is sharpened in the market (Novicevic and Jelenic, 2008). Companies are forced to innovate and develop new techniques for improving the quality and functionality of products, reduce costs and, of course, the answer to the increasingly sophisticated customers' demands in order to survive in the market. Knowledge for problem definition and problem solving can form the basis of a firm's competitive advantage and can also be leveraged in a wide variety of markets for future products (Srivastava, 2005). Knowledge is the core competence and essential for us to fulfill the organization vision, create organizational excellence and remain competitive. Through qualified employees, their knowledge and contributions organizations reach our business goals. Organizational knowledge is now recognized as a major feature in any organization's attempt to secure sustainable competitive advantage and therefore warrants continued allocation of resources in time and money to develop. In the long run, competitive advantage will be sustainable by the organization who can learn faster than its competition. It follows that the better an organization is able to take advantage of its organizational knowledge and perform its tasks, the harder it will be for a rival to match its interlocked activities (Porter, 1996). Organizations have recognized that knowledge constitutes a valuable intangible asset for creating and sustaining competitive advantage (Miller and Shamsie, 1996). Competitive advantage goes to the organization which can build products that a market is prepared to pay for faster than the competition. An organization's core competencies are made up of its resources and learning capabilities.

2.3 Knowledge Management

Knowledge management may be an excellent platform to start off to address the issue of knowledge retention at the organizations. Knowledge management is considered as a multidisciplinary approach to achieving organizational objectives by making the best use of knowledge (Standards Australia International, 2004). Knowledge management was defined by Jashapara (2004) as the effective learning processes associated with exploration, exploitation and sharing of human knowledge, tacit and explicit that use appropriate technology and cultural environments to enhance an organization's intellectual capital and

performance. Robbins (2005) defines the concept of knowledge management as a process of organizing and distributing an organization's collective wisdom so that the right information reaches the right people at the right time. This improves performance because it makes employees smarter. Knowledge Management is seen as the umbrella term for a variety of interlocking terms, such as knowledge creation, knowledge valuation, knowledge mapping and indexing, knowledge transport, storage and distribution and knowledge sharing (Plessis, 2007).

For the purpose of this research, the following definition may shed some light on the attempt to use knowledge management as a starting point to address the issue of retaining knowledge in organizations. Knowledge management is the strategy and process to enable the creation and flow of relevant knowledge throughout the business and to create organizational, customer and consumer value (Smith from Unilever cited in Bender and Fish, 2000).

2.4 Knowledge Retention

Retaining knowledge refers to keeping possession of, not losing, continuing to have, practicing or recognizing knowledge (Reader's Digest Oxford complete word finder, 1993). According to Walsh and Ungson (1999), individuals can act as "retention facilities" for organizational memory. Knowledge retention is effectively the act of building organizational memory (Delong, 2004). The focus of the current research is on knowledge retention (as in Delong's research), which, he argues, that organizational memory is vague and of little use to managers in addressing the problem of knowledge loss. When knowledge is lost, it means that organizational memory has been degraded, but organizational memory does not describe a way of countering the problem of lost knowledge. Knowledge retention is more action oriented making it a more effective way of countering the loss of knowledge. Organizational memory is a more theoretical concept and little empirical analysis has been conducted on this theory, whereas knowledge retention is a grounded, practical way of addressing the threat of knowledge loss (Delong, 2004).

2.4.1 Difference between Knowledge Retention and Knowledge Loss

Knowledge, for all of its value, is a curious asset. It is highly perishable, increases with sharing, and is cumulative (i.e., new knowledge is built from existing knowledge). Perhaps the most important characteristic of knowledge, however, is that it is mostly borrowed. It is

borrowed from employees when they come to work, and it is returned to them when they leave. Of course, some forms of knowledge remain within the organization (documents and databases), but that knowledge is worthless if no one knows how to access it. Often, access to such knowledge also is in the heads of employees. When knowledge walks out the door with employees who have left no copy for the organization, their knowledge asset vanishes. As knowledge losses mount, organizational learning stalls, and organizational forgetting begins. With sufficiently high turnover, an association may know less today than it did yesterday. Knowledgeable people are extremely valuable to an organization; once they leave, organizationally-applied knowledge leaves with them. Turnover is inevitable. Voluntarily turnover can be taking another job, or accepting a new position at another location. Non-voluntarily turnover can be contract termination, enterprise downsizing, personnel "right-sizing", or death (Lubit, 2001). For this reason, valuable corporate knowledge should be captured, retained, and maintained by the organization until it is no longer needed (Davenport and Prusack, 1998). However, it is also important to filter out obsolete, incorrect, or biased knowledge based on tainted experience, knowledge from the valuable tacit corporate knowledge to potentially reduce the impact of its loss. If corporate knowledge is lost, the organization may not operate as efficiently. The organization may fail to make effective decisions, fail to reach its fullest potential, or lose focus of core business practices if knowledge is not retained. Without any form of corporate knowledge or lessons learned, an organization is destined to repeat mistakes or take a reactive posture of reinventing solutions to recurring problems. Knowledge is known to be a factor in sustaining a competitive advantage (Lubit, 2001). Failing to capture and manage knowledge is corporate value lost.

David Delong (2004) claims that if knowledge loss is the problem, then knowledge retention could be regarded as the solution. He also shows the difference between knowledge loss and knowledge retention. The terms "knowledge loss" and "knowledge retention" are not exact opposites because it is not possible for an organization to ever retain all of the knowledge that it could lose. Even if it could retain it all, the organization would not want to because some knowledge that might be lost, might not be relevant to organizational effectiveness (Delong, 2004).

2.4.2 Types of Knowledge to be retained

Most standard knowledge management practices focus on obtaining data, generating documents and storing them in electronic repositories, this would be effective in retaining

explicit knowledge. Seidman and McCauley (2005) argue that a great deal has been written about protection against knowledge loss, but little about the nature of the content that should be retained and preserved. In this way, the most superficial knowledge is retained only. The following are the three types of knowledge to be retained that are the individual, group or collective, and organizational levels.

2.4.2.1 Knowledge to be retained at the individual level

Earlier in this chapter, knowledge was divided to explicit and tacit. According to Bertels and Savage (1998), the ability to track down explicit knowledge is only the tip of the iceberg. In addition, an organization's real knowledge is often embodied in experience, skills, knowledge and capabilities of individuals and groups. Seidman and McCauley (2005), suggests that the subconscious or tacit knowledge of retiring knowledge workers "is the secret sauce", or in other words, the content that really needs protection as opposed to the explicit knowledge gathered by most retiring knowledge workers. At the individual level, the personal knowledge of individuals is referred to as, tacit knowledge. This is the knowledge that resides in people's minds and their experience of actions. It relates to expertise and skills that were developed over years and manifests in the behavior of individuals in the way they do their knowing (Martins, 2010). This knowledge could be how to perform their jobs, work in teams, and interact with external stakeholders, suppliers, customers or competitors.

2.4.2.2 Knowledge to be retained at group level

At group level, knowledge develops through social interaction and relationships with other people. Delong (2004) argues that this knowledge also develops over time through social activities in groups as a result of working together. It is shared by group members through, say, communities of practice or through relationships with people inside and outside the organization. Shared, collective knowledge might not leave from the organization as an individual from a group leaves, as it is collective and resides to some extent in the minds of a group of individuals. The knowledge about who they know or knowledge about a specific project that later needs to be repeated by a new team is considered to be an example of the knowledge to be retained at the group level (Delong, 2004). Parise, et al., (2006) argue that new workers require time to build a trust relationship with existing customers that might have been lost when an experienced individual leave. The researchers describe this knowledge as, the knowledge of the network of relationships. It is critical in getting the job done that resides to some extent with individuals that needs to be retained and considered at risk of loss.

2.4.2.3 Knowledge to be retained at the organizational level

Organizational knowledge is the accumulated know-how, expertise and ways of working. It is usually greater than the sum of the currently employed individuals' expertise (Alee, 2003). Cummings and Worley (2005) describe the know-how as tacit knowledge in the peoples' minds in the form of skills and intuitions that collectively make up organizational knowledge. Delong (2004) claims that organizational knowledge may be affected when large numbers of professional employees are near to retirement. Delong (2004) names the knowledge that could be lost at organizational level as the cultural knowledge. Martins (2010) defines cultural knowledge as the collective understanding of how to behave and think in an organization. Haldin-Herrgaard (2000) suggests that values and organizational culture are collective forms of tacit knowledge. In addition, people are not always aware that tacit knowledge is shared. Cultural knowledge can be affected if an organization experiences extremely high levels staff change (Delong, 2004). Martins (2010) names the accumulated tacit know-how and cultural knowledge as knowledge at organizational level that is at risk of loss and should be retained. Moreover, the researcher suggests that the challenge to the organizations is to find ways to transfer and retain the knowledge that is at a subconscious level and hard to articulate by focusing on the behavioral aspects of how they do their knowing and sharing of this personal knowledge.

2.4.3 Knowledge Retention Dimensions

To address the challenges of knowledge retention, clarity is needed on the knowledge retention issue in this research. Delong (2004) claims that knowledge retention consists of three activities, namely knowledge acquisition, knowledge storage and knowledge retrieval. In defining these three activities, Delong includes both human and technological representations of the acquisition, storage and retrieval processes. Martins (2010) argues that knowledge retention is approached from the cognitive (learning and knowing) and knowledge construction processes (creating, sharing, transferring and applying). Since this knowledge manifests in certain behaviors, it is necessary to focus on determining the enhancing and impeding factors that would have an impact on knowledge retention.

For reasons related the type of this research, the researcher shall adopt the Martins (2010) dimensions of the knowledge retention as it describe knowledge retention from the human behavioral perspective, and shall use these components as instruments to measure the level of knowledge retention at the Islamic University of Gaza.

2.4.3.1 Knowing and Learning as a Dimension of Knowledge Retention

Venzin, et al. (1998) assume that knowledge development refers to the learning process and the knowing process. Bertels and Savage (1998) describe learning as a process and knowledge as the result of that process. Polanyi and Prosch (2003) argue that knowledge is an activity, which could be better described as a process of knowing. The connection between the processes of learning and knowing are described underneath in more details.

2.4.3.1.1 Connection between learning and knowledge

Kofman and Senge (1993) suggest that knowledge is what has been learnt. Vera and Crossan's (2003) confirm this by proposing that "learning is the process through which knowledge is created and developed". This can lead to the understanding that "learning is a continuing and accumulating process that impacts future learning" (Burton-Jones, 1993). Devos and Willem (2006) suggest that the process of learning leads to an accumulated knowledge in its most basic form, and this is a retention process of knowledge for further use. The researchers also argue that organizational learning is about people working together aiming to create results that they really care about (Devos and Willem, 2006). According to Mcinerney (2002), knowledge constantly changes through experience and learning makes it dynamic. Learning, creating and sharing knowledge are processes that involve movement to new levels of cognition and understanding among individuals and organizations.

It is clear from the above discussion that knowledge and learning are interconnected in a mutual process. Learning can be regarded as the process that produces new knowledge, which, in turn, impacts on future learning (Vera and Crossan, 2003).

2.4.3.1.2 Connection between Knowing and knowledge

The purpose of this discussion is to examine the nature of knowing as a process of action and possible integration with knowledge as a cognitive process. Polanyi (2003) work has been influential in this new approach when this argument emphasizes the dynamic nature of knowledge. Previously asked questions that dominated the literature such as "How is knowledge stored?" and “Where is knowledge stored?" have been superseded by new concerns of how and with whom people do their knowing (Blackler, et al., 1998). It analyses knowing as a process and as an active achievement instead of analyzing knowledge as located in "bodies, brains, routines, technologies, cultures and symbols" (Blackler, et al., 1998). Blackler (2002) suggests that new approaches need to be created to conceptualize the multidimensional processes

of knowing and doing. The researcher proposes that one approach could be developed from the insights that knowing is situated, distributed. Activity theory seems to be a promising approach. It originated from the Russian psychologist, Vygotsky's (1920) ideas of developing an understanding of mind and society that did not depend on factors such as mind versus body, thought versus action or individual versus society. The activity theory currently has a variety of forms. Some focus on the processes through which people develop shared conceptions of their activities (e.g. Brown, et al., 1989; Lave and Wenge, 2002). This approach develops a model of learning as socialization. A case in point is Orr's (2002) analysis of Xerox maintenance technicians. He describes how the stories shared by maintenance technicians about complex technical problems serve a key informational and educational function and afford technicians an opportunity to establish their identity in the community of technicians.

Another approach in the activity theory by researchers such as Hutchins; Engestrom, 2002) models the relationship that exists between the conceptions of a community of its activities and the material, mental and social resources through which these conceptions are enacted. An example is the study of Engestrom (2002) of a medical practice in Finland that demonstrated the variety of conceptions that doctors may have of their activity. In the same medical practice, doctors may unknowingly be enacting different conceptions of health care. Refocusing priorities was hampered by the resource system in which these doctors operated. For example, the random allocation of patients in the Finnish health care system created problems of continuity of care. Blackler, Crump, and McDonald (1998) and Blackler (2002) point out that mismatches, tensions, paradoxes and contradictions may develop in activity theories providing a potential driving force for change. New ways of knowing and doing can emerge if communities engage with the tensions in their activity systems in terms of how these tensions should be treated.

Another significant aspect of the discussion on knowing is that knowledge and knowing constructs originate in different paradigms and there has been a call for multiparadigm research (Gioia and Pitres, 2003). This takes place in an effort to integrate these concepts. Cook and Brown (2002) argue that explicit and tacit knowledge are not enough to understand the nature of knowledge, hence the need to add knowing (as an account of what one knows), they also claim that adding knowing to knowledge shall enable to begin to account for the relationship between what one know and what one does.

2.4.3.1.3 Integrating knowledge, knowing and learning

Integrating knowledge into knowing has embraced behavioral components in the study of knowledge. In embracing behavioral components, the concepts of knowledge, knowing and doing become more closely aligned with learning (Crossan and Hulland, 2002). This integration is depicted on figure 2.1 as follows:

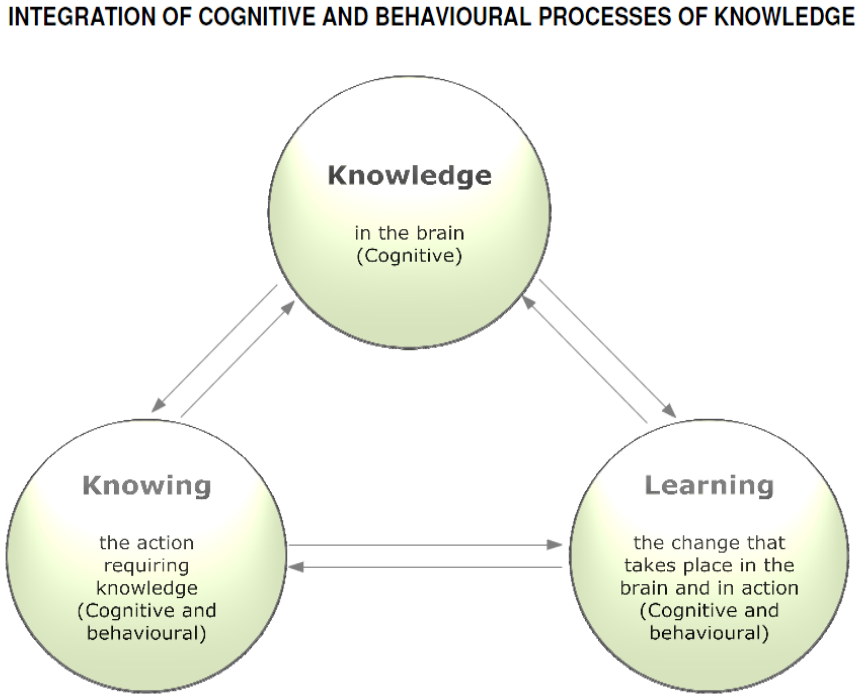

Figure 2.1: Integrating Knowledge, Knowing and Learning, Source: Martins, (2010):97

The figure above suggests that knowledge is the cognitive process (including human skills possessed), while knowing is mainly behavioral (i.e. knowing in action). Organizational learning embraces both cognition and action (Vera and Crossan 2003; Crossan and Hulland, 2002). Crossan and Hulland (2002) elaborate on the relationship between knowledge, knowing and learning. Knowledge is obtained through the mind (learning by reflection) and through the body (learning by doing). It is accumulated in the mind (know what declarative-knowledge) and in the body (know how-procedural knowledge). Knowing is practice or action (doing) that requires knowledge. Learning is the change that takes place in knowledge and in knowing, which, in turn, are the content of the learning process (i.e. what one learns or gets to know).

2.4.3.2 Knowledge Creation as a Dimension of Knowledge Retention

Quintas (2002) argues that the process of knowledge creation is central to knowledge management and it is also considered as core capability in organizations. In addition, knowledge acquisition is important to the healthy functioning of an organization.

2.4.3.2.1 Knowledge Creation Definition

Knowledge creation refers to the development of new knowledge that occurs through the processes of dialogue and experience. People construct knowledge as they interact in social context, which creates social knowledge. This knowledge, in turn, influences behaviors, perceptions and understanding (Berger and luckmann 2003). Nonaka, et al. (2002) state that the process of knowledge creation takes place through action and interaction among individuals within an organization. Knowledge acquisition, a term that may be considered identical to knowledge creation, refers to the acquisition, distribution and interpretation of already existing knowledge that is external to individuals (Gnyawali and Grant, 2003). Delong (2004) defines knowledge acquisition as the practices, processes, and routines used to move knowledge into a state where it is kept available for future use.

2.4.3.2.2 Knowledge Creation Model

Nonaka and Takeuchi (Nonaka, et al., 2002) designed a model about knowledge creation process in organizations. They suggest a set of processes to create new knowledge by converting tacit knowledge into explicit knowledge. This process is referred to as the SECI, which is the acronym for socialization, externalization, combination, and internalization. Choo and Bontis (2002) add two more elements, namely "ba", the shared context for knowledge creation and knowledge assets. Knowledge assets are indispensable organization-specific resources that are important to create value for the organization. It represents the inputs, outputs and moderating factors of the knowledge-creating process. In addition, these three elements have to interact with one another to form a knowledge-creating spiral (Nonaka, et al., 2002). Cook and Brown (2002) and Nonaka, et al. (2002) explained the knowledge creation context. They agree that knowledge interacts with the environment, and reshapes the environment and itself through the process of knowledge creation. Cook and Brown (2002) stress that the production of knowledge does not lay in a continuous interaction between tacit and explicit knowledge, but in peoples' interaction with the environment. Moreover, knowledge creation lays in the use of knowledge, whether explicit

or tacit and not in the general characteristics of tacit and explicit knowledge, as Nonaka and Takeuchi (2002) suggest. Cook and Brown (2002) hold that explicit and tacit knowledge are generated each in their own right and that it is not possible for tacit knowledge to become explicit (or vice versa). However, one can be a useful tool in the generation of the other. Allee (2003) supports this idea by pointing out that Polanyi, who first explored the tacit dimensions of knowledge, described it as innate' (inborn) intelligence, perception, and capacities for reasoning, rather than a type of memory or knowledge store. This means that tacit knowledge could and does not need to be converted to explicit. Thus, explicit communication and unspoken tacit communication occur at the same time when knowledge is shared. In other words, there is no linear progression of knowledge from tacit to explicit- instead, they are two aspects of the one process of knowing. The idea of tacit knowledge that needs to be converted to explicit knowledge arose from the idea that tacit knowledge is stored memory, experience or content in peoples' minds that simply can be articulated and converted into explicit knowledge (Allee, 2003).

2.4.3.2.3 The Effects of Knowledge Creation on Knowledge Retention

The process of knowledge creation is central to knowledge management and it is also considered as core capability in organizations **(**Quintas, 2002). Delong (2004) argues that knowledge acquisition is the practices, processes, and routines used to move knowledge into a state where it is kept available for future use. This shows clearly that the stage of knowledge creation and acquisition is the base on which later stages will depend. The result of this phase is the knowledge to be retained finally.

2.4.3.3 Knowledge Sharing as a Dimension of Knowledge Retention

Knowledge sharing promotes widespread learning and minimizes waste of resources to solve problems repeatedly (Jackson, et al., 2003). There are cultural, social and community (network) norms that support knowledge sharing and contribution (Choo and Bontis, 2002; Yoo and Torrey, 2002). Also, there are the different levels of the individual, group and organizational through which knowledge sharing takes place in organizations. A set of tools through which knowledge can be shared in organizations were suggested. These tools include interviews, videotaping, storytelling, mentoring, networking and communities of practice (Stewart, 2002; Delong, 2004).

2.4.3.3.1 Definition of Knowledge Sharing

Sharing knowledge in organizations is the process of disseminating employees' individual knowledge so that the knowledge becomes available where it is needed. Knowledge is needed to contribute to productivity and improve an organization's competitiveness (Bukh, et al., 2005). Knowledge sharing also promotes widespread learning and minimizes waste of resources to solve problems repeatedly (Jackson, et al., 2003). Jackson, et al. (2003) emphasize the flow of knowledge instead of hoarding it and consider it as a tool to enhance knowledge sharing. Davis-Blake and Hui (2003) emphasize the willingness to share knowledge as an important factor that can enhance the sharing process. Noe, et al. (2003) mention cultural barriers, lack of top management support, lack of shared understanding of the business strategy, and lack of an appropriate organizational structure as the main barriers to knowledge sharing. A vital factor that is mentioned by authors such as Fineman (2003), Nielsen (2005) and Allee (2003) is trust or distrust, which refers to feelings of trust between individuals and an organizational culture of trust that would enhance knowledge sharing.

2.4.3.3.2 Knowledge Sharing Model

Bennet and Bennet (2004) discuss an interesting model of knowledge sharing as a process from a systems perspective, with five elements influencing one another. This model focuses on tacit knowledge sharing and supports learning and flow of knowledge. They argue that there is five knowledge-sharing elements which are, explicit capture, flow mechanisms, mentoring, boundary management and subconscious access. Figure 2.2 depicts the system approach to knowledge sharing.

Elements in figure 2.2 can be explained as follows:

1. Explicit capture

Explicit capture of knowledge is explained as developing context-rich information systems that include video clips, community dialogues, scenarios and stories.

2. Flow of knowledge

Flow of knowledge is facilitated through mechanisms such as teams, communities, and knowledge fairs. Networking relationships are an integral part of these flow mechanisms, also. Sole and Edmondson (2002) suggest that in cross- functional teams, members need to acquire knowledge from diverse communities to address difficult problems. In addition, they need to integrate this knowledge by developing congruent understanding of the structure and

goals of collective effort, and by developing norms and practices for communication and information sharing. The purpose of these cross-functional teams is to share knowledge and build value without diluting functional excellence. Communities in organizations seem to have a collective interest in sharing knowledge. Members have a shared identity, language and activities. Shared learning happens through storytelling and dialogue (Von Krogh, 2003). Bennet and Bennet (2004) define knowledge fairs as the featuring of every functional area in the organization, showing how they contribute to achieving the organization's vision. They suggest that this creates an opportunity of sharing knowledge and better understanding among employees, stakeholders, and partners.

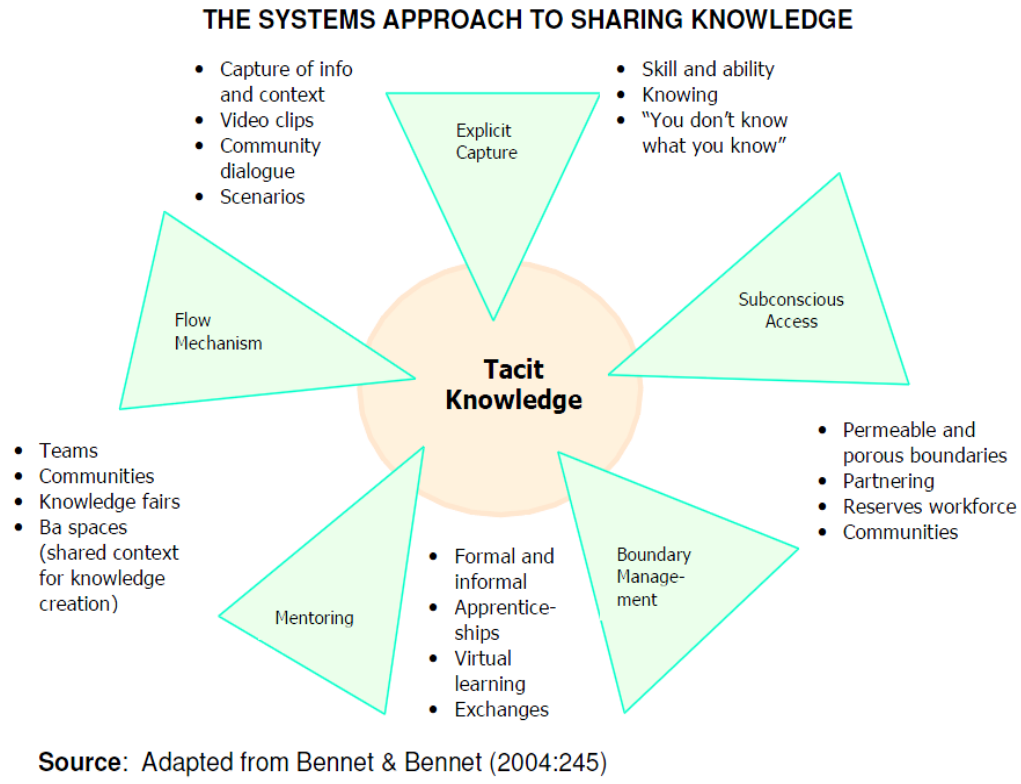

Figure 2.2: The different elements of the model of knowledge sharing, Source: Benet & Benet (2004):245

Mentoring

Mentoring is an important facilitator of the knowledge-sharing process and in the learning organization particularly. Every leader and worker should forge a continuing learning and teaching relationship to generate new ideas, share knowledge, and ensure the growth of the organization (Bennet and Bennet 2004). Von Krogh (2003) suggests that

the sharing of tacit knowledge from an apprenticeship perspective involves a collective change in the cognition and action of both the master and the apprentice. The apprentice's cognition transforms through observation and imitative learning, while the master's routines might change as a result of his or her reflections on the apprentice's confrontations of the master with new experiences that are connected to the performance of the master's own routines. This indicates that the process of knowledge sharing is not a one-way activity, but requires mutual adjustment between the sender and receiver of knowledge at the individual level (Szulanski, et al., 2003).

3. Boundary management

Boundary management refers to the organization purposefully creating knowledge-sharing opportunities across boundaries. This can be achieved by developing partnering relationships, building a reserve workforce composed of former employees and known sources of special expertise. Boundaries of communities are expanded to include external sources (Bennet and Bennet, 2004).

4. Subconscious access

Subconscious access refers to building the individual sense of intuition and knowing (i.e. knowledge gained from experience, but cannot be put into words). This can be achieved through a method of seeing beyond images, learning beyond words, sensing beyond appearances and feeling beyond emotions. This method also increases the ability to consciously integrate these sensory inputs with tacit knowledge which resides in the unconscious mind and which one does not know that one knows. In other words, knowledge gained from experience and past learning that cannot be put into words (Bennet and Bennet, 2004).

The major focus of this approach to knowledge sharing is that the sharing of knowledge requires a systems approach and that it is a continuous process that assumes many forms (Bennet and Bennet, 2004). It also explains how different tools and mechanisms can be used in an organization to facilitate the process of sharing knowledge between individuals to make it available where it is needed.

2.4.3.3.3 Effects of Knowledge Sharing on Knowledge Retention

Knowledge sharing promotes widespread learning and minimizes the waste of resources to solve problems repeatedly (Jackson, et al., 2003)**.** Knowledge sharing is the stage during which the ideas and knowledge that were created during the creation process will be disseminated among the different parties and individuals (Bennet and Bennet 2004). Knowledge acquired and shared during this stage will be ready most of the time to be applied in the suitable setting where it is needed.

2.4.3.4 Knowledge Transferring as a Dimension of Knowledge Retention

2.4.3.4.1 Definition of Knowledge Transferring

Knowledge transferring is defined as the process of applying knowledge from one setting to another. This movement of knowledge occurs in organizations, business units, teams and groups (Boudreau, 2003). Alavi and Tiwana (2003) describe the knowledge transfer process as the transmission of knowledge from the initial location to the location where it is needed and applied. Another term that is interrelated with knowledge transfer is knowledge flow. Boudreau (2003) argues that knowledge transferring is part of knowledge flow, which, he defines, as the movement of knowledge among individuals, organizations or organizational levels. Knowledge flow includes notions of knowledge transfer, organizational learning, group interaction and information flow through networks. Therefore, it appears to be a broader term than knowledge transfer. Jackson, et al., (2003) describe the diffusion of knowledge throughout an organization as knowledge flow. Davenport and Prusak (2000) state that knowledge is transferred in organizations whether or not the process is managed. When an employee asks a colleague how to compile a budget or report, the employee is requesting a transfer of knowledge from one person to another.

2.4.3.4.2 Knowledge Transferring Stages

The knowledge transferring process involves two actions, transmission which can be defined as sending or presenting knowledge to an individual or group potential recipient, and absorption by this individual or group. Knowledge will not be transferred unless it is absorbed. Making knowledge available cannot guarantee transferring knowledge. The knowledge transfer process is most frequently divided into the initiation

and the implementation processes of the transfer. During implementation, further distinctions are often made between the initial implementation effort, the ramp-up to satisfactory performance, and the subsequent follow-through, and evaluation efforts to integrate the practice with other practices of the recipient (Szulanski and Cappetta, 2003). Each of the four phases (initiation, implementation, ramp-up and integration) may be difficult in their own ways. Szulanski and Cappetta (2003) developed a typology to describe these difficulties. Their typology refers to the following four distinct stages of transfer stickiness:

1 Initiation stickiness:

Initiation stickiness can be defined as the difficulty in recognizing opportunities to transfer and act upon them. The opportunity exists as soon as a gap and knowledge to address are found in the organization. For example, when new people enter the organization or when older people retire (Szulanski and Cappetta, 2003).

2 Implementation stickiness:

This phase occurs after the decision to transfer. Attention shifts to the exchange of information, knowledge and resources between the source and the recipient. Efforts are made to pre-empt problems through careful planning (Piscino, 2003). True motivation issues, such as the recipient ignoring recommendations from the source because of a misunderstanding, resentment or to preserve pride of ownership, are likely to arise during this stage. Moreover, coordination issues, like when the source or recipient deviates from agreed responsibilities, between the source and recipient are likely to be revealed during this stage (Szulanski and Cappetta, 2003).

3 Ramp-up stickiness:

Ramp-up stickiness takes place when the recipient begins using acquired knowledge, e.g. cuts over to a new system or starts up a new production facility. The main concern here is identifying and resolving unexpected problems that prevent the recipient from meeting expectations of post-transfer performance (Szulanski and Cappetta, 2003). The absorptive capacity of the recipient or the ability to utilize new knowledge depends on the person's existing stock of knowledge and skills. Thus, the presence of expertise is essential during the ramp-up stage (Chew, et al., 2003).

4 Integration stickiness:

During this phase, effort is exerted to remove obstacles and deal with challenges to the regular use of the new practices. Once satisfactory results are obtained, the use of new knowledge gradually becomes routine. The effort required to deal with challenges involves maintaining a truce in intra-organizational conflict, i.e. members are content to play their roles and manifest conflict follows mainly predictable paths (Nelson and winter, 2003). This truce may be disrupted by events such as environmental changes, the departure of old members, the arrival of new members, or the appearance of clearly superior on in the lapses in performance. A sudden change in the scale of activities may lead also to disruption in the truce. Each disturbance to the truce may cause some resistance and a need to resolve the contingency (Szulanski and Cappetta, 2003).

The typology of transfer stickiness may point to some behavioral aspects of the sources and recipients in the transfer process that might lead to knowledge loss, on the one hand, or knowledge retention, on the other hand.

2.4.3.4.3 The Effects of Knowledge Transferring on Knowledge Retention

This stage is the stage during which knowledge is moved to the place where it is needed (Alavi and Tiwana, 2003). As knowledge is put in the place in which it is needed, it become easy to apply, and therefore, to retain since the exact location of knowledge is clearly identified.

2.4.3.5 Knowledge Application as a Dimension of Knowledge Retention

2.4.3.5.1 Definition of Knowledge Application

Knowledge application refers to the use of knowledge by individuals and groups in an organizations to solve problems and make decisions (Alavi and Tiwan, 2003). Little research have been conducted on the conditions that increase employees' use of available knowledge and how to ensure that the most current knowledge is used in decision-making processes (Jackson, et al., 2003). Knowledge kept in the minds of individuals does not produce value in organizations, rather, the action of applying it does (Alavi and Tiwana, 2003). This implies that knowledge that is available, but never used is of little value. Investments in knowledge acquisition, creation, sharing and transferring will be of little use if knowledge is not applied effectively (Jackson, et al., 2003). From a behavioral

perspective, if the use of knowledge is an intentional behavior, employees must possess the required knowledge, recognize that they have required it, be motivated to use it, and believe that it is feasible to use it. Various factors influence this application of the knowledge process such as the awareness of the required knowledge, the lack of management support to implement new ideas, and the difficulty of applying knowledge in other contexts (Jackson, et al., 2003).

2.4.3.5.2 The Effects of Knowledge Application on Knowledge Retention

Knowledge kept in the minds of individuals does not produce value in organizations, rather, the action of applying it does (Alavi and Tiwana, 2003). Applying knowledge by using it in making decisions and solving problems is the thing that mostly creates value out of that knowledge. When the knowledge is used in that manner, it is well retained in the organization as it is spread among more individuals the thing that will minimize the opportunity for knowledge loss.

CHAPTER THREE

Organizational Factors Towards Knowledge Retention

3.1 Introduction

This chapter contains four main sections. The first section introduces knowledge management and knowledge retention and emphasizes the main aspects of both concepts. The second section identifies the main organizational factors that enhance knowledge retention within an organization. The third section expresses the main behavioral factors that enhance knowledge retention within an organization and the last section is about the Islamic University of Gaza.

3.2 Performance Management

This chapter shall overlook the definition of performance management (PM), describe the performance management model showing the five dimensions of performance management. In addition, the effects of performance management on knowledge retention are emphasized.

3.2.1 Definition of Performance Management

Edis (1995) claims that PM entails the managerial approach that links people and jobs to the strategy and objectives of the organization. Slater, et al. (1998) argue that PM is a 'Value Adding' process of organizational performance. However, Mwita (2002) argues that there are various versions of theoretical, practical descriptions and conceptions of PM, and they all agree that PM is the process of optimal management and allocation of resources to achieve a common end in an organization. PM is also defined as an integrated set of plans and procedures, which cascades down through the organization to provide a link between each individual and the overall strategy of the organization (Rogers, 1994).

3.2.2 The 5-Dimentional Performance Management Model

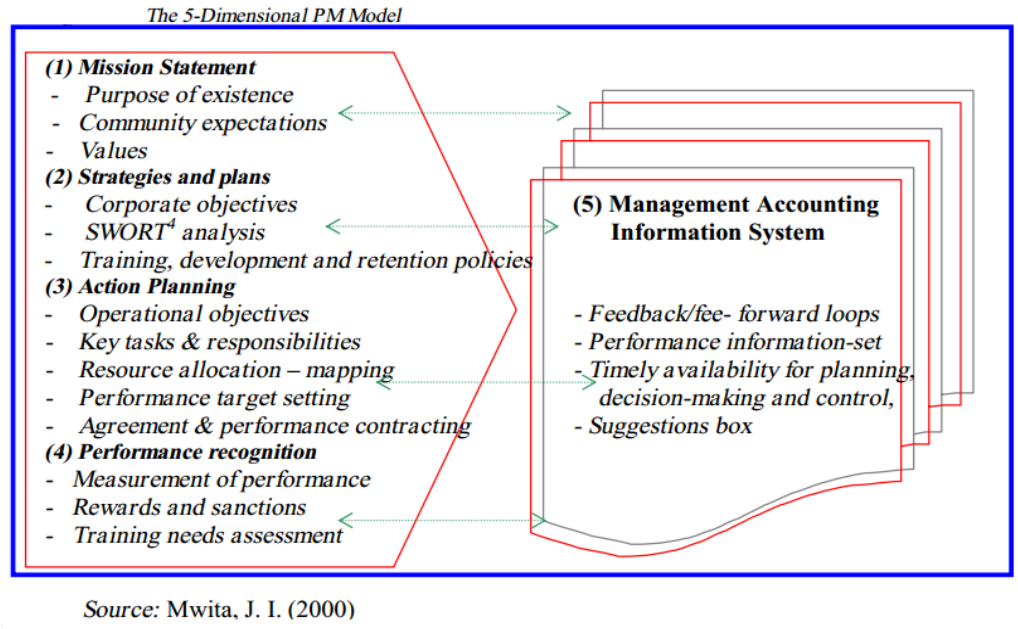

Fig 3.1: The 5 dimensional PM model, Source: mwita, (2000):28

The researcher finds the model of Mwita (2000) is a very clear and well described model to follow. It very much suits the environment of the IUG being discussed in this research. This model stems from a clear understanding by every member of the organization's mission and values, and what it wants to achieve. The PM model is a systematic approach and managers can adopt the principles of Systems Analysis theory to link primary and secondary objectives of an organization. Mwita (2000) defines system analysis as the organized step-by-step study of detailed procedure for the collection, manipulation and evaluation of data about an organization for the purpose not only of determining what must be done, but also of ascertaining the best way to improve the functioning of the system. Mwita (2000) suggests this model of performance management clarifying the components of performance management as follows:

1. **Mission statement**: Mission statement is a formal summary of values and goals to clearly outline the company's identity, and what it wants to do. Hill and Jones (2008) argue that the mission statement should guide the actions of the organization, spell out its overall goal, provide a path, and guide decision-making. It provides the framework or context within which the company's strategies are formulated. Mwita (2000) emphasizes that the mission statement should clearly state the purpose of existence, identify community expectations, and recognize the set of values required to achieve the goals.

2. **Strategies and plans:** that contain the following components:
    - Corporate objectives
    - SWORT analysis (**S**trengths, **W**eaknesses, **O**pportunities, market **R**isks and **T**hreats)
    - Training, development and retention policies

3. **Action planning:** which includes:
    - Operational objectives
    - Key tasks and responsibilities - Resource allocation - mapping - Performance target setting
    - Agreement and performance contracting
4. **Performance recognition:** that considers about the following points:
    - Measurement of performance
    - Rewards and sanctions
    - Training needs assessment
5. **Management accounting information system:** that considers:
    - Feedback/fee- forward loops
    - Performance information-set
    - Timely availability for planning, decision-making and control
    - Suggestions box

Essentially, the main objective of a PM system is to create a performance and achievement culture in an organization. Its prime purpose is to improve performance and motivate staff by concentrating on priority objectives, raising commitments and releasing potentials. It should, however, be integrated with other service management and human resource management policies, such as service planning and training and development (Mwita, 2000). PM processes can provide for goal setting, feedback and reinforcement. The success of any PM model depends on managers developing a strategy that promotes achievement with the right motivation 'or positive reinforcement' and performance-based information-set from and to the management accounting system.

3.2.3 The Effects of Performance Management on Knowledge Retention

Martins (2010) argues that performance management covers elements at the organizational level which form part of HR practices, namely, performance evaluation

taking knowledge sharing into account and recognizing individuals' expertise, and training and development processes taking heed of the needs of different age generations. In addition, performance management shall encourage knowledge sharing through job satisfaction, which, in turn, shall increase the level of knowledge retention.

3.3 Organizational Support

This section shall overlook the definition of organizational support, and discuss the factors that enhance organizational support. Finally, the effects of organizational support in an organization will be emphasized.

3.3.1 Definition of Organizational Support

Martins (2010) defines the organizational support in the knowledge retention context as the organization's contribution to a positive dynamic environment with employees, creating a system that supports knowledge, encourages employees to suggest new idea, enhance cooperation between different departments, push employees who share a concern or passion about a topic to interact, and equip the organization with appropriate technological infrastructure.

3.3.2 Effective Organizational Structure Enhancers

Martins (2010) argues that the items that enhance positive organizational structure are the following:

- **Creating a system that supports knowledge**

Knowledge management systems (KMS) refer to a class of information systems that are utilized to manage organizational knowledge (Alavi and Leidner, 2001). These systems focus on creating, gathering, organizing, and disseminating an organization’s knowledge. Knowledge management systems, which take advantage of information technology, can range from a simple database to a more elaborate system that include customized reports and interconnected expert knowledge flows and communications (McInerney and LeFevre, 2000).

- **Suggesting new ideas**

Public, private, large, and small organizations, all face a myriad of challenges in creating opportunities for innovation, fostering and encouraging innovation, and managing change. Organizations need to nurture novel and embryonic ideas and carefully manage the uptake

and development of innovation. Resistance to change is an ever-present concern (Coch and French, 1948; Waddell and Sohal, 1998). Innovation is a broad and multifaceted concept, emerging in a variety of forms and affecting society in diverse and important ways. Innovation includes a range of changes in practice, from adopting new technology to rethinking social networking, and is generally defined as adopting something new with the intention of benefit or improvement (Damanpour and Schneider, 2006; Rogers, 2003). Some of the most crucial components of innovation are the factors that facilitate the manner in which innovation is taken up within a social or organizational context. Damanpour (1991) depicts organizational innovation as a new product, service, technology, process, structure, administrative system, plan, or program that an organization implements to improve performance. Organizational innovations are transmitted discretely or through sweeping reforms, takeovers and mergers, planned improvement, or evolutionary development (Rogers, 2003).

- **Interaction between employees who share a concern or passion about a topic**

Employees who are emotionally committed to their organizations perform better, are absent less often and are less likely to leave their jobs (Mathieu & Zajac, 1990), perceptions that their organizations value and care for them also increase employees' trust that their organizations will fulfil their exchange obligations of recognizing and rewarding desired employee attitudes and behaviors. Employees tend to take a long-term approach to social exchange relationships at work and the pattern of reciprocity determines the perceived balance of exchanges over time (Rousseau, 1989). Employees also value perceived organizational support as assurance that their organizations will help them when they need assistance to perform their jobs effectively and to deal with stressful situations (George, Reed, Ballard, Colin, & Fielding, 1993). Therefore, the above argument lead to the understanding that perceived high organizational support has a relationship with several positive job outcomes, including taking charge at work, in addition to that theorists use social exchanges and the norm of reciprocity to explain the workplace contributions of perceived organizational support to taking charge at work. Their value lies in the positive, beneficial actions that organizations and/or their representatives direct at their employees. They help to establish high quality exchange relationships that create obligations for employees to reciprocate in positive beneficial ways (Settoon, Bennett & Liden, 1996).

Reciprocal arrangements occur when an individual performs some type of action for another individual, group, or organization. The action is performed without a specific economic contract that ensures that the action will be repaid (Turnley, et al., 2003). Rather, the individual who performs the action does so because he/she generally believes that the action will be reciprocated at some future time, though the exact time and nature of the reciprocal act is unknown and unimportant (Van der Vegt and Janssen, 2003).

3.3.3 The Effects of Organizational Support on Knowledge Retention

Martins (2010) claims organizational support is an interesting new factor that refer to the support and encouragement from the organization in terms of suggesting new ideas, cooperation between different departments and interaction between those who share a concern or passion about a topic, which are all elements that would enhance knowledge retention from an organizational perspective.

3.4 Strategy Implementation

In this subsection, the researcher shall overlook the definition of strategy, investigate the types of strategies that are used to retain knowledge in an organization, and how it is implemented. Finally, the effects of strategy implementation on knowledge retention will be demonstrated.

3.4.1 Definition of strategy

Mintzberg and Quinn (1996) define strategy as a high level plan to achieve one or more goals under conditions of uncertainty, they also claim that strategy is important because the resources available to achieve these goals are usually limited, furthermore they argue that strategy generally involves setting goals, determining actions to achieve the goals, and mobilizing resources to execute the actions. They add, strategy describes how the ends (goals) will be achieved by the means (resources). Mintzberg (2009) defines the strategy as a pattern in a stream of decisions to contrast with a view of strategy as planning. McKeown (2011) argues that strategy is about shaping the future and is the human attempt to get to desirable ends with available means. Kvint (2009) defines strategy as "a system of finding, formulating, and developing a doctrine that will ensure long-term success if followed faithfully".

3.4.2 Knowledge Retention Strategies

The impact of attrition can be reduced by making use of appropriate knowledge retention approaches to capture knowledge in the organization **(**Dewah, 2012). There are many strategies to retain knowledge include communities of practice, interviews, videotaping, repositories, mentoring and apprenticeship programs, among other strategies that will be discussed in the following sections.

3.4.2.1 Communities of Practice

Dewah (2012) argues that communities of practice are voluntary groups of people held together by a commonsense of purpose, who share a concern, a set of problems, or passion about a topic. Those individuals deepen their knowledge and expertise in a particular area of concern by interacting on an on-going basis with a real need to know what each other knows. They share work-related knowledge and experience and engage in a collective process of learning. In order to retain knowledge, organizations rely on the communities of practice for the purposes of identifying, capturing, and transferring knowledge. In order to pursue their interests, members of the community of practice engage in joint activities and discussions and share information. Their relationship helps to learn from each other.

3.4.2.2 Mentoring and Apprenticeship

Mentoring and apprenticeship programs can be used as a strategy of transferring tacit knowledge, from an experienced employee to a more junior employee. Mentorship entails the pairing of an experienced member of staff with a new employee in order to assist the new employee in acquiring new knowledge and skills to operate. Mentoring and tutoring techniques enable senior employees to transfer their knowledge, wisdom, specific insights and skills to their juniors within a short space of time such that when the experienced employees leave the organization or die, the organization's substantive practice, knowledge, history, stories, and culture are preserved (Dewah, 2012).

3.4.2.3 Subject Matter Experts (SMEs)

SMEs play a key role in knowledge management in organizations because of their ability to answer questions, provide historical perspective, and offer solutions. Effective succession planning of experts is also desirable to encourage retention of knowledge and expertise. In some organizations, SMEs are assigned duties of mentorship and apprenticeship, identifying core knowledge for their communities, answering questions, and as instructors teaching internal courses (Dewah, 2012).

3.4.2.4 Story Telling

Another powerful knowledge retention and transfer strategy is the story telling strategy which has the potential to personalize an issue by bringing it alive for listeners or readers. Stories are effective in bridging generational gaps, communicate vital information about an organization's culture, and help employees develop a sense of organizational identity. Storytelling may be used to capture successes, lessons learned, and other knowledge explicitly. Stories are instrumental for knowledge sharing and collaboration. While storytelling may take up to an hour, only 15minutes are reserved for question and answer session, thus putting the story into context and allowing listeners to ask questions. The retention of tacit knowledge will require other strategies involving people to people interaction, communities of practice and the teaching of lessons learned (Dewah, 2012).

3.4.2.5 Leveraging Retirees

Organizations use their retirees to provide critical skills and experience on specific projects, to mentor junior employees, participate in storytelling and training activities. These practices allow them to share their knowledge and experiences. Dewah (2012) suggests a set of techniques to leverage retirees. Among these, retirees can be hired to work on an as-needed basis, part time, and gradually transfer knowledge and insights to younger employees. In addition, retirees should be allowed to return to work as consultants that are immediately productive as they know the organization. The other important way of leveraging existing knowledge is through the transfer and re-use of existing specialized knowledge in an organization.

3.4.3 Formulating and Implementing Strategy

Rumelt, (2011) emphasizes that strategy preparation typically involves two major processes: formulation and implementation. Formulation involves analyzing the environment or situation, making the diagnosis, and developing the guiding policy. It includes such activities as strategic planning and strategic thinking.

Implementation of strategy refers to the action plans taken to achieve the goals established by the guiding policy (Mintzberg and Quinn, 1996). Henderson (1981) suggests that strategy depends upon the ability to foresee future consequences of present initiatives. In addition, the basic requirements for strategy development include:

1. Extensive knowledge about the environment, market and competitors.
2. Ability to examine this knowledge as an interactive dynamic system.
3. The imagination and logic to choose between specific alternatives.

Henderson (1981) suggests that strategy was valuable because of the finite resources, uncertainty about an adversary's capability and intentions; the irreversible commitment of resources; necessity of coordinating action over time and distance; uncertainty about control of the initiative; and the nature of adversaries' mutual perceptions of each other.

3.4.4 The Effects of Strategy Implementation on Knowledge Retention

Martins (2010) argues that the loss of knowledge in an organization will have a direct impact on the implementation of the organization's strategy. The items in this factor would enable organizations to determine the elements that hinder or enhance successful implementation of the organizational strategy. These pertain to the extent to which maintaining organizational growth and developing new products and services regardless of knowledge loss are achieved, and determining areas of competitive advantage because of specialized knowledge. Values that would contribute to successful strategy implementation and ultimately knowledge retention appear to be openness, respect, innovativeness, and organizational trust.

3.5 Knowledge at Risk

There are many categories of organizational members that have an important part of the organizational knowledge. These categories, if missed, will harm the organizational knowledge. The main categories are summarized in the following paragraphs:

1- Employees approaching retirement

DeLong (2004) claims that a growing number of organizations are facing a significant increase in retirement in the years ahead. It appears that it is essential to retain the knowledge of employees reaching retirement. It is not possible to gather the knowledge of everyone approaching retirement, however, many organizations have introduced programs aimed at preserving the essential knowledge of retiring workers (Seidman and McCauley, 2005).

2- Best performers

The organization should identify its best performers focusing on critical knowledge loss regardless of age (Seidman and McCauley, 2005). Parise, et al., (2006) describe the Delta Airlines example of knowledge loss in the mid-1990s, when the ranks of many experienced mechanics were downsized to reduce costs, but it took the remaining, less experienced employees much longer to diagnose and repair airplanes. The thing that created many problems.

3- Experts/Specialists

An expert is a person who have deep knowledge and understanding in a certain field, which is far above average (Bender and Fish, 2000). Martin (2010) defines the specialist as the person who exclusively studies a subject or a particular branch of a subject. The researcher adds, the terms specialist and expert are synonyms. Blackler et, al., (1998) claim that the main reason behind achieving competitive advantage is utilizing the knowledge of the experts. Moreover, individuals with expertise are able to create uniquely new knowledge and solutions in their fields of expertise.

4- Few Key People

Martin (2010) states that it appears from the literature that each organization has a few key people whose knowledge is of critical importance to the survival of the organization. Leonard (2005) adds that the departure of those key people can devastate operations. An organization has to try and identify those key people and retain their critical knowledge.

5- Leaders

Chemers (1997) defines leadership as the process of social influence in which one person can enlist the aid and support of others in the accomplishment of a common task. The leader can be defined simply as somebody the people follow, or as somebody who guides or directs others (Business Direction, 2014). The role of leaders in creating and developing a supportive environment and mechanisms that would be conducive to knowledge behaviors (e.g. knowing, learning, sharing and transferring tacit knowledge, and creating knowledge climate) would include showing role modeling behaviors, providing learning opportunities, and acting as knowledge champions.

CHAPTER FOUR

Behavioral Factors towards Knowledge Retention

4.1 Introduction

This chapter shall overlook the behavioral factors towards knowledge retention, namely "Knowledge attitudes and emotions, power play, leadership and knowledge growth and development" define each factor, discuss the stages of the factor and test the effect of the factor on knowledge retention.

4.2 Knowledge Attitudes and Emotions

4.2.1 Definition of Knowledge Attitudes and Emotions

According to Haddow, et al., (1995) attitude is defined as an opinion that one has about someone or something, it can reflect a favorable, unfavorable, or neutral judgment, he also added that attitudes are thought to reflect the mental readiness or learned disposition that influence actions and reactions. Emotions can be defined as intense feelings that are directed at something or someone, in other words, they are reactions to an object. They can be felt (actual internal emotions towards something) or displayed (emotions that appear on an individual towards something). Emotions are required sometimes by the organization and considered appropriate in a given job. For example, employees who have learnt to cover up their anger when they have been passed over for promotion. This means that people are often required to exhibit emotional behaviors that mask their true feelings (Roodt, 2003).

4.2.2 Knowledge Attitudes and Emotions Factors

Martins (2010) emphasizes the following knowledge attitudes and emotions factors that encourage or impede knowledge retention in an organization:

1. **Biographical Characteristics**

Individuals enter organizations with certain intact biographical characteristics that influence their behavior at work. Examples of these variables are age, race, gender and years of service or tenure (Robbins, 2005). Ojha (2005) and Peltokorpi (2006) studied the effects of the biographical factors on cross-cultural knowledge sharing. The researchers concluded that

individuals who perceive themselves as a minority on the basis of gender are less likely to participate in knowledge sharing (Ojha, 2005). In addition, Age make communication (e.g. knowledge sharing) difficult for some people. The presence of elderly employees decreases the sharing of knowledge across cultures and units. Moreover, Married persons, whether male or female, are less likely to be part of workplace or external socialization and, therefore, less likely to be part of knowledge-sharing processes (Ojha, 2005). In addition, Education levels in a society that is status conscious and where people with higher levels of qualifications are likely to remain aloof from the others, are likely to lead to the creation of subgroups that might hurt knowledge sharing at team level (Ojha, 2005). Also, people with longer tenure will be less likely to participate in knowledge sharing (Ojha, 2005). Language, that is a prominent medium for knowledge sharing, influences how much people are able to share and acquire knowledge (Peltokorpi, 2006)

2. Personality

Individuals working in an organization always bring something of themselves to a situation. This "something" refers to the individual's personality (Hellriegel, et al., 2001). Personality is the stable set of characteristics and tendencies that determine those commonalities and differences in the psychological behavior (thoughts, feelings, and actions) of people that have continuity in time and that may not be easily understood as the sole result of the social and biological pressures of the moment" (Maddicitedin Hellriegel, et al., 2001). To understand the personality of an individual is to grasp both what makes the person unique and what he or she has in common with all or some other people. Gibson, et al., (1994) link their definition of personality to behavior by defining it as a set of characteristics that does not change and tendencies that determine differences and commonalities in people's behavior. Cabrera (2004) suggests that personality traits, in particular extroversion, agreeableness, conscientiousness and openness, are positively associated with knowledge-sharing behavior of individuals. Lin (2007) concluded that cooperativeness of employees could lead to higher tacit knowledge sharing and organizational commitment. If employees lack cooperativeness, they might do unethical things against the organization by not collaborating with others.

3. Values

Values are relatively permanent and deeply held desires or convictions of individuals that a specific mode of conduct is personally or socially preferable to an opposite or converse mode of conduct (Hellriegel, et al., 2001; Robbins, 2005). Individuals use values and beliefs

when confronted with a situation in which they have to make choices (Gibson, et al., 1994). In addition, values are enduring beliefs and expectations of individuals or a group of individuals that influence and guide behavior across all situations (Cools and Broeck, 2006). Maierhofer and Finsterle (2004) conducted a research on employees' willingness to share knowledge in organizations and found out that personal values like the belief in the importance of knowledge sharing emerged as the strongest link to knowledge sharing with co-workers (Maierhofer and Finsterle, 2004). In addition, the trustworthiness of the source is vital in the important knowledge transfer process. When the source is perceived as trustworthy, the recipient will be less suspicious of the offered conception, and thus more open and receptive to its detail (Hovland, et al., 2003). The literature search revealed values such as organizational commitment, trust, justice, fairness, and collaboration would enhance tacit knowledge sharing. Organizational commitment is seen as the strength of an employee's identification with and involvement in a particular organization (Porter, et al., 2007).

4. Ability to communicate

The abilities of an individual refer to his or her capacity or talents to perform various tasks in a job (Hellriegel, et al., 2001; Robbins, 2005). An individual's abilities are made up of intellectual or mental and physical abilities (Gibsonetal, 1994; Robbins, 2005). Abilities are linked to motivation that drives behavior (Hellriegel, et al., 2001). The feasibility of knowledge behaviors is dependent on the individual's abilities, skills, competencies, strengths and weaknesses. People are not clones (Gilley and Boughtonin, 2003) which implies that peoples' knowledge behaviors will differ on the basis of their abilities, skills and competencies. Knowledge learning and creating at individual level involve the ability to deal with new situations, events, information and contexts (Von Krogh, et al., 2000). Cabrerain, et al. (2004) argue that perceptions and beliefs regarding individual competencies and skills are positively associated with the knowledge-sharing behavior of individuals. Moreover, an individual might only learn and accept knowledge from another individual if he or she believes that the person has expertise in the shared knowledge. However, a person may only share his or her knowledge with a person he or she believes will be able to absorb the knowledge and use it. In addition, sharing and transferring knowledge depend on the ability of the source to communicate his or her knowledge in a way which the receiver can understand. This ability relates to previous experience and the ability to frame his or her knowledge in different ways and consider different perspectives (Reagans and McEvily, 2004).

5. Perception

Perception can be described as the process whereby an individual gives meaning to the environment. Individuals organize and interpret sensory impressions or stimuli into a psychological experience (Gibson, et al., 1994; Robbins, 2005). Robbins (2005) suggests that what an individual perceives can be extremely different from the objective reality. Moreover, an individual's behavior is based on his or her perception of what reality is and not on reality itself. Perception seems to be an obstacle in the way of sharing tacit knowledge. Perceptually, the characteristics of unconsciousness relate to people not being aware of the full range of their knowledge (Polanyi, 2000). The feeling of a missing link or the elements of intuition are more difficult to pinpoint. This type of knowledge has often become a natural part of the individual's behavior and way of thinking because it has become so internalized. People are not always aware of this tacit knowledge and do not exert themselves to reflect on their tacit knowledge (Haldin-Herrgard, 2000). Perceptions about others' willingness to share their knowledge are a key factor in determining whether an individual chooses to share his or her knowledge with others. Individuals will only be motivated to share knowledge if they believe that a particular piece of knowledge is in fact worth sharing (Cabrerain et, al., 2004).

6. Personal development

Personal development includes activities that improve awareness and identity, develop talents and potential, build human capital and facilitate employability, enhance quality of life, and contribute to the realization of dreams and aspirations. When personal development takes place in the context of institutions, it refers to the methods, programs, tools, techniques, and assessment systems that support human development at the individual level in organizations (Aubrey, 2010). Humboldt (1954) describes personal learning by stating that "If there is one thing more than another which absolutely requires free activity on the part of the individual, it is precisely education, whose object it is to develop the individual". Hamilton (1993) argues that personal development includes the following activities:

- Improving self-awareness.
- Improving self-knowledge.
- Improving or learning new skills.
- Becoming a self-leader.
- Building or renewing identity/self-esteem.

- Developing strengths or talents.
- Improving wealth.
- Spiritual development.

4.2.3 The Effects of Knowledge Attitudes and Emotions on Knowledge Retention

Martins (2010) argues that knowledge attitudes and emotions which appears at the individual level, encompasses aspects of the original personality and emotions regarding cooperation and commitment to prevent knowledge loss in an organization. All the new items appear to relate to individuals' perceptions of their colleagues since all items start with the words. It can be concluded that perceptions of colleagues that manifest in attitudes and emotions regarding knowledge loss, on the one hand, and willingness to share, ability to communicate knowledge and taking responsibility for own development, on the other, could affect the degree to which knowledge is retained.

Based on the above discussion, it can be concluded that personality and emotions are deep seated and can manifest in certain behaviors. From a knowledge behavior perspective, individual personalities and emotions need to be considered when knowledge behaviors such as learning and sharing do not take place. In this context, cooperativeness and emotional and organizational commitment supported by trusting relationships appear to be significant. It would appear that values and beliefs such as fairness, cooperativeness, commitment, trust (in colleagues and managers) and attitudes such as willingness to enact knowledge behaviors (learn, share, transfer, use and apply) are an integral part of individuals' knowledge behaviors. Factors such as resistance to change or hesitance and unwillingness to enact knowledge behaviors could cause knowledge loss. In terms of ability, it can be concluded that knowledge behaviours will be improved by an ability to communicate knowledge in an understandable way and by working alongside colleagues (not on one's own). The perceptions of individuals seem to be an underlying factor that would be influenced by their attitudes, beliefs and values and have an impact on their behavior. In terms of individual learning, it can be concluded that active engagement in learning opportunities, taking responsibility for his or her own learning, and development, and determining whether a person is satisfied with doing his or her job without further development would indicate where to focus in an attempt to retain knowledge.

4.3 Power Play

This chapter shall overlook the definition of power play. In addition, the factors that influence power play will be discussed. Finally, the effects of power play on an organization shall be emphasized.

4.3.1 Power Play Factors

Martins (2010) argues that the extent of power and politics plays a role in preventing or enhancing knowledge retention in an organization. The following is the power play factors that may affect knowledge retention:

1- **Group cohesiveness and social interactions at work**

Behavior is influenced by the degree to which group members are attracted to each other and are motivated to stay in the group. A cohesive group will be more productive than a less cohesive one (Robbins, 2005). This implies that a cohesive group may be more willing to learn, create knowledge and share, transfer and apply knowledge. People value social relationships differently, for example, an individual who is well identified in a specific group may wish to maintain close contact with the group members working on the same project, leading to a strong willingness to trust the co-members. Individuals are likely to trust those co-workers who offer friendships and social support to them. Lin (2007) argues that the significant influence of social network ties on trust in co-workers revealed that effective social relationships between co-workers help them cultivate trust in one another and then yield tacit knowledge sharing.

2- **Resolving difference**

Conflict can be defined as a process that begins when one party perceives that another party has negatively affected or is about to negatively affect something the first party cares about (Robbins, 2005). Conflict becomes visible through the behavior of individuals, for example, the statements, actions and reactions made by the conflicting parties. Conflict is dysfunctional in groups and should be managed to restore harmony and functionality. Panteli and Sockalingam (2005) claim that conflict is an inherent issue of any organizational arrangement and central to knowledge sharing. Tsai and Chang (2005) emphasize that moderate conflicts are necessary and helpful for organizations to avoid inertia and arouse creativity and variety, while an excess of conflicts could also be harmful for the organization. Moreover, conflicts are manageable and need to be managed by means of conflict resolution

processes to improve knowledge sharing and communication in work teams. Robbins (2005) claims that distorted or blurred information may be disseminated or propagated during the communication process, which could breed conflict and hostility among members participating in the process of communication.

3- Making use of external expertise

The natural way to gain influence is to become a power holder. Hence, members who want power will build a personal power base. Those who are out of power and wish to be in will first try to increase their power individually. If this does not prove effective, the alternative is to form a coalition because there is strength in numbers (Robbins, 2005). Political behavior in an organization involves the attempts of some members to influence the behavior of others and the course of events in the organization in order to protect their self-interests, advance their own goals or meet their own needs. Political behavior implies that certain people are gaining something at the expense of others or the organization as a whole. Employees may justify their own political behavior as defending their legitimate rights or interests, yet refer to similar behavior by others playing politics (Hellriegel, et al., 2001). French and Raven (2005) suggest that expert power can be considered an important source of power. Expert power is based on the capacity to influence other people because the person possesses special expertise, skills or knowledge that is highly valued. Experts have power regardless of their formal position in the organization. The more difficult it is to replace an expert, the greater degree of expert power the person possesses (Ivancevich, et al., 2005).

4- Experts sharing their knowledge

Mahee (2006) argues that sharing knowledge requires the investment of time and effort, and individuals may not be motivated to share their knowledge because of politics in the organization. Power and politics can also play a role at group level when expertise is used to support the interests of specific groups. Hislop, et al., (2003) highlight that external expertise and information were utilized by groups as a political resource to reinforce and support their particular visions for change. They also reported how groups supporting the interests of senior managers received the authoritative support and financial resources to implement change. Robbins (2005) cautions against the power an expert can gain by hoarding knowledge for individual use and exploiting the knowledge of others. Individuals in large organizations may also use their critical knowledge as a source of power for personal advantage as leverage or as guarantee of continued employment (Goh et, al., 2004). Experts

feel they need to protect their knowledge because of the power they can gain by keeping it to themselves hence, their reluctance to share it. According to Stenmark (2004) people will not share without strong motivation and without considering what they may gain or lose by doing so. Syed-Ikhsan (2004) claims that management should always consider the tendency of individuals to use knowledge as their source of power (Syed-Ikhsan and Rowland, 2004). Small (2006) emphasizes that the use of positional power through coercion, reward systems, and withholding of information may have short-term success in gaining a knowledge advantage. It is proposed that sustainable advantage can only be achieved one's power to facilitate the trust and collaboration necessary for knowledge sharing.

5- Trusting colleagues

Fineman (2003) maintains that some feelings of trust are important if knowledge is to be exchanged for mutual benefit. Trust is described as an emotionalized commodity that is reframed and revalued in the politics of exchange. He describes Andrews and Delahaye's (2000) qualitative study of a medical scientist who was required to share information with other scientists in partner organizations. The process was fraught with anxieties, such as anticipated status loss in giving away important information and feeling intimidated when asking for information from a professional senior. Renzl (2008) suggests that the fear of losing one's unique value plays a mediating role between trust in management and knowledge sharing. Furthermore, trust in management reduces the fear of losing one's unique value in the knowledge sharing process. Trust is not something that is simply present or absent, but it is negotiable and contextually or structurally specific. Its structure is emotional, involving feelings such as ease, suspicion, fear, confidence, comfort, and anxiety. It shapes the value and worth of knowledge and learning. If there is a strained trust relationship in an organization, knowledge transfer and organizational changes are likely to be received cautiously, defensively or cynically, especially when management work by creating fear, anger, shame or hopelessness (Fineman, 2003).

4.3.2 The Effects of Power Play on Knowledge Retention

Power play appears to combine mainly elements at group level, namely group cohesiveness from group structure, resolving differences from conflict, making use of external expertise and experts freely sharing their knowledge from power and politics. The trust element at the individual level (trusting colleagues) and the team member trust element (team members trust one another) are combined in this factor. The team member trust

element formed part of organizational culture as a value at the organizational level, but from the team member perspective could have formed part of the group level in the theoretical model. It can be concluded that if trusting relationships, conflict resolution, making use of and sharing expertise freely are negative, power and politics could come into play, preventing knowledge retention.

4.4 Leadership

This section shall overlook the definition of leadership, and the leaders and leadership traits. In addition, the leader's role in promoting and enhancing knowledge and learning is highlighted. Finally, the effects of leadership on knowledge retention are emphasized.

4.4.1 Definition

Chemers (1997) defines leadership as the process of social influence in which one person can enlist the aid and support of others in the accomplishment of a common task. The leader can be defined simply as somebody whom people follow, or as somebody who guides or directs others (Business Direction, 2014). The leader, as mentioned above, is the person who can influence others to achieve his or her goals. According to some, leadership is determined by distinctive dispositional characteristics present at birth like extraversion, intelligence, and ingenuity. However, other scholars found evidence to show that leadership also develops through hard work and careful observation (Forsyth, 2009). Thus, effective leadership can result from nature (i.e., innate talents) as well as nurture (i.e., acquired skills). Groups flourish when guided by effective leaders. Baumeister, et al. (1988) explain this by emphasizing the bystander effect, failure to respond or offer assistance, that tends to develop within groups faced with an emergency is significantly reduced in groups guided by a leader. Moreover, Jung (2008) argues that it has been documented that group performance, creativity, and efficiency, all tend to climb in businesses with designated managers or CEOs. However, the difference leaders make is not always positive in nature. Leaders sometimes focus on fulfilling their own agendas at the expense of others, including his/her own followers (Lipman-Blumen, 2005).

4.4.2 Leadership Traits

There is often confusion about leadership and management. On the one hand, Robbins (2005) argues that effective management brings about order and consistency by formulating detailed formal plans, designing rigid organizational structures and monitoring

results against plans. On the other hand, leadership is about coping with change. Moreover, leaders establish direction by creating a vision for the future. They then align people by communicating this vision, inspiring them to become part of the vision and to overcome obstacles (Robbins, 2005). Another vital aspect of leaders is living by values that support their ideas and vision and influencing people to embrace the ideas and vision in their own behaviors (Hellriegel et al, 2001). Leaders should therefore have the ability to influence groups towards the achievement of goals (Robbins, 2005). Research on leadership traits using the Big Five personality framework has revealed encouraging results. Traits of extroversion, conscientiousness and openness to experience show strong consistent relationships to leadership (Robbins, 2005). The other two traits are adjustment and sociability (Hellriegel, et al., 2001). Chen and Barnes (2006) suggest that leaders who communicate a strong vision, create buy-in through jointly envisioning a positive future, communicate clear expectations and create an awareness of organizational problems, are likely to improve knowledge sharing. Leaders who also promote careful problem solving and give their employees personal attention will be more likely to improve knowledge sharing.

4.4.3 The Leaders' Ability to Promote Knowledge Behavior

In addressing the question on how leadership relates to knowledge behaviors, Devos and Willem (2006) point out that involved leadership is a factor that would facilitate organizational learning capabilities. This can take place through articulating vision, being extremely actively engaged in its actualization, taking ongoing steps to implement the vision and being involved hands on in educational and other implementation steps. Several authors agree that the success of knowledge behaviors fundamentally depends on leaders promoting a conducive environment and creating a managerial mindset that promotes cooperation and flow of knowledge throughout the organization (DeLong, et al., 2004. The role of leaders in creating and developing a supportive environment and mechanisms that would be conducive to knowledge behaviors (e.g. knowing, learning, sharing, transferring tacit knowledge, and creating a knowledge climate) would include the following:

1. Showing role-modeling behaviors: for example, knowing, learning, creating, sharing, and transferring knowledge (Pan and Scarbrough, 1998).
2. Providing learning, creating, sharing and transferring of knowledge opportunities: for example, storytelling, mentoring and coaching, after action review, and communities of practice (DeLong, 2004).

3. Building knowledge behaviors into organizational processes: for example, creating, sharing, transferring and applying expert knowledge in project planning or decision-making processes (Van der Sluis, 2004).
4. Acting as knowledge champion: the knowledge champion is the person arguing on behalf of the organization for knowledge behaviors to be displayed (VanderSluis, 2004).

All of these roles would encourage knowledge retention in the organization. The focus is on creating a positive context by managers. In addition, the lack of support from top management, such as not creating social system to support knowledge behaviors, is perceived to be one of the greatest impediments of knowledge behaviors (Noe, et al., 2003). Empirical evidence of the role of leadership in promoting knowledge behaviors is found in the study of Lin and Lee (2004). This study suggests that the main determinant of knowledge-sharing behavior in an organization is deemed to be the encouraging intentions of senior managers. In addition, the following aspects of senior managers were found to positively influence intentions to encourage knowledge sharing:

1. Senior managers' attitudes: managers with the strongest intentions to encourage knowledge sharing also had more positive attitudes towards knowledge-sharing behavior.
2. Subjective norms: deciding whether to encourage knowledge-sharing behavior was influenced by opinions of those influencing their decisions owing to corporate benefits and opinions of those important to them (Lin and Lee2004:120).
3. Perceived behavioral control: that is the knowledge, experiences and abilities of senior managers impacting on the ease or difficulty of encouraging knowledge-sharing behaviors (Ajzen, et al., 2004)

Barnes (2006) suggests that a set of behaviors, which are part of transactional leadership, were found to be significantly and positively correlated to knowledge sharing:

1. Transformational leadership behaviors: which can be defined as the effect of leaders on followers whether they feel trust, admiration, loyalty and respect towards the leader and whether they are motivated to do more than they originally expected to do (YuklinChen and Barnes, 2006).
2. Contingent reward behaviors: that are ways the leader assigns or obtains agreement on what needs to be done by promising rewards or actually rewarding others in exchange for satisfactorily executing the assignment.

4.5 Knowledge Growth and Development

This section shall overlook the definition of knowledge growth and development, and the factors of knowledge growth and development. Finally, the effects of knowledge growth and development on knowledge retention are emphasized.

4.5.1 Knowledge Growth and Development Factors

Many researches and books demonstrate the link between personal knowledge and several factors that would cause the growth and development of this knowledge. (Stanovich and Cunningham, 1993) suggests that reading is one of the primary mechanisms by which individuals increase their intellectual faculties and grow their knowledge. Attwel (2007) investigated e-learning environment as source of personal knowledge. Several other researchers suggested the internet, T.V., and radio programs as source of knowledge growth. Others mentioned socialization as a source also. Martins (2010) argues that knowledge growth and development covers three main elements, at individual level, ranging from ability, motivation to individual learning. Ability is defined as working with colleagues to improve one's ability to retain knowledge. While motivation is gaining satisfaction from sharing knowledge whilst working with colleagues. Individual learning can be defined as actively engaging in learning opportunities to further develop oneself.

The researcher shall adopt the three factors of Martins (2010) to be used as a measure of knowledge growth and development. These factors cover in their context all issues suggested by other researchers. An example of this would be individual learning which is actively engaging in learning opportunities to further develop oneself. This would cover watching T.V. documentaries or engaging in social activities or even attending a training course.

1- Ability

Ability is the capacity or talents required to perform various tasks in a job (Hellriegel, et al., 2001). An individual's abilities are made up of the mental and physical abilities (Robbins, 2005). Knowledge learning and creation at the individual level involves the ability to deal with new situations, events, information and contexts (Von Krogh, et al., 2000). Insufficient cognitive ability to comprehend more complex relationships in knowledge could be a barrier to an individual's ability to, learn, create, share, transfer, and absorb knowledge (Calhoun and Starbuck 2003). Perceptions and beliefs regarding

individual competencies and skills are positively associated with the knowledge-sharing behavior of individuals (Cabrera, 2004). An individual might only learn and accept knowledge from another individual if he or she believes that the person has expertise in the shared knowledge. However, a person may only share his or her knowledge with a person he or she believes will be able to absorb the knowledge and use it. In terms of knowledge transfer, the decision to transfer knowledge is largely individual and based on ability and willingness to transfer knowledge (Minbaeva and Michailova, 2004). Sharing and transferring knowledge depend on the ability of the source to communicate his or her knowledge in a way which the receiver can understand. This ability relates to previous experience and the ability to frame his or her knowledge in different ways and consider different perspectives (Reagans and McEvily, 2004). Sources or senders might not be able to transfer knowledge because they lack the skills and competencies to do so or have a language deficiency (Cabrera, 2004), as in, say, cross-cultural knowledge transfer situations. In terms of ability**,** it can be concluded that knowledge behaviors will be improved by an ability to communicate knowledge in an understandable way and by working alongside colleagues (not on one's own).

2- Motivation

Motivation is defined as the forces acting on or within a person that causes the person to behave in a specific manner (Hellriegel, et al., 2001). Motivation creates persistent way towards attaining a goal (Robbins, 2005). In addition, motivation is linked to behavior in the sense that it drives individuals to behave in a way that would lead to desired or expected outcomes (Robbins, 2005). Learning requires a certain level of stress and motivation (Schein, 2003). In addition, the nature and substance of such motivation is variable across cases of collaboration, levels in the organization, and stakeholders in learning collaborations (Salk and Simonin, 2003).

Intrinsic motivation which is brought about by responsibility, challenge, and feedback characteristics of knowledge behaviors**,** i.e. the pleasure or value one receives from the behavior (Gibson, et al., 1994). Moreover, extrinsic motivation, which is brought about by external rewards such as pay, promotion or fringe benefits (Gibson, et al., 1994) will be discussed also. Osterloh and Frey (2003) argue that if knowledge to be shared is tacit, the role of intrinsic motivation outweighs the role of extrinsic motivation. When individuals work together as a team to solve complex tasks, tacit knowledge sharing takes place and the satisfaction of working together to solve the task, motivates them to share

their knowledge. Devos and Willem (2006) argue that people can be intrinsically or extrinsically motivated to share their knowledge, but intrinsic motivation based on people identifying with the group or organization, trust and a collaborative environment are far more effective in stimulating knowledge sharing. Theoretically, some authors such as Cabrera (2004) and Zweig (2006) argue that rewards would have a positive influence on knowledge sharing, but this has not been proved empirically. It can be concluded that intrinsic motivational factors such as satisfaction gained from sharing knowledge whilst working with colleagues and other factors such as a positive attitude towards sharing, personal values and trust, identifying with the group and a collaborative environment would enhance knowledge behaviors more positively than extrinsic motivational factors such as rewards.

3- Individual learning

Gibson, et al., (1994) define learning as the process by which a relatively enduring change in behavior takes place as a result of practice. Robbins (2005) argues that learning is the natural result of experience. Hellriegel, et al., (2001) define learning as a relatively permanent change in the frequency of occurrence of a specific individual behavior. Learning takes place when an individual behaves, reacts and responds as a result of experience or practice in a way that is different from the way he formerly behaved (Robbins, 2005). Furthermore, learning is associated with change which must be relatively permanent. These changes could be changes in actions, thoughts, processes, or attitudes, and if not accompanied by behavior, would not be learning. Robbins (2005) suggests three learning theories which are classical conditioning, operant conditioning, and social learning.

a- Classical Conditioning is based on the experiment of Ivan Pavlov in the early 1900s to teach dogs to salivate in response to the ringing of the bell, where the ringing of the bell was associated with the piece of meat that would subsequently be presented to the dog. Classical conditioning is passive in the sense that something happens and people react in a specific way. Classical conditioning is prevalent in organizations. For instance, when people start acting prim and proper and tiding their offices when they see that the windows are being washed and the administrative offices are being cleaned up, because they associate this behavior with a possible visit from the head office top management team, conditioned by previous incidents (Robbins, 2005).

b- Operant Conditioning refers to behavior being a function of its consequences. People learn to behave to acquire something they desire or to avoid something they do not

want. This type of behavior is voluntary or learned (not reflexive or unlearned behavior). It is influenced by reinforcement or lack of reinforcement brought about by the consequences of the behavior. People will be most likely to engage in desired behaviors if they are positively reinforced for doing so. If a certain expected behavior is not positively reinforced, the probability that the behavior will be repeated (Robbins, 2005).

c- Social Learning takes place when individuals learn by observing what happens to others, by being told about something and by direct experiences. Social learning is an extension of operant conditioning (i.e. behavior is a function of consequences), but also acknowledges the role of observation (e.g. observing the behavior of models such as managers and colleagues in the organization) and perception in learning. People respond to how they perceive and define consequences, not to the objective consequences themselves (Robbins, 2005).

In terms of individual learning, it can be concluded that active engagement in learning opportunities, taking responsibility for his or her own learning and development and determining whether a person is satisfied with doing his or her job without further development would indicate where to focus in an attempt to retain knowledge.

4.5.2 The Effects of Knowledge Growth and Development on Knowledge Retention.

The feasibility of knowledge behaviors is dependent on the individual's abilities, skills, competencies, strengths and weaknesses. People are not clones, which implies that people's knowledge behaviors will differ on the basis of their abilities, skills and competencies (Gilley and Boughton, 2003). It can be concluded that intrinsic motivation, actively engaging in learning opportunities and working with colleagues could contribute to knowledge growth and development, as a contributing factor to knowledge retention.

CHAPTER FIVE

Previous Studies

5.1 Arabic Studies:

5.1.1 Al-Agha and Abu El-Khair, (2012) The Reality of Applying Knowledge Management Processes in Al-Quds Open University and Procedures to Develop it.

Research Objective: The study aimed to reveal the reality of the application of knowledge management processes in-Al-Quds Open University and discover procedures to develop it through the identification of whether there is a statistically significant difference at on the reality of the application of knowledge management processes at Al-Quds Open University Due to the variables (Experience – Qualification – district area).

Methodology: The study has adopted the descriptive analytical approach. The researchers designed a questionnaire composed of seven dimensions represent knowledge management processes and distributed to a sample size (250) supervisor of academic administrators.

Findings: The results of the study shown that the application of knowledge management processes at Al-Quds Open University has a relative average of (63.8%), the study also revealed that there is no statistically significant differences towards knowledge management application attributed to years of experience and the school district.

Recommendations: The study recommends opening a department for knowledge management in Al-Quds Open University and imposing performance management processes on the of procedures adapted in the university.

5.1.2 Salem Deeb (2012) Development of Administrative and Service Performance at the Municipality of Gaza through Knowledge Management.

Research Objective: The study aims to examine knowledge management as an effective tool for the development of administrative and service performance at the municipality of Gaza, and to investigate the factors (infrastructure, intellectual capital, organizational culture) that influence knowledge management implementation. Also, the study aims to build a proposed framework for knowledge management implementation at the municipality of Gaza. The framework illustrates knowledge process (acquisition, sharing and implementation) and the factors that influence the success of this process.

Methodology: The research utilized a combination of qualitative and quantitative methodologies. A questionnaire has been developed and tested by a pilot study and then distributed on a sample consisting of 240 employees and have 94% response rate.

Findings: The study revealed that 67.26% of the municipality of Gaza staff agreed that there is a statistical significant effect of knowledge management implementation on development of administrative and service performance. This reveals that knowledge management is an effective tool and strongly affect performance. In addition, 64.93% of the municipality staff agreed that there is a statistical significant effect of technological and physical infrastructure on knowledge management and performance. The results reveal that information technology strongly affects knowledge management implementation, while physical infrastructure has less impact on knowledge management implementation. On the one hand, the results show that the dimension of structural capital strongly affects knowledge management. On the other hand, relational capital has less impact on knowledge management implementation.

Recommendations:

1. Initiate a new core center as an infrastructure for knowledge creation and sharing with an experienced team.

2. Set up a strategic plans to build a strong and solid experiences among employees and manage mutual knowledge transfer between members.

3. Increase awareness to knowledge management

4. Reinforce employee's loyalty to their organization.

5. Use job rotation to create special skill and enhance the transfer of knowledge.

6. Establish an online knowledge bank.

7. for whole resources concerning municipal strategies, services, activities and

5.1.3 (Al-Adaileh R. and Al-Atawi M., 2011): "Organizational Culture Impact on Knowledge Exchange: Saudi Telecom context"

Research Objective: The purpose of this study is to investigate the impact of some organizational culture attributes on the knowledge exchange process within the context of the Saudi Telecom Company (STC) as a representation of the Saudi context.

Methodology: A descriptive correlation design was used. A web survey was used to collect data from 378 employees working on STC using Random Number. The sample was selected using an e-mailing list.

Findings: This study showed that some organizational culture factors (teamwork and customer orientation) have high level of importance from the perspectives of STC‘s employees while Supervision, openness to change, innovation, and involvement, morale, trust and information flow have medium level of importance from the perspectives of STC‘s employees.

Recommendations: This study suggested some recommendations include: Knowledge sharing and exchanging has to be a domestic culture on STC by building this culture using deferent techniques like training, meeting, building communities of practices and so on. Innovation, information flow, trust, supervision, and rewards system are important cultural attributes that should be considered for successful knowledge management initiative.

5.1.4 Madi I (2010) The Role of Knowledge Management in Higher Education Quality Assurance – Case Study (I.U.G)

Research Objective: This study discussed the role of knowledge management in Higher Education Quality Assurance – Case Study on The Islamic University of Gaza.

Methodology: The researcher designed a questionnaire and distributed it to (359) members of the study sample who were employees in The Islamic University.

Findings: The study concluded that there are differences in the opinions of sample members about knowledge management infrastructure depending on the scientific degree. However, there were no differences in the opinions of sample members on how to ensure the quality due to the scientific degree. The study found that there is significant statistical relationship between experience and higher education quality assurance. On the other hand, while there is relationship between E- Library and higher education quality assurance, there is no relationship between internet connection and higher education quality assurance In addition, the study found that there was a relationship between equipment saving and higher education quality assurance from one side, and the relationship between external, internal database sharing and higher education quality assurance in the other side. Finally the results show that there is a relationship between library diversification and higher education quality assurance.

Recommendations: The study makes several recommendations amongst which is a recommendation to increase electronic communication between the Islamic University of Gaza and other Arabic and Foreign universities in additional to increase collaboration with statistical and research centers as well as increase scholarships to foreign universities as this has a large impact on ensuring the continuity of quality improvement.

5.1.5 Al-Mdan S. and Moussa M. (2010) the effect of organizational culture factors on knowledge management implementation in Jordanian Telecommunication Group (Orange) from employee perspectives.

Research Objective: The study aims to investigate the effect of organizational culture factors on knowledge management implementation in Jordanian Telecommunication Group (Orange) from employee perspectives.

Methodology: The study used analytical descriptive methodology for the purpose of describing and analyzing knowledge management state in the group in term of knowledge generating, and diagnosing the impact of organizational culture factors represented by information systems, operations, employees and leadership on knowledge management implementation in the group. However, the analysis unit sample and inspection included (270) subjects from all managerial level which were randomly selected.

Findings: The study concluded that there is a significant impact of organizational factors on knowledge management implementation. Results indicated that organizational culture factors interpret (72.9%) of the difference in knowledge management. And the study revealed that leadership was the most impact among organizational culture factors on knowledge management implementation.

Recommendations: Call on higher management to engage more effectively in knowledge management procedures, build an effective knowledge management strategy, increase awareness of knowledge management within the organization.

5.1.6 (Ahmad N. and Daghfous A., 2010): Knowledge sharing through inter-organizational knowledge networks: Challenges and opportunities in the United Arab Emirates

Research Objective: The purpose of this paper is to analyze the business sector in the United Arab Emirates based on their level of involvement in knowledge-sharing activities with external sources, internal organizational innovations, and the barriers and benefits of joining knowledge networks.

Methodology: An exploratory investigation is done by in-depth interviews with the employees of five local and eight multinational companies in the United Arab Emirates.
Findings: This paper shows that the concept of knowledge management is still not well received in the companies that we interviewed. It is viewed as a capital-intensive investment that requires more than just the availability of human capital and the requisite infrastructure. All of the local companies interviewed seem to be aware of the importance of various best practices, but they still consider knowledge management as a

secondary approach to organizational success. They seem satisfied with the available knowledge.

Recommendations: The study recommends to push management to show more significant interest and focus on implementing new techniques or methods to create and generate new knowledge.

5.1.7 Al-Faris (2010) The role of knowledge management in raising the efficiency of the performance of organizations (Field study on manufacturing firms in Damascus)

This study aimed at defining the role of knowledge management in improving and enhancing performance, the study has been applied on ten new companies established in accordance with the Investment Promotion Law in 1991, and the data was collected through a questionnaire prepared for this purpose along a Period of five years (2007-2003).

The study acknowledged the results of the strong correlation between knowledge management and performance.

5.2 International Studies:

5.2.1 Ezigbo (2013) Developing intellectual asset by knowledge sharing.

This study seeks to determine the motivational factors that influence knowledge sharing, identify the obstacles to knowledge sharing, determine the nature of relationship between structural capital and human capital, and to ascertain the extent of sharing knowledge in public sector organizations. The study was carried out primarily through the survey method and interview of employees in three public sector organizations in Nigeria. Secondary data were obtained through books, journals, and internet.

Key findings of this study indicate that reciprocal benefits, recognition, information and communication technology and joy in helping others are the motivational factors that influence knowledge sharing. Fear of criticism, lack of incentives, organization culture, inappropriate decision making and operational structure are the obstacles for knowledge sharing. Moreover, there is a significant relationship between structural capital and human capital; the extent of sharing knowledge in public sector organizations is high.

5.2.2 Fullwood, et al. (2013) Knowledge sharing amongst academics in UK universities.

This study seeks to contribute to the limited previous research on knowledge sharing at the universities by profiling the attitudes of and intentions towards knowledge sharing of UK academics. Also, by profiling their views of some of the factors that might be expected to impact on knowledge sharing activities. A questionnaire based survey was used to gather a profile of UK academics' attitudes and intentions towards knowledge sharing and related factors. Those factors may constitute expected rewards and associations, expected contribution, normative beliefs on knowledge sharing, leadership, structure, autonomy, affiliation to institution, affiliation to discipline, and technology platform. Responses were received from 230 academics in eleven universities.

The researcher concluded that respondents had positive attitudes towards knowledge sharing and their intentions in this area were also good. This may be related to their belief that knowledge sharing will improve and extend their relationships with colleagues, and offer opportunities for internal promotion and external appointments. Respondents are relatively neutral regarding the way in which they are led, and the role of organizational structure and information technology in knowledge sharing. They have a relatively low level of affiliation to their university. In addition, perceptions of a high level of autonomy, coupled with a high level of affiliation to their discipline are in place.

5.2.3 Dewah (2012) Knowledge retention strategies in selected Southern Africa public broadcasting corporations.

The aim of this study was to establish how knowledge is captured and retained at South Africa Broadcasting Corporation (SABC), Department of Broadcasting services (DBS) and Zimbabwe Broadcasting Corporation (ZBC). The researcher collected data at SABC, DBS and ZBC through questionnaire administration, interviews and observations.

The study concluded that knowledge management, as a relatively new concept and practice, has not yet been properly embraced in the public broadcasting organizational system. In addition, the study found out that the respective organizational cultures impede the organizational knowledge retention. Moreover, the study established that there was no culture of knowledge sharing. It also concluded that employees were not free to share their knowledge because of government regulations, prevailing political contexts, mistrust, and general lack of incentive to share knowledge. Furthermore, organizations have no strategies or systems in place to capture the experts' knowledge. Finally, the study revealed that the

public broadcasting organizations still lag behind in collaborative and communicative technologies that facilitate knowledge transfer and sharing of tacit knowledge but retention of knowledge generally.

5.2.4 Wang (2012) Recruitment and retention of knowledge workers in Taiwan's high technology industry.

This research aims to understand the current recruitment/selection and retention practices for knowledge workers in Taiwan's high technology industry. Also, to investigate whether high technology organizations within different ownership groups would adopt different recruitment/selection and retention practices for their knowledge workers. Finally, to understand the recruitment and retention practices for knowledge workers from the perspective of workers, in relation to the organization ownership group. This research intends to focus on analyzing variations of recruitment and retention practices in Taiwan for knowledge workers in three groups which differed in their ownership type.

The results showed that organizations within various ownership groups preferred to use different practices. Taiwanese-owned firms predominantly used on-line agents to recruit knowledge workers and relied on employee ownership bonus programs to attract and retain knowledge workers. Foreign-owned firms, significantly, used head hunters. They provided their knowledge workers with high base salaries, challenging and interesting work, and influential power over work-related decisions. Non-private organizations were significantly different in their adoption of company websites. They offered good training programs, opportunities to access new technology, and attractive work-life balance, reflecting their research-oriented.

5.2.5 Whyte and Classen (2012) Using storytelling to elicit tacit knowledge from subject matter experts.

This paper seeks to report on research investigating storytelling as a means of eliciting tacit knowledge from retiring subject matter experts within a large South African organization. In total, 64 stories were collected over a 12-month period covering a varied range of technical disciplines and were analyzed using grounded theory principles combined with expert reviews.

This paper ended up with knowledge management taxonomy for organizational stories. It is suggested that, using the knowledge management taxonomy to cluster organizational stories according to knowledge management content, allows for the

opportunity to create or reuse knowledge across organizational boundaries in exciting new ways.

5.2.6 Levy (2011) Knowledge retention, minimizing organizational business loss.

The research questions the challenge of how can organizations minimize the loss of important knowledge while experiencing high levels of retiree? The research aims to suggest a framework for knowledge retention initiatives at the organizations. The research methodology is a multi-case research. The unit of analysis is organization (eight organizations analyzed, overall more than 30 retiree knowledge retention mini projects). Data linkage to the propositions and method of interpretation–explanation building technique.

This research suggests that successful knowledge retention can be achieved in three primary stages: defining scope; documenting (planning and implementation); and integrating knowledge back into the organization. Special care must be dedicated throughout the process to retaining best practices and unexpected situations, structuring the process of knowledge retention, and structuring retained documentation.

5.2.7 Phaladi (2011) Knowledge transfer and retention. The case of a public water utility in South Africa.

The study aims to develop an ideal model of knowledge retention strategy for the public water utility faced with the threat of losing the knowledge of the aging workforce. Knowledge audit interviews were conducted with a focus group of retiring experts within Rand Water, those experts retiring in the next five years from the date of interviews, with the aim to identify and address the potential loss of company knowledge and expertise as experienced and specialized employees retire.

The research concluded that the public water utility is approaching a crisis if immediate actions are not taken as far as knowledge transfer and retention are concerned. They face the problem of the retiring aging workforce, coupled with a general high turnover, especially among young professionals. The thing that will lead to some serious knowledge disintegration and deficits in the future, unless something is done now to reverse the situation. A retiring expert's program aimed specifically at encouraging knowledge sharing prior to subject matter experts' retirement should be part of the immediate plans of knowledge transfer and retention efforts.

5.2.8 DOAN, et al. (2011) A reference model for knowledge retention within small and medium-sized enterprises.

The objective of this paper is to propose a reference model for knowledge retention within Small and Medium Enterprises (SMEs). This model includes most of the fundamental elements that are believed to be critical for an effective knowledge retention implementation. The model is especially tailored for SMEs to kick-start a knowledge retention initiative at their organizations as well as can be served as a template to assess the SMEs' knowledge retention maturity level. A systemic and comparative scientific literature analysis was selected to investigate and synthesize the most critical factors that influence knowledge retention effectiveness in organizations in general and within the context of SMEs in particular.

The researchers summarized the most important factors potentially influencing the success of the knowledge retention process within SMEs. The factors can be categorized in five main categories as follows: top management support, knowledge retention strategy, learning culture, human resource practices, and information and communication technology (ICT) tools. The authors have also developed a theoretical model for knowledge retention at the SMEs**.**

5.2.9 Wamundila (2011) Enhancing knowledge retention in higher education: The case of the University of Zambia.

This study aims to identify the tools of knowledge assessment, methods employed for knowledge acquisition, and techniques used for knowledge transfer at University of Zambia (UNZA). In addition to assessing what is being done regarding knowledge retention at UNZA. A questionnaire was used to collect data from a stratified random sample of 205 academics obtained from a database at the computer center.

The results show that a number of gaps exists in the current knowledge retention practices at UNZA. With regard to knowledge assessment as an integral dimension of knowledge retention, three techniques, namely organizational capabilities assessment, workforce planning and knowledge auditing, were investigated. The findings with regard to these techniques were not positive. It was clear that very few work processes and tasks were documented.

5.2.10 Martins (2010) Identifying the organizational and behavioral factors that influence knowledge retention.

The core purpose of this thesis is to identify the organizational and behavioral factors that influence knowledge retention from a number of factors. Also, it tries to develop a model that can be used to investigate the reality of knowledge retention at the organizations. A quantitative empirical research paradigm using the survey method was adopted to determine the organizational and behavioral factors that affect knowledge retention. The survey was conducted electronically and on paper in the water supply industry.

The thesis identified nine key factors to knowledge retention, through the factor analysis, of which knowledge behaviors, strategy implementation, leadership and people knowledge loss risks proved to be the most important.

5.2.11 Carmel, et al. (2010) Retaining the knowledge of older experts: A case study.

This case study addresses the knowledge retention processes of an individual expert providing technical advice on a New Zealand construction industry helpline, in a leading scientific research organization. Through detailed observations and peer interviews, the researchers wanted to identify the elements of his expertise, problem-solving processes and knowledge retention behaviors.

Through this study, knowledge retention actions were observed in the context of individual calls. In addition, the expert did actually document knowledge for retention in the course of delivering the helpline service. Moreover, new knowledge artifacts were created by collaborating with technical and scientific experts for their input, and coordinating drafting. This alleviates concerns about the loss of expertise and the successor's need to recreate lost knowledge. Observing the expert in action, interviewing technical and scientific colleagues and users of the service, and analyzing call transcripts led to a deeper understanding of the knowledge the expert possess, including the expert's extensive networks, how the expert shared expertise with knowledge seekers, and how the expert ensured that his knowledge was retained in appropriate forms for re-use.

5.2.12 Hoof (2010), what one feels and what one knows: The influence of emotions and attitudes and intentions towards knowledge sharing.

This paper provides theoretical and empirical insights to the relationship between emotions and knowledge sharing. Hypotheses concerning the influence of pride and empathy on knowledge sharing attitudes and intentions are developed based. The hypotheses were tested by means of survey within the Dutch branch of a global IT organization, in which 252

respondents were asked to evaluate one of four different scenarios, invoking either pride or empathy. Respondents were asked about their attitude and intention towards knowledge sharing of the situation sketched at the scenario. The study concluded that the pride and empathy were found to affect eagerness and willingness to share knowledge. Furthermore, these emotions also influenced knowledge sharing intentions, partly mediated by eagerness and willingness. Both eagerness and willingness mediate the relationship between pride and knowledge sharing intention, whereas only willingness turned out to mediate the relationship between empathy and knowledge sharing.

5.2.13 Garland (2009) An investigation of knowledge transfer and retention in a government procurement office.

This study aims to introduce specific knowledge attributes that significantly impact effective tacit and explicit knowledge transfer and retention. Under this construct, the proposed investigation explores a government program office to see if replacing experienced government employees with outsourced personnel impacts corporate knowledge retention. The research methodology utilized mixed methods research design consisting of group interviews and historical information.

The study concludes that a loss of corporate knowledge can occur within U.S. government procurement program offices when government personnel are replaced with contractors who do not transfer their knowledge. When the organization does not have a useful knowledge management system, outsourced employees have a lack of trust on the system, a lack of transferred knowledge can be expected. For this reason, contractors use other means to store and transfer their knowledge in systems not available or accessible to the organization.

5.2.14 Martins and Martins (2009) The role of organizational factors in combating tacit knowledge loss in organizations.

The aim of this article is to determine what is understood by the concept of knowledge in organizations. What knowledge is at risk in organizations, what knowledge should be retained, and whose knowledge should be retained, Behavioral and strategic risk factors that would influence knowledge retention was also examined, the generic tool for academic work that contextualizes arguments, namely, contextualized theory building was deemed a useful tool to guide the investigation on the nature of knowledge. The contextualized theory-building process focuses on the epistemology, appearance, and application of knowledge. In addition, it was used as a framework for exploring the nature of

knowledge in organizations. The construct knowledge in organizations was conceptualized, and the organizational and behavioral factors that might influence knowledge retention were determined. The theoretical model of organizational behavior by Robbins (2005) was applied to the knowledge behaviors at individual, group and organizational levels.

The research concluded that knowledge is not easy to conceptualize and contextualize, as it cannot be placed into strict categories. It could be argued that knowledge at a cognitive level, learning and knowing, and knowledge development as a process of creating, sharing, transferring and applying provides a useful framework for investigating the meaning of knowledge at the knowledge loss and retention context of organizations. Knowledge at a cognitive level and knowledge development as a process are manifested in the behaviors of employees working in an organization. These manifestations could cause either tacit knowledge loss or the retention of tacit knowledge. The carriers of knowledge are related to whose and what type of knowledge might be at risk of loss to the organization, and identifying these risks would indicate to an organization where to focus its attempts to retain critical tacit knowledge. In addition, knowledge loss could have an impact on the implementation of the strategy of an organization. The strategy that an organization pursues would indicate where to look for risks to knowledge loss and what type of behaviors to encourage that would enhance knowledge retention. The research developed a model that provides a theoretical framework of the organizational factors that need to be considered to retain critical knowledge in organizations so as to ensure their competitive advantage and deliver the best service to their customers.

5.2.15 Nelson and McCann (2009) Designing for knowledge worker retention and organization performance.

This paper illuminates significant relationships between three major knowledge management (KM) design dimensions (strategic knowledge orientation, learning culture orientation and the human resource practices). The perceived ability of 150 organizations to retain their knowledge workers was investigated. Data had been collected via a questionnaire at a conference attended by more than 500 senior human resource professionals and via a subsequent mailing to those same attendees.

The study establishes the pattern of relationships among the three sets of strategies and tactics. Recognition and embracement of knowledge management by top leaders as a source of strategic competitive advantage is essential in the foundation for a learning culture and specific human resource practices. In addition, the relationships flow from strategic knowledge management orientation to the other two dimensions. Furthermore, there is a

well-defined role for the organization's leadership in setting the context for knowledge management which supports knowledge worker engagement and retention. Cultivation of a learning culture and support for knowledge management-based human resource practices cannot occur without such recognition and advocacy.

5.2.16 Willems (2009) Knowledge sharing and retention through the use of collaboration software.

This study aims to identify how well the collaboration software in use at GiPHouse facilitates knowledge sharing and knowledge retention. A case study was utilized to measure the level of knowledge sharing and knowledge retention at the organization at that time. A survey was distributed on the team members and the management with a response rate of 19% and 57.9%, respectively.

The study concluded that GiPHouse has two major systems in place to facilitate their knowledge sharing and retention. These systems on itself seem to be capable of performing the tasks laid out for them (even in the GiPHouse context) and are currently in use in multiple organizations throughout the world. The systems could help them to streamline their organization and improve productivity. By sharing explicit knowledge and facilitating tacit knowledge sharing, the knowledge situation in GiPHouse would be greatly improved. However, a big problem faced with the use of these systems is the fact that the upper management is doing a poor job in actually promoting the use of these systems and creating the correct environment in which to optimally use the systems provided. Both managers and team members are not motivated to use and to contribute to the systems, which leads to poor performance from the system itself. Furthermore, only a handful of people are currently contributing knowledge for the entire system. This leads to faulty and not up-to-date knowledge being placed on the system which in turn leads to bad performance in terms of knowledge sharing.

5.2.17 Arif, et al. (2008) Measuring knowledge retention, a case study of a construction consultancy in the UAE.

The purpose of this paper is to develop a model that can be used to assess the knowledge retention capabilities of an organization, and suggest opportunities for improvement. A model to fulfill this aim is developed and validated on a construction engineering consultancy. A knowledge retention model was developed drawing on a thorough review of the literature. The developed retention model was validated through a

case of a construction engineering consultancy. Semi-structured interviews were used to elicit relevant information during the case study.

A four-stage knowledge retention process has been presented. These four steps are socialization, codification, knowledge construction, and knowledge retrieval. The paper also describes four levels of maturity for the knowledge retention model. The first level demonstrates the extent of knowledge sharing in the organization, the second level measures the extent of knowledge shared being documented, the third level measures the effectiveness of storage of documented knowledge, and the last level was a measure of the ease of accessibility and retrieval of the knowledge.

5.2.18 King and Marks (2008) Motivating knowledge sharing through a knowledge management system.

This study focuses on the effects of some important organizational activities that are believed to have an important impact on knowledge sharing with a knowledge management system. The two primary factors considered were supervisory control and perceived organizational support. The organization in which data were collected is a large US federal agency with the responsibility of procuring and maintaining communications systems in an element of the US Department of Defense. The survey instrument was validated through a pretest using nine doctoral students and pilot test with a sample of 30 organizational participants who were not included in the sample frame for the subsequent data collection. The system administrator randomly sent out 600 requests for participation through the organization's e-mail server with a response rate of 26%.

The results of this study provide support for many results reported in the literature which suggests that when management provides encouragement of certain actions, this encouragement is positively related to outcomes. These results also provide some support for the organizational support literature by demonstrating that there is a positive relationship between how individuals believe that they are treated in their organization and their desire to engage in positive actions that are difficult for management to explicitly verify.

5.2.19 Pei (2008) Enhancing knowledge creation in organizations.

The objectives of this study are to understand the importance of knowledge creation in organizations and to explore the ways to enhance knowledge creation in organizations.

The study concluded that knowledge management is important to organizations as it gives the main emphasis to the people (organizational members), the owners of knowledge. It is the organizational members who possess the capabilities to create knowledge for new

product development, new managerial practices, or new knowledge about customers. This paper identifies and explores three ways to enhance knowledge creation, namely via 1.) Using the right knowledge management strategy to support business strategy, 2.) Practicing the relevant leadership behaviors, and 3.) Cultivating organizational learning culture.

5.2.20 Snyman and Berg (2003) Managing tacit knowledge in the corporate environment: communities of practice.

The objectives of this case study in which a communities of practice was planned, implemented and evaluated were to find a way of successfully capturing and sharing organizational knowledge (especially tacit) and to create an awareness of the value of knowledge to employees.

The researcher applied the theories found in the literature and put to the test specifically in the corporate environment, a model for the implementation of a COP was created. The researcher used the semi-structured interviews as an instrument of data collection, the interviews were carried out with top management of the targeted company, uncertainty of the value that knowledge had for the organization was dispelled and the importance of managing it was highlighted. In view of the answers to the questions put to the respondents during the interviews, the reaction of them to these, it is concluded that the objectives were successfully reached. The COP contributed to the successful capturing and sharing of organizational knowledge and employees became more aware of the value of knowledge. The management team echoed the words of Bob Hiebeler (in Malhotra 2001): 'To me, this is the essence of knowledge sharing. It's all about contribution, it's all about the respect for others' opinions and views, it's all about a good facilitation and synthesis process, it's all about the distribution of lessons learned from this knowledge process, and it's all about access to packaged knowledge and key insights that become the starting points for individual learning.

5.3 Comments on previous studies

There are many studies conducted on Knowledge Management in Palestine such as (Al-Agha and Abu El-Khair, 2012), (Salem Deeb, 2012) and (Madi, 2010), many others are also conducted in the Arab countries such as (Al-Mdan and Moussa, 2010) and (Ahmad and Daghfous, 2010). Knowledge retention However, did not have a share in being discussed previously in any of the Arab countries, neither in English nor in Arabic.

International studies started handling the issue of knowledge retention as new subject in the new millennium, (Arif et al. 2008) which is a study conducted in a British university on UAE construction companies tried to develop a model for measuring knowledge retention.

At a later stage several studies handled the knowledge retention issue from different angles such as (Dewah, 2012) who discussed the effects of strategy on knowledge retention, and (Phaladi, 2011) who tried to find the linkage between knowledge transfer and knowledge retention. Other studies such as (Martins and Martins, 2009) went deeper in the subject trying to find the organizational factors that may elicit Knowledge retention in an organization. (Carmel, et al. 2010), discussed how to observe the expert in action in order to retain his knowledge for further reuse.

In the same year, the most important and comprehensive study on knowledge retention was conducted. (Martins, 2010) handled knowledge retention in one side and all the factors that may influence it in the organization, the result of this study was identifying 9 factors, and these factors are covered in this study except knowledge behaviors.

Reading through literature and previous studies, the researcher came to a conclusion the Knowledge retention is rather a form of practices within the organization, these practices if they are observed, they will form a high knowledge retention in the organization.

In this study, which is the first study to handle Knowledge retention in the Arab world, the researcher adapted 8 of the factors of (Martins, 2010) and based on the above, he considered knowledge behaviors as the practices that elicit knowledge retention, in a more precise phrase, the researcher called Knowledge behaviors as the knowledge retention dimensions.

This research shall aid to confirm the model set by (Martins, 2010) and contributes in setting a standard model for knowledge retention in future researches.

CHAPTER SIX

RESEARCH METHODOLOGY

6.1 Introduction

This chapter describes the adopted methodology to accomplish this study uses the following techniques: the information about the research design, research population, questionnaire design, statistical data analysis, content validity and pilot study.

6.2 Research Methodology Flowchart

The flowchart below describes all the stages followed in preparing the study.

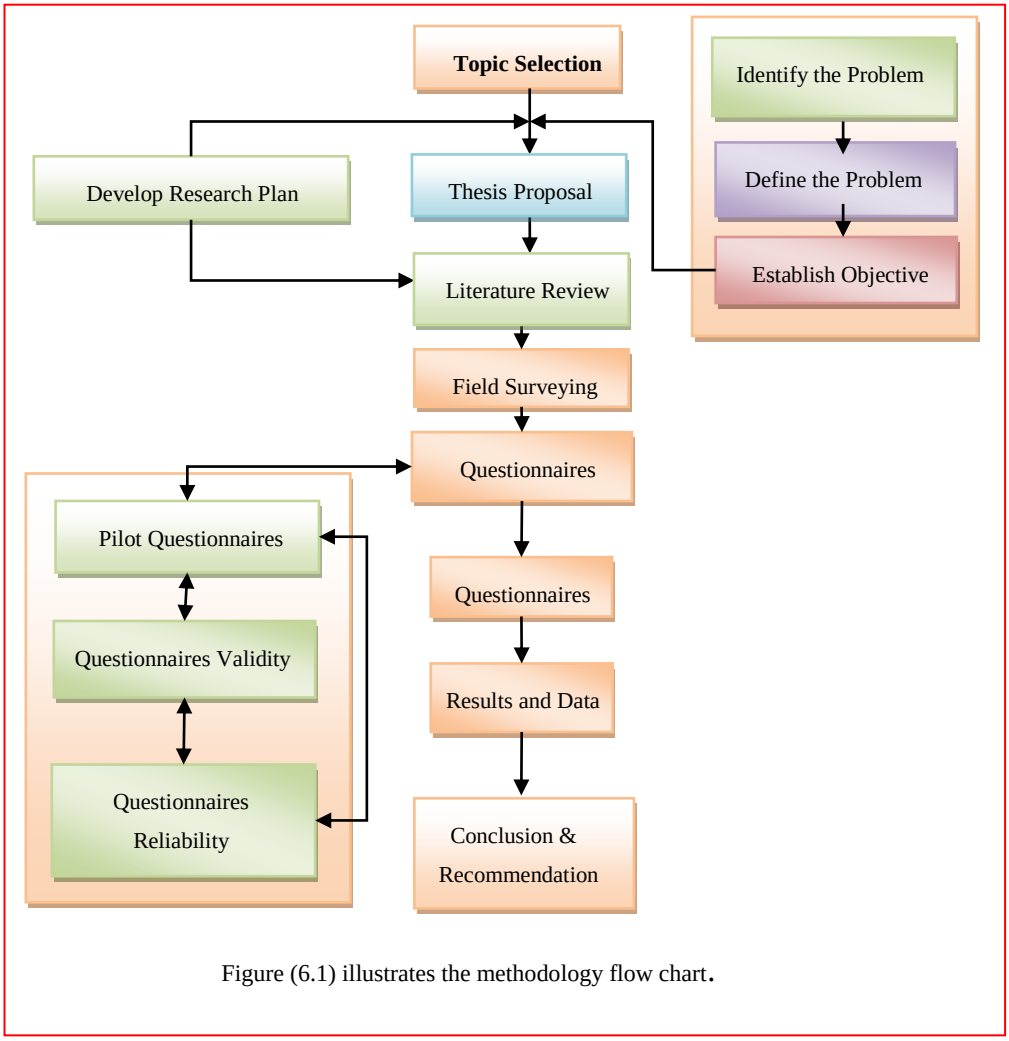

Figure (6.1) illustrates the methodology flow chart.

6.3 Research Design

This research was based on the descriptive analytical design, which focuses on the reality of organizational and behavioral factors towards knowledge retention. This study was conducted on a samples of 88 employees at the IUG. The objective of the study is to assess the reality of the factors influencing knowledge retention at the IUG system.

6.4 Study Population

The sample of this research is a ***comprehensive study population*** that includes all the eighty eight employees working full time for IUG and occupied one of the following positions at the time of distributing the questionnaire, IUG president, IUG president deputies, all faculty deans, and all faculty deans' deputies, all faculty heads of departments and all directors of IUG colleges.

6.5 Study Sample

The study included all the study population

Job in IUG	Actual Sample	Respondents	Response rate
President	1	1	100%
Deputy President	4	2	50%
Faculty Dean	13	8	61%
Deputy Faculty Dean	13	13	100%
Academic Head Of Department	45	33	73%
College Director	12	12	100%
Total	88	69	78%

Table (6.1): Study population and response rate, Source of Study Population: academic affairs 5/10/2014

6.6 Research Tool

The participant will have to fill a self-administered questionnaire.

6.7 Period of the Study

The study was carried out during the period from the beginning of February 2014 to December 2014. Data collection was carried out during the last three weeks of October 2014.

6.8 Ethical Matters and Procedures

Every participant has been provided with the explanation form attached to the questionnaire that describes the purpose of the study and the assurance of confidentiality of the information given.

6.9 Data Collection

6.9.1 The Primary Source (The Questionnaire):

A structured questionnaire including close ended questions was specially designed for this study (Appendix "1"), and has been handed to the participants to fill them on their own

The questionnaire consists of three sections:

I- The first section included 22 questions covered Knowledge Retention.

II- The second section included 20 questions designed to measure the level of organizational factors towards knowledge retention in IUG.

III- The third section included 20 questions designed to measure the level of behavioral factors towards knowledge retention in IUG.

The respondents were asked to indicate their agreement with any particular item on a 10-point scale ranging from strongly disagree (1) to strongly agree (10).

6.9.2 The Secondary Sources:

To introduce the theoretical literature of the subject, the researcher used books, periodicals, published papers, and articles related to the study title. In addition, internet, web sites and electronic links has also been a source of data.

6.10 Pilot Study

A pilot study of 30 questionnaire was conducted before collecting the results of the sample. It provides a trial run for the questionnaire, which involves testing the wordings of question, identifying ambiguous questions, testing the techniques that used to collect data, and measuring the effectiveness of standard invitation to respondents, as a result of the pilot study question number 5 of the questionnaire has been removed as it proved to be irrelevant.

6.11 Test of Normality

The One-Sample Kolmogorov-Smirnov Test procedure compares the observed cumulative distribution function for a variable with a specified theoretical distribution, which may be normal, uniform, Poisson, or exponential. The Kolmogorov-Smirnov Z is computed from the largest difference (in absolute value) between the observed and theoretical cumulative distribution functions. This goodness-of-fit test tests whether the observations could reasonably have come from the specified distribution. Many parametric tests require normally distributed variables. The one-sample Kolmogorov-Smirnov test can be used to test that a variable of interest is normally distributed, (Henry, C. and Thode, Jr., 2002).

Table (6.2) shows the results for Kolmogorov-Smirnov test of normality. From Table (6.2), the p-value for each variable is greater than 0.05 level of significance, then the distributions for these variables are normally distributed. Consequently, parametric tests will be used to perform the statistical data analysis.

Table 6.2: Kolmogorov-Smirnov test

Field	**Kolmogorov-Smirnov**	
	Statistic	**P-value**
The level of awareness to the knowledge retention at IUG	0.812	0.525
The level of attention given by the Islamic University to Knowledge Retention	1.239	0.093
Knowledge Retention Dimensions	0.893	0.402
Knowledge Retention	0.885	0.414
Performance Management	1.133	0.154
IUG Support	1.349	0.052
Strategy Implementation	0.950	0.327
Knowledge at risk of Loss	1.266	0.081
Organizational factors that towards knowledge Retention in IUG	0.854	0.431
Attitudes And Emotions	0.838	0.483
Power Play	0.893	0.402
Leadership	1.058	0.213
Knowledge Growth and Development	0.818	0.516
Behavioral factors towards knowledge Retention in IUG	0.914	0.373
All paragraphs of the questionnaire	0.899	0.394

6.12 Statistical analysis Tools

The researcher used data analysis both qualitative and quantitative data analysis methods. The Data analysis will be made utilizing (SPSS 22). The researcher would utilize the following

Statistical tools:

1) Kolmogorov-Smirnov test of normality.
2) Pearson correlation coefficient for Validity.
3) Cronbach's Alpha for Reliability Statistics.
4) Frequency and Descriptive analysis.
5) Parametric Tests (One-sample T test, Independent Samples T-test, Analysis of Variance).

T-test is used to determine if the mean of a statement is significantly different from a hypothesized value 6 (Approximately the middle value of numerical scale 1-10). If the P-value (Sig.) is smaller than or equal to the level of significance, $\alpha = 0.05$, then the mean of a statement is significantly different from a hypothesized value 6. The sign of the Test value indicates whether the mean is significantly greater or smaller than hypothesized value 6. On the other hand, if the P-value (Sig.) is greater than the level of significance, $\alpha = 0.05$, then the mean a statement is insignificantly different from a hypothesized value 6.

The *Independent Samples T-test* is used to examine if there is a statistical significant difference between two means among the respondents toward the organizational and behavioral factors due to (gender).

The *One- Way Analysis of Variance (ANOVA)* is used to examine if there is a statistical significant difference between several means among the respondents toward the organizational and behavioral factors due to (experience, age, experience and job in IUG).

6.13 Validity of Questionnaire

Validity refers to the degree to which an instrument measures what it is supposed to be measuring. Validity has a number of different aspects and assessment approaches. Statistical validity is used to evaluate instrument validity, which include internal validity and structure validity.

6.13.1 Statistical Validity of the Questionnaire

Validity refers to the degree to which an instrument measures what it is supposed to be measuring (Pilot and Hungler, 1985). Validity has a number of different aspects and assessment approaches.

To insure the validity of the questionnaire, two statistical tests should be applied. The first test is Criterion-related validity test (Pearson test) which measure the correlation coefficient between each paragraph in one field and the whole field. The second test is structure validity test (Pearson test) that used to test the validity of the questionnaire structure by testing the validity of each field and the validity of the whole questionnaire. It measures the correlation coefficient between one field and all the fields of the questionnaire that have the same level of similar scale.

6.13.2 Criterion Related Validity

Internal consistency of the questionnaire is measured by a scouting sample, which consisted of 30 questionnaires through measuring the correlation coefficients between each paragraph in one field and the whole field.

6.13.3 Internal Validity

Internal validity of the questionnaire is the first statistical test that used to test the validity of the questionnaire. It is measured by a scouting sample, which consisted of 30 questionnaires through measuring the correlation coefficients between each paragraph in one field and the whole field.

6.13.3.1 Internal Validity for Knowledge Retention

Table (6.3) clarifies the correlation coefficient for each paragraph of the "The level of awareness to the knowledge retention at IUG "and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.3: Correlation coefficient of each paragraph of "The level of awareness to the knowledge retention at IUG" and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	IUG faculties and departments can determine the type of knowledge to be retained	.656	0.000*
2.	Knowledge can be retained within the University by storing on IUG computers	.639	0.000*
3.	Departure of experts does not constitute any risk to the university's performance	.429	0.000*
4.	IUG identifies the knowledge that must be retained for the continuity of performance development of IUG staff	.661	0.000*

* Correlation is significant at the 0.05 level

Table (6.4) clarifies the correlation coefficient for each paragraph of the "The level of attention given by the Islamic University to Knowledge Retention" and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.4: Correlation coefficient of each paragraph of "The level of attention given by the Islamic University to Knowledge Retention" and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	IUG work constantly to create new knowledge through interaction with the students	.653	0.000*
2.	IUG management Sponsors the rights innovation and excellence to their employees, which encourages creative and talented to share their knowledge with the rest of the team members	.828	0.000*
3.	IUG management determine the type of knowledge needed to the employees to accomplish tasks	.878	0.000*
4.	IUG identifies the staff experiences and skills that should be retained	.911	0.000*
5.	IUG encourages the faculties and departments to retain knowledge	.892	0.000*

* Correlation is significant at the 0.05 level

Table (6.5) clarifies the correlation coefficient for each paragraph of the "Knowledge Retention Dimensions*"* and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.5: Correlation coefficient of each paragraph of "Knowledge Retention Dimensions" and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	In our department, problems are resolved in a constructive manner	.711	0.000*
2.	In our department, we can determine the type of knowledge needed to perform the work tasks	.752	0.000*
3.	In our department, we continuously learn to perform new different tasks	.802	0.000*
4.	In our department, we continuously develop new mechanisms of action through interaction with the students	.749	0.000*
5.	In our department, we create knowledge through discussion of each other	.735	0.000*
6.	In our department, we document all the knowledge productive activities such as meetings, lectures, training courses, seminars etc.	.556	0.000*
7.	In our department, there is effective communication between the older members and the younger members	.691	0.000*
8.	In our department, when a member of the team retires IUG grants him an extension for a specific period to train his successor	.705	0.000*
9.	In our department, we apply our experience to develop the mechanisms of action	.823	0.000*
10.	In our department, we use our experience to develop decision-making skills	.818	0.000*
11.	In our department, experienced members share their expertise to prepare the team to perform unexpected tasks	.865	0.000*
12.	In our department, there is effective communication between members with different knowledge and experiences	.868	0.000*

* Correlation is significant at the 0.05 level

6.13.3.2 Internal Validity for the Organizational Factors towards Knowledge Retention in IUG

Table (6.6) clarifies the correlation coefficient for each paragraph of the "Performance Management" and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.6: Correlation coefficient of each paragraph of "Performance Management" and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	IUG has a clear mission that adopts knowledge retention	.886	0.000*
2.	IUG has a strategic plan that adopts knowledge retention	.919	0.000*
3.	IUG has an action plan that adopts knowledge retention	.886	0.000*
4.	IUG complements outstanding performance employee contributions by bonuses and incentives	.576	0.000*
5.	IUG has a system of performance management that takes into account knowledge retention	.787	0.000*

* Correlation is significant at the 0.05 level

Table (6.7) clarifies the correlation coefficient for each paragraph of the "IUG Support " and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.7 : Correlation coefficient of each paragraph of " IUG Support " and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	IUG works towards creating a system of knowledge management within the faculties and departments	.841	0.000*
2.	IUG encourages employees to propose new ideas	.881	0.000*
3.	IUG encourages cooperation between different sections and departments	.850	0.000*
4.	IUG encourages interaction between people who have interest in raised problems	.853	0.000*
5.	IUG gives attention towards developing the technological infrastructure necessary for the dissemination of knowledge	.840	0.000*

* Correlation is significant at the 0.05 level

Table (6.8) clarifies the correlation coefficient for each paragraph of the " Strategy Implementation " and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.8 : Correlation coefficient of each paragraph of " Strategy Implementation " and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	IUG strategy includes encouraging volunteerism among individuals and groups that share common goals, such as the student union	.759	0.000*
2.	IUG strategy includes training and development programs effective in the capacity building and dissemination of knowledge	.901	0.000*
3.	IUG strategy includes experts assistance in certain topics for staff training	.888	0.000*
4.	IUG strategy includes adoption and encouragement of success stories	.866	0.000*
5.	IUG strategy includes measures to benefit from the experiences of retirees	.788	0.000*

* Correlation is significant at the 0.05 level

Table (6.9) clarifies the correlation coefficient for each paragraph of the "Knowledge at risk of Loss" and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.9: Correlation coefficient of each paragraph of "Knowledge at risk of Loss" and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	At the university level, the retention of experiences and knowledge of leadership staff is considered a matter of high importance	.898	0.000*
2.	At the university level, the retention of experiences and knowledge of the best performers is considered a matter of high importance	.951	0.000*
3.	At the university level, the retention of experiences and knowledge of near to retirement staff is considered a matter of high importance	.913	0.000*
4.	At the university level, the retention of experiences and knowledge of rare expertise staff is considered a matter of high importance	.876	0.000*
5.	IUG has an effective professional development process that helps to knowledge, capacity and competency building	.878	0.000*

* Correlation is significant at the 0.05 level

6.13.3.3 Internal Validity for Behavioral factors towards knowledge Retention in IUG

Table (6.10) clarifies the correlation coefficient for each paragraph of the "Attitudes and Emotions*"* and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.10: Correlation coefficient of each paragraph of "Attitudes and Emotions" and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	IUG pays attention to select employees who have personality that support knowledge retention	.855	0.000*
2.	IUG pays attention to select employees who have a personality that support knowledge sharing	.896	0.000*
3.	IUG pays attention to planting the values of trust, justice and cooperation in the hearts of the staff	.868	0.000*
4.	IUG pays attention to select the university employees amongst the ones who have good communication skills	.855	0.000*
5.	IUG adopts a well-established criteria based on knowledge when selecting new employees	.785	0.000*

* Correlation is significant at the 0.05 level

Table (6.11) clarifies the correlation coefficient for each paragraph of the "Power Play*"* and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.11: Correlation coefficient of each paragraph of "Power Play" and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	IUG supports work teams cohesion and the social interaction between them	.857	0.000*
2.	IUG forms special committees to resolve disputes between employees and not leave problems to magnify	.848	0.000*
3.	IUG Employ experts from outside the university, which helps to create new knowledge	.863	0.000*
4.	IUG encourages experts within the university to share their knowledge	.928	0.000*
5.	IUG promotes an atmosphere of trust between employees	.880	0.000*

* Correlation is significant at the 0.05 level

Table (6.12) clarifies the correlation coefficient for each paragraph of the "Leadership*"* and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.12: Correlation coefficient of each paragraph of "Leadership" and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	IUG leadership is characterized as a role model for knowledge	.917	0.000*
2.	IUG leadership provide the opportunities that create knowledge for learning	.906	0.000*
3.	IUG leadership encourages knowledge building behaviors	.919	0.000*
4.	IUG leadership is characterized as leaders of knowledge	.894	0.000*
5.	IUG leadership pays attention to the flow of knowledge in order to be exchanged amongst employees	.921	0.000*

* Correlation is significant at the 0.05 level

Table (6.13) clarifies the correlation coefficient for each paragraph of the "Knowledge Growth and Development*"* and the total of the field. The p-values (Sig.) are less than 0.05, so the correlation coefficients of this field are significant at $\alpha = 0.05$, so it can be said that the paragraphs of this field are consistent and valid to be measure what it was set for.

Table 6.13: Correlation coefficient of each paragraph of "Knowledge Growth and Development" and the total of this field

No.	Paragraph	Pearson Correlation Coefficient	P-Value (Sig.)
1.	Working with my colleagues and not alone improve my ability to retain knowledge	.652	0.000*
2.	I participate actively in the educational programs opportunities to develop myself constantly	.653	0.000*
3.	I feel satisfied to share my experiences when working with others	.791	0.000*
4.	Failure to retain accumulated knowledge within the university forms an obstacle against progressing in my career	.303	0.006*
5.	I feel satisfied in performing my job without getting any incentives	.444	0.000*

* Correlation is significant at the 0.05 level

6.13.4 Structure Validity of the Questionnaire

Structure validity is the second statistical test that used to test the validity of the questionnaire structure by testing the validity of each field and the validity of the whole questionnaire. It measures the correlation coefficient between one field and all the fields of the questionnaire that have the same level of liker scale.

Table (6.14) clarifies the correlation coefficient for each field and the whole questionnaire. The p-values (Sig.) are less than 0.05, so the correlation coefficients of all the fields are significant at $\alpha = 0.05$, so it can be said that the fields are valid to be measured what it was set for to achieve the main aim of the study.

Table 6.14: Correlation coefficient of each field and the whole of questionnaire

No.	Field	Pearson Correlation Coefficient	P-Value (Sig.)
1.	The level of awareness to the knowledge retention at IUG	.801	0.000*
2.	The level of attention given by the Islamic University to Knowledge Retention	.905	0.000*
3.	Knowledge Retention Dimensions	.969	0.000*
	Knowledge Retention	**.955**	**0.000***
1.	Performance Management	.753	0.000*
2.	IUG Support	.836	0.000*
3.	Strategy Implementation	.866	0.000*
4.	Knowledge at risk of Loss	.868	0.000*
	Organizational factors towards knowledge Retention in IUG	**.931**	**0.000***
1.	Attitudes And Emotions	.852	0.000*
2.	Power Play	.859	0.000*
3.	Leadership	.898	0.000*
4.	Knowledge Growth and Development	.686	0.000*
	Behavioral factors towards knowledge Retention in IUG	**.988**	**0.000***

* Correlation is significant at the 0.05 level

6.14 Reliability of the Research

The reliability of an instrument is the degree of consistency which measures the attribute; it is supposed to be measuring. The less variation an instrument produces in repeated measurements of an attribute, the higher its reliability. Reliability can be equated with the stability, consistency, or dependability of a measuring tool. The test is repeated to the same

sample of people on two occasions and then compares the scores obtained by computing a reliability coefficient. To insure the reliability of the questionnaire, Cronbach's Coefficient Alpha should be applied.

6.14.1 Cronbach's Coefficient Alpha

This method is used to measure the reliability of the questionnaire between each field and the mean of the whole fields of the questionnaire. The normal range of Cronbach's coefficient alpha value between 0.0 and + 1.0, and the higher values reflects a higher degree of internal consistency. The Cronbach's coefficient alpha was calculated for each field of the questionnaire.

Table (6.15) shows the values of Cronbach's Alpha for each field of the questionnaire and the entire questionnaire. For the fields, values of Cronbach's Alpha were in the range from 0.580 and 0.969. This range is considered high; the result ensures the reliability of each field of the questionnaire. Cronbach's Alpha equals 0.978 for the entire questionnaire which indicates an excellent reliability of the entire questionnaire.

Table 6.15: Cronbach's Alpha for each field of the questionnaire

No.	Field	Cronbach's Alpha
1.	The level of awareness to the knowledge retention at IUG	0.580
2.	The level of attention given by the Islamic University to Knowledge Retention	0.889
3.	Knowledge Retention Dimensions	0.930
	Knowledge Retention	**0.943**
1.	Performance Management	0.876
2.	IUG Support	0.904
3.	Strategy Implementation	0.885
4.	Knowledge at risk of Loss	0.943
	Organizational factors towards knowledge Retention in IUG	**0.921**
1.	Attitudes And Emotions	0.906
2.	Power Play	0.924
3.	Leadership	0.948
4.	Knowledge Growth and Development	0.661
	Behavioral factors towards knowledge Retention in IUG	**0.969**
	All paragraphs of the questionnaire	**0.978**

The results thereby proved that the researcher questionnaire was valid, reliable, and ready for distribution for the population sample.

CHAPTER SEVEN

ANALYSIS, FINDINGS AND DISCUSSION

7.1 Personal information

7.1.1 Experience

Table No.(7.1) shows that 4.3% of the sample have a duration of experience 'less than 5 years', 23.2% of the sample have a duration of experience '5 – Less than 10 years', 29.0% have a duration of experience '10- less than 15 years' and 43.5% have a duration of experience15 years and more.

The researcher attributes the high proportion (43.5%) of the respondents who have more than fifteen years of experience to the fact that the sample contains mostly deans and department heads who need long time to reach top positions, This is also confirmed by the fact that top ranking employees contain very small proportion (4.3%) who have less than five years' of experience. This result is supported by the study of Madi I (2010) who found that there is significant differences between knowledge and experience, while not supported by the study of Al-Agha and Abu El-Khair (2012) who found no statistically significant differences towards knowledge management application attributed to years of experience.

Table (7.1): Experience

Experience	Frequency	Percent
Less than 5 years	3	4.3
5 – Less than 10 years	16	23.2
10- less than 15 years	20	29.0
15 years and more	30	43.5
Total	69	100.0

7.1.2 Age

Table No.(7.2) shows that 4.3% of the sample are aged Less than 30 years, 26.1%of them are ranging in age from 30 years and less than 40 years, 34.8% of them are ranging in age from40 years and less than 50 years and 34.8% are aged 50 years and older.

The researcher found that the number of respondents in the category with an age less than 30 years to be (4.3%), which is found consistent with the result in 7.1.2 where respondents with

less than 5 years of experience form only (4.3%), The reason behind this can be explained by the fact that IUG top ranking positions require a minimum of a master degree which difficult to obtain before the age of 30, However, table 7.5 shows around 50% of the respondents to be academic heads of department and this justifies the fact that more than 50% of the respondents are older than 40 years, the reason is that a head of dept. position requires a PhD which is difficult to obtain earlier than the age of 40.

Table (7.2): Age

Age	Frequency	Percent
Less than 30 years	3	4.3
From 30 years and less than 40 years	18	26.1
From 40 years and less than 50 years	24	34.8
50 years and older	24	34.8
Total	69	100.0

7.1.3 Gender

Table No. (7.3) shows that 97.1% of the sample are males and 2.9% of them are females. The researcher attributes the high proportion in the male gender (97.1) to the fact that the 65.2% of the respondents are holder of PHD (Table: 7.4) and obtaining a PHD would require attending a university abroad and this might be difficult for a female with a family.

Table (7.3): Gender

Gender	Frequency	Percent
Male	67	97.1
Female	2	2.9
Total	69	100.0

7.1.4 Educational Level

Table No. (7.4) shows that 11.6% of the sample hold Bachelor, 21.7% of them hold Master and 65.2% of them hold PHD.

The sample of the study which is the top ranking employees in IUG targeted job positions varying from college directors to university president. Each job position have a requirement, however, the lowest qualifications required was for the college director who form 17.4% and among them 4 directors have obtained at lease a master degree, which gives us an indication

that 30% of the college directors went into career development and wish to transfer to academic career.

21.7% of the respondents carry Master degree and this form 6% from the college directors who obtained Master degree, and 15.7% are heads of departments. IUG has a policy of offering a job for best graduate students of the master program, and this justify presence of master degree among the academic staff. On the other hand IUG encourages Academic staff to obtain a PhD, and this justifies the fact that more than (65.2%) of respondents are holding a doctoral degree. This result confirms the researcher findings in previous results (expedience and age) which proves that senior academic positions require a doctoral degree and a long time of experience and the holder would be at the age of more than forty years.

Table (7.4): Educational Level

Educational Level	Frequency	Percent
Diploma	-	-
Bachelor	8	11.6
Master	15	21.7
PHD	45	65.2
Other	1	1.4
Total	69	100.0

7.1.5 Job position in IUG

Table No.(7.5) shows that 1.4% of the sample works at the IUG as 'President' , 2.9% of the sample works as 'Deputy President' ,11.6% of them works as 'Faculty Dean', 18.8% of them works as 'Deputy Faculty Dean',47.8% of them works as 'Academic Head Of Department' and 17.4% of them works as 'College Director' .

The researcher attributes the result to the fact that the study sample consist of six job positions varying from college directors to the president.

IUG has 12 faculties and every faculty has one dean, one deputy dean and one director and several head of departments. The result came to conform with reality as the largest sector in the respondents was in the field Academic Heads Of Department which is 47%.

Table (7.5): Job position in IUG

Job in IUG	Frequency	Percent
President	1	1.4
Deputy President	2	2.9
Faculty Dean	8	11.6
Deputy Faculty Dean	13	18.8
Academic Heads Of Department	33	47.8
College Director	12	17.4
Total	69	100.0

7.2 The level of Awareness to knowledge retention at IUG

H1: There is low level of awareness to the issue of knowledge retention at the IUG, (at α = 0.05 level).

This hypothesis was added by the researcher to test the level of awareness given to knowledge retention in IUG and further confirm or deny what will emerge from the researcher results as the degree of knowledge retention in IUG and the level of organizational and behavioral factors towards knowledge retention.

Table (7.6) shows the following results:

- The mean of paragraph #2 "Knowledge can be retained within the University by storing on IUG computers" equals 7.68 (76.81%), Test-value = 7.97, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #3 "Departure of experts does not constitute any risk to the university's performance" equals 5.65 (56.47%), Test-value = -1.17, and P-value = 0.123 which is greater than the level of significance $\alpha = 0.05$. Then the mean of this paragraph is insignificantly different from the hypothesized value 6. We conclude that the respondents (Do not know, neutral) to this paragraph.

- The mean of the field "The level of awareness to the knowledge retention at IUG" equals 6.94 (69.40%), Test-value = 5.85, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "The level of awareness to the knowledge retention at IUG ".

Table (7.6): Means and Test values for "The level of awareness to the knowledge retention at IUG"

	Item	Mean	Proportional mean (%)	Test value	P-value (Sig.)	Rank
1.	IUG faculties and departments can determine the type of knowledge to be retained	7.13	71.30	4.61	0.000*	3
2.	Knowledge can be retained within the University by storing on IUG computers	7.68	76.81	7.97	0.000*	1
3.	Departure of experts does not constitute any risk to the university's performance	5.65	56.47	-1.17	0.123	4
4.	IUG identifies the knowledge that must be retained for the continuity of performance development of IUG staff	7.25	72.46	6.91	0.000*	2
	All paragraphs of the field	6.94	69.40	5.85	0.000*	

* The mean is significantly different from 6

The researcher has found that IUG faculties and departments determine the type of knowledge to be retained, store the knowledge in appropriate manner and also that IUG identifies the knowledge that must be retained for the continuity of performance development of IUG staff, while the departure of experts not to constitute any risk to the university's performance has not been agreed upon.

This field lead to the understanding that IUG has a moderate level of awareness to the issue of knowledge retention. This result is found to be consistent with subsequent Results as the mean of attention given to knowledge retention in the next field is (7.11), the mean of knowledge retention dimensions is (7.38), the mean of the organizational factors is (7.33) and the mean of the behavioral factors is (7.44), This result is also supported by the study of Levy

(2011) which concluded that organizations found it easy to understand the need for knowledge retention once they were aware of the concept.

Based on the result of the field above which rejects H1 the researcher found that there is a moderate level of awareness to the issue of knowledge retention at the IUG".

7.3 The level of Attention to knowledge retention at IUG

H2: There is low level of attention given to the issue of knowledge retention at the IUG, (at α = 0.05 level).

This hypothesis was added by the researcher to test the level of attention given to knowledge retention in IUG and further confirm or deny what will emerge from the researcher results as the degree of knowledge retention in IUG and the level of organizational and behavioral factors towards knowledge retention.

Table (7.7) shows the following results:

- The mean of paragraph #1 "IUG work constantly to create new knowledge through interaction with the students" equals 7.33 (73.33%), Test-value = 7.79 and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #4 "IUG identifies the staff experiences and skills that should be retained" equals 6.93 (69.28%), Test-value = 4.26, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of the field "The level of attention given by the Islamic University to Knowledge Retention" equals 7.11 (71.14%), Test-value = 6.69, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "The level of attention given by the Islamic University to Knowledge Retention ".

Table (7.7): Means and Test values for "The level of attention given by the Islamic University to Knowledge Retention"

	Item	Mean	Proportional mean (%)	Test value	P-value (Sig.)	Rank
1.	IUG work constantly to create new knowledge through interaction with the students	7.33	73.33	7.79	0.000*	1
2.	IUG management Sponsors the rights of innovation and excellence to their employees, which encourages creative and talented to share their knowledge with the rest of the team members	6.99	69.85	5.03	0.000*	4
3.	IUG management determine the type of knowledge needed to the employees to accomplish tasks	7.03	70.29	5.17	0.000*	3
4.	IUG identifies the staff experiences and skills that should be retained	6.93	69.28	4.26	0.000*	5
5.	IUG encourages the faculties and departments to retain knowledge	7.33	73.33	6.47	0.000*	1
	All paragraphs of the field	7.11	71.14	6.69	0.000*	

* The mean is significantly different from 6

The researcher has found that IUG constantly create new knowledge through interaction with the students, IUG management Sponsors the rights of innovation and excellence to their employees, which encourages creative and talented to share their knowledge with the rest of the team members, IUG management determine the type of knowledge needed to the employees to accomplish tasks, IUG identifies the staff experiences and skills that should be retained, IUG encourages the faculties and departments to retain knowledge. This leads to the fact that IUG has a high level of attention given to the issue of knowledge retention. This result is found to be consistent with subsequent Results as the mean of attention in this field is (7.11), the mean of knowledge retention dimensions is (7.11), the mean of the organizational factors is (7.33) and the mean of the behavioral factors is (7.44). This result is also supported by the study of Martins (2010) which concluded that creation of new knowledge manifests in behaviors such as attracting attention, eliciting discussion and building widespread consensus through dialogue and experience.

The result of the field above leads to reject the hypothesis *"There is low level of attention to the issue of knowledge retention at the IUG"* and therefore the researcher can claim ***that "there is a high level of attention to the issue of knowledge retention at the IUG"***.

7.4 Knowledge Retention Dimensions

Questions in this field are designed to test the degree of knowledge retention within the system of IUG. This is done by measuring the six dimensions of knowledge retention by asking two questions for each dimension.

Table (7.8) shows the following results:

- The mean of paragraph #6 "In our department, we document all the knowledge productive activities such as meetings, lectures, training courses, seminars etc." equals 8.09 (80.87%), Test-value = 11.85, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 3. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #8 "In our department, when a member of the team retires IUG grants him an extension for a specific period to train his successor" equals 6.14 (61.45%), Test-value = 0.56, and P-value = 0.288 which is greater than the level of significance $\alpha = 0.05$. Then the mean of this paragraph is insignificantly different from the hypothesized value 6. We conclude that the respondents (Do not know, neutral) to this paragraph.

- The mean of the field "Knowledge Retention Dimensions" equals 7.38 (73.79%), Test-value = 9.79, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "Knowledge Retention Dimensions".

Table (7.8): Means and Test values for "Knowledge Retention Dimensions"

	Item	Mean	Proportional mean (%)	Test value	P-value (Sig.)	Rank
1.	In our department, problems are resolved in a constructive manner	7.74	77.39	9.62	0.000*	2
2.	In our department, we can determine the type of knowledge needed to perform the work tasks	7.55	75.51	8.94	0.000*	4
3.	In our department, we continuously learn to perform new different tasks	7.26	72.61	6.68	0.000*	10
4.	In our department, we continuously develop new mechanisms of action through interaction with the students	7.32	73.19	8.08	0.000*	8
5.	In our department, we create knowledge through discussion with each other	7.42	74.20	7.92	0.000*	6
6.	In our department, we document all the knowledge productive activities such as meetings, lectures, training courses, seminars etc.	8.09	80.87	11.85	0.000*	1
7.	In our department, there is effective communication between the older members and the younger members	7.26	72.61	7.16	0.000*	10
8.	In our department, when a member of the team retires IUG grants him an extension for a specific period to train his successor	6.14	61.45	0.56	0.288	12
9.	In our department, we apply our experience to develop the mechanisms of action	7.64	76.38	9.04	0.000*	3
10.	In our department, we use our experience to develop decision-making skills	7.49	74.93	8.54	0.000*	5
11.	In our department, experienced members share their expertise to prepare the team to perform unexpected tasks	7.29	72.90	6.66	0.000*	9
12.	In our department, there is effective communication between members with different knowledge and experiences	7.35	73.48	7.05	0.000*	7
	All paragraphs of the field	7.38	73.79	9.79	0.000*	

* The mean is significantly different from 6

This field show that IUG department determine the type of knowledge needed to perform the work tasks, resolve problems in a constructive manner, continuously learn to perform new tasks, continuously develop new mechanisms of action through interaction with the students, create knowledge through discussion with each other, document all knowledge productive activities such as meetings, lectures, training courses, seminars etc., communicate between older members and younger members, apply experience to develop the mechanisms of action, use experience to develop decision-making skills, experienced members share their expertise to prepare the team to perform unexpected tasks and use effective communication between members with different knowledge and experiences. However respondents did not agree that when a member of the team retires IUG grants him an extension for a specific period to train his successor.

In general, it can be said that IUG system is embedded with a high level of knowledge retention through selecting the knowing personnel for new positions, create an environment of a learning organization, and encourage employees to create, share, transfer and apply knowledge within IUG departments. The results of this field is supported by the study of Phaladi (2011) which concluded that a retiring expert's program aimed specifically at encouraging knowledge sharing prior to subject matter experts' retirement should be part of the immediate plans of knowledge transfer and retention efforts in the organization. It is also supported by the study of Martins (2010) which has found that the level of knowledge retention is affected by knowing, learning, creating, sharing, transferring and applying knowledge. The results are also supported the study of Hoof (2010) which concludes that a loss of corporate knowledge can occur within U.S. government procurement program offices when government personnel are replaced with contractors who do not transfer their knowledge.

The researcher "based on the result of this field" claims ***that Knowledge Retention as a process is implemented at a high level in the IUG***.

7.5 Organizational factors towards knowledge Retention in IUG

7.5.1 Performance Management

Questions in this field are designed to test the degree of using performance management system within the departments of IUG.

Table (7.9) shows the following results:

- The mean of paragraph #1 "IUG has a clear mission that adopts knowledge retention" equals 7.80 (77.97%), Test-value = 7.56, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #4 "IUG complements outstanding performance employee contributions by bonuses and incentives" equals 7.06 (70.58%), Test-value = 5.23, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of the field "Performance Management" equals 7.38 (73.80%), Test-value = 7.41, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "Performance Management ".

	Item	Mean	Proportional Mean (%)	Test value	P-value (Sig.)	Rank
1.	IUG has a clear mission that adopts knowledge retention	7.80	77.97	7.56	0.000*	1
2.	IUG has a strategic plan that adopts knowledge retention	7.52	75.22	6.24	0.000*	2
3.	IUG has an action plan that adopts knowledge retention	7.43	74.35	6.11	0.000*	3
4.	IUG complements outstanding performance employee contributions by bonuses and incentives	7.06	70.58	5.23	0.000*	5
5.	IUG has a system of performance management that takes into account knowledge retention	7.09	70.87	5.00	0.000*	4
	All paragraphs of the field	7.38	73.80	7.41	0.000*	

Table (7.9):Means and Test values for "Performance Management", * The mean is significantly different from 6

This field show that IUG has a clear mission that adopts knowledge retention; it has strategic and action plans that adopts knowledge retention. It also shows that IUG has a system of performance management that takes into account knowledge retention and complements outstanding performance employee contributions by bonuses and incentives.

In general, it can be said that IUG uses a performance management system that supports knowledge retention, and the high level of agreement to this result is supported by the study of Martins (2010) which found that performance management is one of the organizational factors that influence knowledge retention in organizations. It is also found to agree with the findings of Snyman and Berg (2003) who found that a total of 72.5% of their study sample were in favor of some form of recognition or reward as an incentive to encourage tacit knowledge management. Al-Faris (2010) also concluded that there is a correlation between knowledge management and performance.

7.5.2 IUG Support

Questions in this field are designed to test the degree of support given to knowledge retention by IUG.

Table (7.10) shows the following results:

- The mean of paragraph #5 "IUG gives attention towards developing the technological infrastructure necessary for the dissemination of knowledge" equals 8.17 (81.74%), Test-value = 14.33, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #1 "IUG works towards creating a system of knowledge management within the faculties and departments" equals 7.39 (73.91%), Test-value = 8.1, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of the field "IUG Support" equals 7.66 (76.58%), Test-value = 11.15, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "IUG Support ".

	Item	Mean	Proportional Mean (%)	Test value	P-value (Sig.)	Rank
1.	IUG works towards creating a system of knowledge management within the faculties and departments	7.39	73.91	8.10	0.000*	5
2.	IUG encourages employees to propose new ideas	7.43	74.35	6.93	0.000*	4
3.	IUG encourages cooperation between different sections and departments	7.78	77.83	10.18	0.000*	2
4.	IUG encourages interaction between people who have interest in raised problems	7.51	75.07	9.15	0.000*	3
5.	IUG gives attention towards developing the technological infrastructure necessary for the dissemination of knowledge	8.17	81.74	14.33	0.000*	1
	All paragraphs of the field	7.66	76.58	11.15	0.000*	

Table (7.10): Means and Test values for "IUG Support" * The mean is significantly different from 6

This field show that IUG works towards creating a system of knowledge management within the faculties and departments, encourages employees to propose new ideas, encourages cooperation between different sections and departments, and encourages interaction between people who have interest in raised problems and gives attention towards developing the technological infrastructure necessary for the dissemination of knowledge.

In general, it can be said that IUG as an organization supports knowledge retention and encourages departments to retain knowledge. The high level of agreement to this result is supported by the study of Martins (2010) which found that organizational support is one of the organizational factors that influence knowledge retention in organizations. It is also found to agree with the findings of Snyman and Berg (2003) who found that a total of 72.5% of their study sample were in favor of some form of recognition or reward as an incentive to encourage tacit knowledge management. Salem Deeb (2012) has also concluded in his study that structural capital strongly affects knowledge management, Dewah (2012) found out that the respective organizational cultures impede the organizational knowledge retention.

7.5.3 Strategy Implementation

Questions in this field are designed to test the degree of embedded knowledge retention support by the strategy implemented in IUG.

Table (7.11) shows the following results:

- The mean of paragraph #1 "IUG strategy includes encouraging volunteerism among individuals and groups that share common goals, such as the student union" equals 7.33 (73.33%), Test-value = 7.52, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #5 "IUG strategy includes measures to benefit from the experiences of retirees" equals 6.13 (61.30%), Test-value = 0.47, and P-value = 0.321 which is greater than the level of significance $\alpha = 0.05$. Then the mean of this paragraph is insignificantly different from the hypothesized value 6. We conclude that the respondents (Do not know, neutral) to this paragraph.

- The mean of the field "Strategy Implementation" equals 7.02 (70.20%), Test-value = 5.64, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "Strategy Implementation ".

This field show that IUG strategy includes encouraging volunteerism among individuals and groups that share common goals, training and development programs effective in the capacity building and dissemination of knowledge, experts assistance in certain topics for staff training, adoption and encouragement of success stories and also includes measures to benefit from the experiences of retirees.

In general, it can be said that IUG implements a strategy that supports knowledge retention in the form of and encourages departments to retain knowledge. The result of a high level of agreement to this factor is supported by the study of Martins (2010) which found that strategy implementation is one of the organizational factors that influence knowledge retention in organizations. Al-Adaileh R. and Al-Atawi M., 2011 found that reward system is an important cultural attribute that should be considered for successful knowledge management initiative, which the researcher links it to the success stories encouragement listed in this study under strategy implementation.

Table (7.11): Means and Test values for "Strategy Implementation"

	Item	Mean	Proportional mean (%)	Test value	P-value (Sig.)	Rank
1.	IUG strategy includes encouraging volunteerism among individuals and groups that share common goals, such as the student union	7.33	73.33	7.52	0.000*	1
2.	IUG strategy includes training and development programs effective in the capacity building and dissemination of knowledge	7.32	73.19	6.83	0.000*	2
3.	IUG strategy includes experts assistance in certain topics for staff training	7.13	71.30	5.48	0.000*	4
4.	IUG strategy includes adoption and encouragement of success stories	7.19	71.88	5.38	0.000*	3
5.	IUG strategy includes measures to benefit from the experiences of retirees	6.13	61.30	0.47	0.321	5
	All paragraphs of the field	7.02	70.20	5.64	0.000*	

* The mean is significantly different from 6

7.5.4 Knowledge at risk of Loss

Questions in this field are designed to test the degree of identification of the embedded knowledge at risk in IUG.

Table (7.12) shows the following results:

- The mean of paragraph #2 "At the university level, the retention of experiences and knowledge of the best performers is considered a matter of high importance" equals 7.49 (74.93%), Test-value = 5.97, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #3 "At the university level, the retention of experiences and knowledge of near to retirement staff is considered a matter of high importance" equals 6.93 (69.28%), Test-value = 3.78, and P-value = 0.000 which is smaller than the level of

significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of the field "Knowledge at risk of Loss" equals 7.26 (72.64%), Test-value = 5.78, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "Knowledge at risk of Loss ".

Table (7.12): Means and Test values for "Knowledge at risk of Loss"

	Item	Mean	Proportional mean (%)	Test value	P-value (Sig.)	Rank
1.	At the university level, the retention of experiences and knowledge of leadership staff is considered a matter of high importance	7.36	73.62	5.17	0.000*	3
2.	At the university level, the retention of experiences and knowledge of the best performers is considered a matter of high importance	7.49	74.93	5.97	0.000*	1
3.	At the university level, the retention of experiences and knowledge of near to retirement staff is considered a matter of high importance	6.93	69.28	3.78	0.000*	5
4.	At the university level, the retention of experiences and knowledge of rare expertise staff is considered a matter of high importance	7.45	74.49	6.14	0.000*	2
5.	IUG has an effective professional development process that helps in capacity and competency building of knowledge	7.09	70.87	5.07	0.000*	4
	All paragraphs of the field	7.26	72.64	5.78	0.000*	

* The mean is significantly different from 6

This field shows that the retention of experiences and knowledge of leadership staff, best performers, near to retirement staff and rare expertise staff is considered a matter of

high importance, it also shows IUG has an effective professional development process that helps in capacity and competency building of knowledge.

In general, it can be said that IUG highly recognizes the knowledge at risk of loss. The result of a high level of agreement to this factor is supported by the study of Martins (2010) which found that knowledge at risk of loss is one of the organizational factors that influence knowledge retention in organizations.

7.5.6 Comments on the Organizational factors towards knowledge Retention in IUG:

Table (7.13) shows the mean for all paragraphs of Organizational factors towards knowledge Retention in IUG Organizational factors towards knowledge Retention in IUG equals 7.33 (73.30%), Test-value =8.48, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of all paragraphs is significantly greater than the hypothesized value 6. We conclude that the respondents agree to all paragraphs.

Based on the above results, the researcher claims that the organizational factors towards knowledge retention which is found to have a mean of (7.33) are present in the system of IUG at a high level. This result is backed up by the result of the awareness to Knowledge retention, which is found to have a mean of (6.94), and also backed with the result of the "attention given to knowledge retention", which is found to have a mean of (7.11), It is also comes to agree with the level of knowledge retention which is measured by testing the level of the dimensions of Knowledge Retention in IUG which came out to be (7.38). This result is supported by the study of Martins (2010) which concluded that, Performance Management, Organizational Support, Strategy Implementation and Knowledge at Risk are the organizational factors that affect knowledge retention. The results are also backed by the study of DOAN, et al. (2011), which named the factors, top management support and knowledge retention strategy amongst the most important factors potentially influencing the success of the knowledge retention process.

Table (7.13): Means and Test values for all paragraphs of Organizational factors towards knowledge Retention in IUG

	Mean	Proportional mean (%)	Test value	P-value (Sig.)
All paragraphs of Organizational factors towards knowledge Retention in IUG	7.33	73.30	8.48	0.000*

*The mean is significantly different from 6

7.6 Behavioral factors towards knowledge Retention in IUG

7.6.1 Attitudes and Emotions

Questions in this field are designed to inspect the attitudes and emotions of the top ranking employees towards knowledge retention within the departments of IUG.

Table (7.14) shows the following results:

- The mean of paragraph #5 "IUG adopts a well-established criteria based on knowledge when selecting new employees" equals 7.58 (75.80%), Test-value = 9.18, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #2 "IUG pays attention to select employees who have a personality that support knowledge sharing" equals 7.12 (71.16%), Test-value = 6.18, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6 . We conclude that the respondents agree to this paragraph.

- The mean of the field "Attitudes and Emotions" equals 7.40 (74.01%), Test-value = 9.13, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "Attitudes and Emotions ".

Table (7.14): Means and Test values for "Attitudes and Emotions"

	Item	Mean	Proportional mean (%)	Test value	P-value (Sig.)	Rank
1.	IUG pays attention to select employees who have personality that support knowledge retention	7.32	73.24	7.32	0.000*	4
2.	IUG pays attention to select employees who have a personality that support knowledge sharing	7.12	71.16	6.18	0.000*	5
3.	IUG pays attention to planting the values of trust, justice and cooperation in the hearts of the staff	7.51	75.07	7.67	0.000*	2
4.	IUG pays attention to select the university employees amongst the ones who have good communication skills	7.49	74.93	8.67	0.000*	3
5.	IUG adopts a well-established criteria based on knowledge when selecting new employees	7.58	75.80	9.18	0.000*	1
	All paragraphs of the field	7.40	74.01	9.13	0.000*	

* The mean is significantly different from 6

This field shows that IUG pays attention to select employees who have personality that support knowledge sharing and retention, plant the values of trust, justice and cooperation in the hearts of the staff, select the university employees amongst the ones who have good communication skills and also adopts a well-established criteria based on knowledge when selecting new employees.

In general, it can be said that the top ranking employees of IUG have an attitude and emotions that support knowledge retention, and this is supported by the study of Martins (2010) which found that attitudes and emotions form one of the behavioral factors that influence knowledge retention in organization. Al-Adaileh R. and Al-Atawi M., (2011) have also concluded that building trust is an important cultural attributes that should be considered for successful knowledge management initiative.

7.6.2 Power Play

Questions in this field are designed to test the degree of Power Play within the top ranking employees of IUG.

Table (7.15) shows the following results:

- The mean of paragraph #2 "IUG forms special committees to resolve disputes between employees and not leave problems to magnify" equals 7.65 (76.52%), Test-value = 8.74, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6 . We conclude that the respondents agree to this paragraph.

- The mean of paragraph #3 "IUG Employ experts from outside the university, which helps to create new knowledge" equals 6.99 (69.86%), Test-value = 4.88, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of the field "Power Play" equals 7.41 (74.12%), Test-value = 8.24, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "Power Play ".
    - This field shows that IUG supports work team cohesion and the social interaction between them, forms special committees to resolve disputes between employees and not leave problems to magnify, Employs experts from outside the university, encourages experts within the university to share their knowledge and promotes an atmosphere of trust between employees.

    - In general, it can be said that IUG top ranking staff employ enough power play to support knowledge retention in the departments of IUG. This result is supported by the study of Martins (2010) which found that Power play is one of the behavioral

factors that influence knowledge retention in organization. King and Marks (2008) also concluded in their study that when management provides encouragement of certain actions, this encouragement is positively related to outcomes, which can be imposed in the encouragement to knowledge retention behaviors.

Table (7.15): Means and Test values for "Power Play"

	Item	Mean	Proportional mean (%)	Test value	P-value (Sig.)	Rank
1.	IUG supports work team cohesion and the social interaction between them	7.61	76.09	8.59	0.000*	2
2.	IUG forms special committees to resolve disputes between employees and not leave problems to magnify	7.65	76.52	8.74	0.000*	1
3.	IUG Employ experts from outside the university, which helps to create new knowledge	6.99	69.86	4.88	0.000*	5
4.	IUG encourages experts within the university to share their knowledge	7.23	72.32	5.90	0.000*	4
5.	IUG promotes an atmosphere of trust between employees	7.58	75.80	8.28	0.000*	3
	All paragraphs of the field	7.41	74.12	8.24	0.000*	

* The mean is significantly different from 6

7.6.3 Leadership

Questions in this field are designed to test the degree of Leadership support to the Knowledge Retention within the departments of IUG.

Table (7.16) shows the following results:

- The mean of paragraph #1 "IUG leadership is characterized as a role model for knowledge" equals 7.87 (78.70%), Test-value = 10.33, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #5 “IUG leadership pays attention to the flow of knowledge in order to be exchanged amongst employees” equals 7.30 (73.04%), Test-value = 6.47, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of the field “Leadership” equals 7.57 (75.71%), Test-value = 8.91, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of “Leadership ".

This field shows that IUG leaders are characterized as a role model for knowledge, they provide the opportunities that create knowledge for learning and encourages knowledge building behaviors, and they are also characterized as leaders of knowledge who pay attention to the flow of knowledge in order to be exchanged amongst employees.

In general, it can be said that the leadership of IUG are aware of the issue of knowledge retention and are giving it attention and this is supported by the study of Martins (2010) which found that leadership is one of the behavioral factors that influence knowledge retention in organization. Pie (2008) also found that practicing the relevant leadership behaviors would enhance knowledge retention. The study of Nelson and McCann (2009) found that Recognition and embracement of knowledge management by top leaders, “as a source of strategic competitive advantage” is essential in the foundation for a learning culture and specific human resource practices. Al-Mdan S. and Moussa M. (2010) revealed in there study that leadership was the most impact among organizational culture factors on knowledge management implementation.

Table (7.16): Means and Test values for "Leadership"

	Item	Mean	Proportional mean (%)	Test value	P-value (Sig.)	Rank
1.	IUG leadership is characterized as a role model for knowledge	7.87	78.70	10.33	0.000*	1
2.	IUG leadership provide the opportunities that create knowledge for learning	7.70	76.96	8.41	0.000*	2
3.	IUG leadership encourages knowledge building behaviors	7.59	75.94	7.95	0.000*	3
4.	IUG leadership is characterized as leaders of knowledge	7.39	73.91	7.62	0.000*	4
5.	IUG leadership pays attention to the flow of knowledge in order to be exchanged amongst employees	7.30	73.04	6.47	0.000*	5
	All paragraphs of the field	7.57	75.71	8.91	0.000*	

* The mean is significantly different from 6

7.6.4 Knowledge Growth and Development

Questions in this field are designed to test the degree of Knowledge growth and development between top ranking employees within the departments of IUG.

Table (7.17) shows the following results:

- The mean of paragraph #1 "Working with my colleagues and not alone improve my ability to retain knowledge" equals 8.61 (86.09%), Test-value = 18.59, and P-value = 0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this paragraph is significantly greater than the hypothesized value 6. We conclude that the respondents agree to this paragraph.

- The mean of paragraph #4 "Failure to retain accumulated knowledge within the university forms an obstacle against progressing in my career" equals 5.46 (54.64%), Test-value = -1.82, and P-value = 0.037 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is negative, so the mean of this paragraph is significantly smaller than the hypothesized value 6. We conclude that the respondents disagree to this paragraph.

- The mean of the field "Knowledge Growth and Development" equals 7.39 (73.94%), Test-value = 13.85, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of this field is significantly greater than the hypothesized value 6. We conclude that the respondents agree to field of "Knowledge Growth and Development ".

Table (7.17): Means and Test values for "Knowledge Growth and Development"

	Item	Mean	Proportional mean (%)	Test value	P-value (Sig.)	Rank
1.	Working with my colleagues and not alone improve my ability to retain knowledge	8.61	86.09	18.59	0.000*	1
2.	I participate actively in the educational programs opportunities to develop myself constantly	7.94	79.42	13.32	0.000*	3
3.	I feel satisfied to share my experiences when working with others	8.22	82.17	16.40	0.000*	2
4.	Failure to retain accumulated knowledge within the university forms an obstacle against progressing in my career	5.46	54.64	-1.82	0.037*	5
5.	I feel satisfied in performing my job without getting any incentives	6.74	67.39	2.73	0.004*	4
	All paragraphs of the field	7.39	73.94	13.85	0.000*	

* The mean is significantly different from 6

This field shows that IUG employees prefer to work with their colleagues and not alone in order to improve the ability to retain knowledge, they participate actively in the educational programs opportunities to develop constantly, and they feel satisfied to either share their experiences when working with others or work without getting any incentives. However the majority of the respondents did not see that failure to retain accumulated knowledge within the university forms an obstacle against progressing in their career.

In general, it can be said that IUG top ranking staff enjoy a high grade of knowledge growth and development, which in turn comes consistent with all results of other factors. This result is supported by the study of Martins (2010) which found that knowledge growth and development is one of the behavioral factors that influence

knowledge retention in organization. The results Ezigbo (2013) would agree with elements of this factor without having the same name, he named in his study, reciprocal benefits, recognition, information and communication technology and joy in helping others as motivational factors that influence knowledge sharing. While in the other hand the researcher results do not agree with Ezigbo (2013) in his results about lack of incentives, as an obstacle for knowledge sharing. In general Ezigbo (2013) found a significant relationship between structural capital and human capital noting that he is conducting a study on the extent of sharing knowledge in public sector organizations.

7.6.5 Comments on the Behavioral factors towards knowledge Retention in IUG:

Table (7.18) shows the mean for all paragraphs of Behavioral factors towards knowledge Retention in IUG equals 7.44 (74.45%), Test-value =11.00, and P-value=0.000 which is smaller than the level of significance $\alpha = 0.05$. The sign of the test is positive, so the mean of all paragraphs is significantly greater than the hypothesized value 6. We conclude that the respondents agree to all paragraphs.

Based on the above results, the researcher claims that the behavioral factors towards knowledge retention which is found to have a mean of (7.44) are present in the system of IUG at a high level. This result is backed up by the result of the awareness to Knowledge retention, which is found to have a mean of (6.94), and also backed with the result of the "attention given to knowledge retention", which is found to have a mean of (7.11), It also comes to agree with the level of knowledge retention which is measured by testing the level of the dimensions of Knowledge Retention in IUG which came out to be (7.38). This result is supported by the study of Martins (2010) which concluded that, Attitudes and emotions, Power play, Leadership, Knowledge growth and development are the behavioral factors that affect knowledge retention in the organization. The results are also backed by the study of King and Marks (2008) which concluded that there is a positive relationship between how individuals believe that they are treated in their organization "attitudes and emotions" and their desire to engage in positive actions that are difficult for management to explicitly verify, noting that King and Marks (2008) in their research were inspecting motivating knowledge sharing through a knowledge management system. The results are also found to agree with the results of Pei (2008) which concluded that practicing the relevant leadership behaviors would be one of the factors that would enhance knowledge creation in the organization

Table (7.18): Means and Test values for all paragraphs of Behavioral factors towards knowledge Retention in IUG

	Mean	Proportional mean (%)	Test value	P-value (Sig.)
All paragraphs of Behavioral factors towards Knowledge Retention in IUG	7.44	74.45	11.00	0.000*

*The mean is significantly different from 6

7.7 The Third Hypnosis

H3: There is a significant relationship between the organizational factors and the level of knowledge retention at the IUG, (at α = 0.05 level).

Table (7.19) shows that the correlation coefficient between the organizational factors and the level of knowledge retention at the IUG equals .892 and the p-value (Sig.) equals 0.000. The p-value (Sig.) is less than 0.05, so the correlation coefficient is statistically significant at α = 0.05. We conclude there exists a significant relationship between the organizational factors and the level of knowledge retention at the IUG.

Table 7.19 Correlation coefficient between the organizational factors and the level of knowledge retention at the IUG

	Pearson Correlation Coefficient	P-Value (Sig.)
Performance Management	.810	0.000*
IUG Support	.772	0.000*
Strategy Implementation	.749	0.000*
Knowledge at risk of Loss	.726	0.000*
Organizational factors	**.892**	**0.000***

* Correlation is statistically significant at 0.05 level

The above results proves full agreement with the hypothesis the researcher set in this research and can strongly claim that ***There is a significant relationship between the organizational factors and the level of knowledge retention at the IUG, (at α = 0.05 level).***

7.8 The Fourth Hypnosis

H4: There is a significant relationship between the behavioral factors and the level of knowledge retention at the IUG, (at α = 0.05 level).

Table (7.20) shows that the correlation coefficient between the behavioral factors and the level of knowledge retention at the IUG equals .795 and the p-value (Sig.) equals 0.000. The p-value (Sig.) is less than 0.05, so the correlation coefficient is statistically significant at α = 0.05. We conclude there exists a significant relationship between the behavioral factors and the level of knowledge retention at the IUG.

Table 7.20 Correlation coefficient between the behavioral factors and the level of knowledge retention at the IUG

	Pearson Correlation Coefficient	**P-Value (Sig.)**
Attitudes And Emotions	.752	0.000*
Power Play	.685	0.000*
Leadership	.722	0.000*
Knowledge Growth and Development	.572	0.000*
Behavioral factors	**.795**	**0.000***

* Correlation is statistically significant at 0.05 level

The above results proves full agreement with the hypothesis the researcher set in this research and can strongly claim that ***There is a significant relationship between the behavioral factors and the level of knowledge retention at the IUG, (at α = 0.05 level).***

7.8 DIFFERENCES TOWARDS THE BEHAVIOURAL AND ORGANIZATIONAL FACTORS TOWARDS KNOWLEDGE RETENTION

H5.1: There are significant differences among respondents at ($\alpha \leq 0.05$) towards the organizational and behavioral factors due to experience.

Table (7.21):ANOVA test of the fields and their p-values for Experience

No.	Field	Means			Test Value	Sig.
		Less than 10 years	10- less than 15 years	15 years and more		
1.	The level of awareness to the knowledge retention at IUG	6.75	6.55	7.32	2.347	0.104
2.	The level of attention given by the Islamic University to Knowledge Retention	6.84	6.93	7.41	1.239	0.296
3.	Knowledge Retention Dimensions	7.29	6.93	7.73	3.053	0.054
	Knowledge Retention	7.08	6.86	7.58	2.689	0.075
1.	Performance Management	6.97	6.89	7.97	4.200	0.019*
.	IUG Support	7.39	7.35	8.03	2.569	0.084
.	Strategy Implementation	6.67	6.71	7.45	2.220	0.117
.	Knowledge at risk of Loss	7.36	6.88	7.46	0.640	0.530
	Organizational Factors towards Knowledge Retention in IUG	7.10	6.96	7.73	1.240	0.283
1.	Attitudes And Emotions	7.35	6.80	7.84	4.468	0.015*
.	Power Play	7.53	7.17	7.50	0.401	0.671
.	Leadership	7.65	7.30	7.70	0.481	0.620
.	Knowledge Growth and Development	7.52	7.16	7.47	1.124	0.331
	Behavioral Factors towards Knowledge Retention in IUG	7.30	7.03	7.68	1.987	0.145
	All fields together	7.23	6.97	7.64	2.320	0.106

* The mean difference is significant a 0.05 level

Table (7.21) shows that the p-value (Sig.) is smaller than the level of significance $\alpha = 0.05$ for the fields "Performance Management and Attitudes and Emotions", then there is significant difference among the respondents toward these fields due to Experience. We conclude that the personal characteristics' Experience has an effect on this fields.

For the other fields, the p-value (Sig.) is greater than the level of significance $\alpha = 0.05$, then there is insignificant difference among the respondents toward these fields due to Experience.

We conclude that the personal characteristics' Experience has no effect on the other fields.
The researcher can justify the above result with respect to "Performance Management and Attitudes and emotion" as being strongly related to the time spent in the organization and the loyalty to the IUG acquired with time, in addition to growing in age.
Attitudes and emotions are much related to age as the older the employee grows, the wiser he becomes and that settles high emotions and narrow attitudes younger employees are known with. Performance management however, could possibly be related to experience due to the fact that younger and less experienced employees are unlikely to view benefits and incentives related to performance management as enough as they should be, especially in the view of financial difficulty IUG is running in, while older and more experienced personnel who have come across prosperous times would look at performance management in a different view.

H5.2 : there are significant differences among respondents at ($\alpha \leq 0.05$) towards the organizational and behavioral factors towards knowledge retention due to age.

Table (7.22) shows that the p-value (Sig.) is smaller than the level of significance $\alpha = 0.05$ for each field, then there is significant difference in respondents' answers toward each field due to Age. We conclude that the personal characteristic of the Age has an effect on each field.
The researcher found that the number of respondents in the category with an age less than 30 years to be (4.3%), which is found consistent with the result in 7.1.2 where respondents with less than 5 years of experience form only (4.3%), The reason behind this can be explained by the fact that IUG top ranking positions require a minimum of a master degree which difficult to obtain before the age of 30, However, table 7.5 shows around 50% of the respondents to be academic heads of department and this justifies the fact that more than 50% of the respondents are older than 40 years, the reason is that a head of dept. position requires a PhD which is difficult to obtain earlier than the age of 40.

The result of this field came to prove that age is related to the degree of presence of the factors that has been shown in the factor experience and hence same comment applies.

Table (7.22):ANOVA test of the fields and their p-values for Age

No.	Field	Means			Test Value	Sig.
		Less than 40 years	From 40 years and less than 50 years	50 years and older		
1.	The level of awareness to the knowledge retention at IUG	6.36	6.93	7.46	4.196	0.019*
2.	The level of attention given by the Islamic University to Knowledge Retention	6.30	7.10	7.83	8.307	0.001*
3.	Knowledge Retention Dimensions	6.62	7.47	7.95	9.053	0.000*
	Knowledge Retention	6.50	7.28	7.83	9.345	0.000*
1.	Performance Management	6.51	7.30	8.22	8.312	0.001*
	IUG Support	6.83	7.85	8.19	8.964	0.000*
	Strategy Implementation	6.09	7.08	7.78	8.840	0.000*
	Knowledge at risk of Loss	6.46	7.30	7.93	4.037	0.022*
	Organizational Factors towards Fnowledge Retention in IUG	6.47	7.38	8.03	8.840	0.000*
1.	Attitudes And Emotions	6.78	7.18	8.17	8.865	0.000*
	Power Play	6.88	7.38	7.92	3.201	0.047*
	Leadership	6.93	7.50	8.20	4.691	0.012*
	Knowledge Growth and Development	7.02	7.38	7.73	4.515	0.015*
	Behavioral Factors towards Knowledge Retention in IUG	6.69	7.37	8.02	9.176	0.000*
	All fields together	6.62	7.34	7.95	9.807	0.000*

* The mean difference is significant a 0.05 level

H5.3: There are significant differences among respondents at ($\alpha \leq 0.05$) towards the organizational and behavioral factors towards knowledge retention due to gender.

Table (7.23) shows that the p-value (Sig.) is greater than the level of significance $\alpha = 0.05$ for each field, then there is insignificant difference in respondents' answers toward each field due to Gender. We conclude that the characteristic of the Gender has no effect on each field.

The number of female respondents to the questionnaire was only two from 69 and that forms 2.8% only, the researcher finds this little value does not correspond to a significant difference and hence, the researcher finds commenting on this field is insignificant.

Table (7.23): Independent Samples T-test test of the fields and their p-values for Gender

No.	Field	Means		Test Value	Sig.
		Male	Female		
1.	The level of awareness to the knowledge retention at IUG	6.97	6.00	1.010	0.316
2.	The level of attention given by the Islamic University to Knowledge Retention	7.14	6.30	0.843	0.402
3.	Knowledge Retention Dimensions	7.41	6.38	1.236	0.221
	Knowledge Retention	7.26	6.29	1.182	0.241
1.	Performance Management	7.44	5.50	1.772	0.081
2.	IUG Support	7.67	7.40	0.298	0.767
3.	Strategy Implementation	6.99	8.10	-1.033	0.306
4.	Knowledge at risk of Loss	7.32	5.40	1.486	0.142
	Organizational Factors towards Knowledge Retention in IUG	7.36	6.60	1.016	0.304
1.	Attitudes And Emotions	7.41	7.10	0.337	0.737
	Power Play	7.45	6.10	1.330	0.188
	Leadership	7.61	6.40	1.150	0.254
	Knowledge Growth and Development	7.42	6.60	1.372	0.175
	Behavioral Factors towards Knowledge Retention in IUG	7.41	6.58	1.006	0.318
	All fields together	7.36	6.48	1.093	0.278

* The mean difference is significant a 0.05 level

H5.4: There are significant differences among respondents at ($\alpha \leq 0.05$) towards the organizational and behavioral factors towards knowledge retention due to educational level.

Table (7.24) shows that the p-value (Sig.) is greater than the level of significance $\alpha = 0.05$ for each field, then there is insignificant difference in respondents' answers toward each field due to Educational Level. We conclude that the characteristic of the Educational Level has no effect on each field.

The researcher justify the result that there is insignificant differences amongst respondents towards the factors educational level to the fact that more than 87% of the respondents carry a master degree and higher and understand the need of knowledge in educational firms.

Table (7.24): ANOVA test of the fields and their p-values for Educational Level

No.	Field	Means			Test Value	Sig.
		Bachelor	Master	PHD		
1.	The level of awareness to the knowledge retention at IUG	7.63	6.92	6.83	1.226	0.300
2.	The level of attention given by the Islamic University to Knowledge Retention	7.33	6.97	7.12	0.168	0.846
3.	Knowledge Retention Dimensions	7.66	7.61	7.26	0.770	0.467
	Knowledge Retention	7.57	7.33	7.14	0.525	0.594
1.	Performance Management	8.05	7.49	7.23	1.020	0.366
2.	IUG Support	8.05	7.73	7.57	0.553	0.578
3.	Strategy Implementation	7.00	7.08	7.00	0.015	0.985
4.	Knowledge at risk of Loss	7.50	7.77	7.06	0.956	0.390
	Organizational Factors towards Knowledge Retention in IUG	7.65	7.52	7.22	0.737	0.483
1.	Attitudes And Emotions	7.60	7.51	7.33	0.210	0.811
2.	Power Play	7.93	7.88	7.17	2.061	0.135
3.	Leadership	8.00	7.84	7.41	0.875	0.421
4.	Knowledge Growth and Development	7.28	7.49	7.38	0.187	0.830
	Behavioral Factors towards Knowledge Retention in IUG	7.68	7.60	7.27	0.737	0.483
	All fields together	7.64	7.51	7.23	0.674	0.513

H5.5 : There are significant differences among respondents at ($\alpha \leq 0.05$) towards the organizational and behavioral factors towards knowledge retention due to job in IUG.

Table (7.25) shows that the p-value (Sig.) is greater than the level of significance $\alpha = 0.05$ for each field, then there is insignificant difference in respondents' answers toward each field due to Job in IUG. We conclude that the characteristic of the respondents Job in IUG has no effect on each field.

The researcher find this result to comply with the nature of the organization as an academic castle, knowledge is the main objective for the presence of universities in life, and it is a pride for all to prove that all personnel from the top ranking positions have high affiliation towards the issue of knowledge retention.

Table (7.25):ANOVA test of the fields and their p-values for Job in IUG

No.	Field	Means				Test Value	Sig.
		President/ Deputy President/ Faculty Dean	Deputy Faculty Dean	College Director	Academic Head Of Department		
1.	The level of awareness to the knowledge retention at IUG	7.61	6.85	6.62	7.29	1.933	0.133
2.	The level of attention given by the Islamic University to Knowledge Retention	7.60	6.93	7.01	7.15	0.580	0.630
3.	Knowledge Retention Dimensions	7.89	7.25	7.30	7.28	0.817	0.489
	Knowledge Retention	7.77	7.10	7.10	7.25	0.988	0.404
1.	Performance Management	7.89	7.22	7.20	7.58	0.658	0.581
2.	IUG Support	8.35	7.28	7.59	7.63	1.629	0.191
3.	Strategy Implementation	7.65	6.62	7.18	6.45	1.717	0.172
4.	Knowledge at risk of Loss	7.75	6.68	7.37	7.17	0.751	0.526
	Organizational Factors towards Knowledge Retention in IUG	7.91	6.95	7.34	7.21	1.628	0.192
1.	Attitudes And Emotions	7.96	7.11	7.33	7.40	0.976	0.409
2.	Power Play	8.02	6.52	7.49	7.60	2.638	0.057
3.	Leadership	8.20	6.89	7.58	7.72	1.697	0.176
4.	Knowledge Growth and Development	7.87	7.11	7.35	7.38	1.801	0.156
5.	**Behavioral Factors towards Knowledge Retention in IUG**	7.96	6.93	7.39	7.37	1.629	0.191
	All fields together	7.89	6.99	7.29	7.33	1.353	0.265

CHAPTER EIGHT

CONCLUSIONS AND RECOMMENDATIONS

8.1 Introduction:

The aim of this study was to investigate the reality of the organizational and behavioral factors towards knowledge retention in the Islamic University of Gaza.. In this chapter, the conclusions and the recommendations of the study shall be discussed.

8.2 Conclusions:

In light of the findings that were presented in chapter seven, the following conclusions can be drawn:

1. The researcher found that IUG faculties and departments determine the type of knowledge to be retained, store the knowledge in appropriate manner, identifies the knowledge that must be retained for the continuity of performance development of IUG staff. The departure of experts however, did not constitute any risk to the university's performance from the respondent's point of view.

The above factors together form the level of awareness to the issue of knowledge retention, although the factors in the field of awareness tend to measure actions being taken on the IUG level, they are designed to read the results on a personal point of view in order to measure the level of personal awareness the knowledge retention issue.

Results has shown a moderate level of awareness to the issue of knowledge retention in IUG.

2. The researcher has found that IUG work constantly to create new knowledge through interaction with the students, IUG management Sponsors the rights of innovation and excellence to their employees, which encourages creative and talented employees to share their knowledge with the rest of the team members, IUG management determine the type of knowledge needed to the employees to

accomplish tasks, IUG identifies the staff experiences and skills that should be retained, IUG encourages the faculties and departments to retain knowledge.

The above factors together form the level of attention to the issue of knowledge retention, although the factors in the field of attention tend to measure actions being taken on the IUG level, they are designed to read the results on a personal point of view in order to measure the level of personal attention to the knowledge retention issue.

Results has shown a high level of attention to the issue of knowledge retention in IUG.

3. The researcher has found IUG to have the following:

- A Performance management system that support Knowledge retention at a level of 73.8%**.**
- A system that support and encourages Knowledge retention at a level of 76.6%.
- A clear strategy that supports knowledge retention at a level of 70.2%
- Departments and colleges identify clearly knowledge at risk of loss at a level of 72.6%

The above factors together form the organizational factors towards knowledge retention, they are found to have a total mean of (7.33) which represent a high presence within the system of the IUG. When looking at the results of Awareness, attention and the level of Knowledge retention, which are all found to be high, together with the correlation coefficient between the organizational factors and the level of knowledge retention at the IUG which equals .892, the researcher can strongly claim that ***There is a significant relationship between the organizational factors and the level of knowledge retention at the IUG, (at $\alpha = 0.05$ level).***

4. The researcher has found IUG to have the following:

- Attitudes and emotions towards Knowledge retention at a level of 74.0%**.**
- IUG plays the power game in favor of Knowledge retention at a level of 74.1%.

- Leaders of IUG support knowledge retention at a level of 75.7%
- Top ranking employees feel at a level of 73.9% that their knowledge grow and develop with time.

The above factors together form the Behavioral factors towards knowledge retention, they are found to have a total mean of (7.44) which represent a high presence within the system of the IUG. When looking at the results of Awareness, attention and the level of Knowledge retention, which are all found to be high, together with the correlation coefficient between the Behavioral factors and the level of knowledge retention at the IUG which equals .795, the researcher can strongly claim that ***There is a significant relationship between the behavioral factors and the level of knowledge retention at the IUG, (at $\alpha = 0.05$ level).***

5. The researcher has found the following concerning the significant differences among respondents towards the organizational and behavioral factors towards knowledge retention due to:

- Experience :

There is no significant difference among the respondents toward "IUG support, Strategy implementation, knowledge at risk of loss, power play, Leadership and knowledge growth and development" due to Experience. However, there is significant difference among the respondents toward "Performance Management and Attitudes and Emotions" due to Experience. ***We conclude that the personal characteristics' Experience has an effect on this fields.***

- Age :

There is significant difference among the respondents toward "Performance Management, IUG support, Strategy implementation, Knowledge at risk of loss, Attitudes and emotions, power play, Leadership and Knowledge growth and development" due to Age. ***We conclude that the personal characteristics' Age has an effect on this fields.***

- Gender :

There is no significant difference among the respondents toward "Performance Management, IUG support, Strategy implementation, Knowledge at risk of loss, Attitudes and emotions, power play, Leadership and Knowledge growth and development" due to Gender. ***We conclude that the personal characteristics' Gender has no effect on this fields.***

- Educational Level:

There is no significant difference among the respondents toward "Performance Management, IUG support, Strategy implementation, Knowledge at risk of loss, Attitudes and emotions, power play, Leadership and Knowledge growth and development" due to Educational level. ***We conclude that the personal characteristics' Educational level has no effect on this fields.***

- Job position in IUG :

There is no significant difference among the respondents toward "Performance Management, IUG support, Strategy implementation, Knowledge at risk of loss, Attitudes and emotions, power play, Leadership and Knowledge growth and development" due to Job Position. ***We conclude that there are significant difference among the respondents toward the personal characteristics' Job position.***

The researcher has found based on the above *that there are significant differences among respondents at ($\alpha \leq 0.05$) towards the organizational and behavioral factors towards knowledge retention due to personal characteristics (experience, age, gender, educational level and job in IUG).*

8.3 Recommendations for future research

Knowledge Retention as a branch of knowledge Management, is a new subject that is being discussed. Literature has shown difficulty to find sources for this subject earlier than 2006, However, later researches has shown a huge gap between models

that are being adapted as the factors that influence knowledge retention has not been agreed upon yet. This study has adopted the model created by Dr. Ellen Collin Martins in her PHD research, this model names the organizational factors as: Performance Management, Organizational Support, Strategy Implementation and Knowledge at Risk of Loss.

The study named behavioral factors as: Attitudes and emotions, Power play, Leadership and Knowledge growth and development.

Although results collected has shown a high level of knowledge retention behaviors adapted by the Islamic University of Gaza, and proved with the results collected for awareness and attention to the issue, backed up the leveraged rate of presence of the organizational and behavioral factors towards knowledge retention, the researcher recommends that further researches be carried out to study knowledge retention as it forms an asset to the university Particularly by:

- Examining each factor influence on knowledge retention in an elaborated manner.
- Increase awareness to the Issue of knowledge retention.
- Drop the factor attention from the list of factors and include it in the organizational support.
- Study the effect of computer repositories on knowledge retention.
- Investigate the reason behind the high level of effect of "attitudes and emotions" to knowledge retention amongst the older employees.

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Appendix 1

Questionaire in English Language:

Personal information

Please tick with the sign ✂ into the box that most describe you:

- **Experience**

Less than 5 years	☐	From 5 years and less than 10 years	☐
From 10 years and less than 15 years	☐	15 years and more	☐

- **Age**

Less than 30 years	☐	From 30 years and less than 40 years	☐
From 40 years and less than 50 years	☐	50 years and older	☐

- **Sex**

Male	☐	Female	☐

- **Educational Level**

Diploma	☐	Bachelor	☐	Master	☐	PHD	☐	Other	☐

- **Job in IUG**

President	☐	Deputy President	☐
Faculty Dean	☐	Deputy Faculty Dean	☐
Academic Head Of Department	☐	College Director	☐

Section 1 : Knowledge Retention. **Questions are designed using column system (1-10)**

Q. No.	Question	Grade 1-10
1. The level of awareness to the knowledge retention at IUG		
1.	IUG faculties and departments can determine the type of knowledge to be retained	
2.	Knowledge can be retained within the University by storing on IUG computers	
3.	Departure of experts does not constitute any risk to the university's performance	
4.	IUG identifies the knowledge that must be retained for the continuity of performance development of IUG staff	
5.	The retention of knowledge is essential for the progress of the university and its leadership.	
2. The level of attention given by the Islamic University to Knowledge Retention		
6.	IUG work constantly to create new knowledge through interaction with the students	
7.	IUG management Sponsors the rights of innovation and excellence to their employees, which encourages creative and talented to share their knowledge with the rest of the team members	
8.	IUG management determine the type of knowledge needed to the employees to accomplish tasks	
9.	IUG identifies the staff experiences and skills that should be retained	
10.	IUG encourages the faculties and departments to retain knowledge	
3. Knowledge Retention Dimensions		
11.	In our department, problems are resolved in a constructive manner	
12.	In our department, we can determine the type of knowledge needed to perform the work tasks	
13.	In our department, we continuously learn to perform new different tasks	
14.	In our department, we continuously develop new mechanisms of action through interaction with the students	
15.	In our department, we create knowledge through discussion with each other	
16.	In our department, we document all the knowledge productive activities such as meetings, lectures, training courses, seminars etc.	
17.	In our department, there is effective communication between the older members and the younger members	
18.	In our department, when a member of the team retires IUG grants him an extension for a specific period to train his successor	
19.	In our department, we apply our experience to develop the mechanisms of action	
20.	In our department, we use our experience to develop decision-making skills	
21.	In our department, experienced members share their expertise to prepare the team to perform unexpected tasks	
22.	In our department, there is effective communication between members with different knowledge and experiences	

Insert the grade that suits you, Grades nearer to 10 reflects high acceptance by you to the Question and vice versa

Section 2 : Organizational factors towards knowledge Retention in IUG

4. Performance Management

Q. No.	Question	Grade 1-10
23.	IUG has a clear mission that adopts knowledge retention	
24.	IUG has a strategic plan that adopts knowledge retention	
25.	IUG has an action plan that adopts knowledge retention	
26.	IUG complements outstanding performance employee contributions by bonuses and incentives	
27.	IUG has a system of performance management that takes into account knowledge retention	

5. IUG Support

Q. No.	Question	Grade 1-10
28.	IUG works towards creating a system of knowledge management within the faculties and departments	
29.	IUG encourages employees to propose new ideas	
30.	IUG encourages cooperation between different sections and departments	
31.	IUG encourages interaction between people who have interest in raised problems	
32.	IUG gives attention towards developing the technological infrastructure necessary for the dissemination of knowledge	

6. Strategy Implementation

Q. No.	Question	Grade 1-10
33.	IUG strategy includes encouraging volunteerism among individuals and groups that share common goals, such as the student union	
34.	IUG strategy includes training and development programs effective in the capacity building and dissemination of knowledge	
35.	IUG strategy includes experts assistance in certain topics for staff training	
36.	IUG strategy includes adoption and encouragement of success stories	
37.	IUG strategy includes measures to benefit from the experiences of retirees	

7. Knowledge at risk of Loss

Q. No.	Question	Grade 1-10
38.	At the university level, the retention of experiences and knowledge of leadership staff is considered a matter of high importance	
39.	At the university level, the retention of experiences and knowledge of the best performers is considered a matter of high importance	
40.	At the university level, the retention of experiences and knowledge of near to retirement staff is considered a matter of high importance	
41.	At the university level, the retention of experiences and knowledge of rare expertise staff is considered a matter of high importance	
42.	IUG has an effective professional development process that helps in capacity and competency building of knowledge	

Insert the grade that suits you, Grades nearer to 10 reflects high acceptance by you to the Question and vice versa

Section 3 : Behavioral factors towards knowledge Retention in IUG

8. Attitudes And Emotions

Q. No.	Question	Grade 1-10
43.	IUG pays attention to select employees who have personality that support knowledge retention	
44.	IUG pays attention to select employees who have a personality that support knowledge sharing	
45.	IUG pays attention to planting the values of trust, justice and cooperation in the hearts of the staff	
46.	IUG pays attention to select the university employees amongst the ones who have good communication skills	
47.	IUG adopts a well-established criteria based on knowledge when selecting new employees	

9. Power Play

Q. No.	Question	Grade 1-10
48.	IUG supports work teams cohesion and the social interaction between them	
49.	IUG forms special committees to resolve disputes between employees and not leave problems to magnify	
50.	IUG Employ experts from outside the university, which helps to create new knowledge	
51.	IUG encourages experts within the university to share their knowledge	
52.	IUG promotes an atmosphere of trust between employees	

10. Leadership

Q. No.	Question	Grade 1-10
53.	IUG leadership is characterized as a role model for knowledge	
54.	IUG leadership provide the opportunities that create knowledge for learning	
55.	IUG leadership encourages knowledge building behaviors	
56.	IUG leadership is characterized as leaders of knowledge	
57.	IUG leadership pays attention to the flow of knowledge in order to be exchanged amongst employees	

11. Knowledge Growth and Development

Q. No.	Question	Grade 1-10
58.	Working with my colleagues and not alone improve my ability to retain knowledge	
59.	I participate actively in the educational programs opportunities to develop myself constantly	
60.	I feel satisfied to share my experiences when working with others	
61.	Failure to retain accumulated knowledge within the university forms an obstacle against progressing in my career	
62.	I feel satisfied in performing my job without getting any incentives	

Insert the grade that suits you, Grades nearer to 10 reflects high acceptance by you to the Question and vice versa

Thank you for your participation

Appendix 2

Questionaire in Arabic Language:

بسم الله الرحمن الرحيم

الجامعـــة الإسلاميـــــة-غـــزة
عمـــــادة كليـــــة التجـــــارة
شئون الدراسات العليا والبحث العلمي
برنامج ماجستير إدارة الأعمـــــال

الأخ الفاضل/ ..... حفظه الله

أتقدم لكم بجزيل الشكر مقدماً على إسهامكم معنا لدراسة واقع الاحتفاظ بالمعرفة داخل الجامعة الإسلامية، وأود في هذا المقام أن أنوه لكم أن دراسة هذا الموضوع يمثل لدينا أمراً غاية في الأهمية لأن الاحتفاظ بالمعرفة وتعني بتبسيط شديد " أن تتمكن المؤسسة من التطور والنمو باستمرار دون تعثر حتى ولو فقدت كوادرها الخبيرة وهو الأمر الذي يحدث طبيعياً عبر عوامل عدة منها، التقاعد، السفر، الابتعاث، الانتقال لعمل آخر، المرض أو الوفاة أو حتى برصاص وصواريخ الغادر المحتل".

وتكمن أهمية هذه الدراسة في أنها تتناول علماً من علوم المعرفة الحديثة التي لا تزال أبحاثه نادرة، ونأمل أن يكون للجامعة فيها إسهاماً ذو قيمة وأن تكون من أوائل الجامعات العربية التي تبحث في هذا الموضوع.

وتشكل هذه الاستبانة جزءاً مهماً للحصول على درجة الماجستير في إدارة الأعمال، كلية التجارة، الجامعة الإسلامية-غزة. لذلك آمل منك أن تقرأ الاستبانة وأن تجيب عن أسئلتها بموضوعية ودقة. ونؤكد لكم أن المعلومات المقدمة في البحث لن تستخدم إلا لأغراض البحث العلمي.

الباحث / عصام حلمي حماد

المعلومات الشخصية:

نرجو منك وضع علامة (ﮫ) داخل المربع الذي يناسبك:

- **الخبرة**

☐ أقل من 5 سنوات	☐ من 5 وأقل من 10 سنوات
☐ من 10 وأقل من 15 سنـة	☐ 15 سنـة فأكثر

- **العمر**

☐ أقل من 30سنة	☐ من 30 سنة وأقل من 40 سنـة
☐ 40 سنة وأقل من 50 سنـة	☐ 50 سنـة فأكثر

- **الجنس**

☐ ذكر	☐ أنثى

- **المستوى التعليمي**

☐ دبلوم ☐ بكالوريوس ☐ ماجستير ☐ دكتوراه ☐ غير ذلك

- **المستوى الوظيفي**

☐ رئيس الجامعـــــــة	☐ نائب الرئيس
☐ عميد كليـــــــة	☐ نائب عميد كليـــــة
☐ رئيس قسم أكاديمي	☐ مدير كليـــة/ دائرة

المحور الأول: الاحتفاظ بالمعرفة **تصميم الأسئلة بنظام عمود (1-10)**

1- مستوى الإدراك للاحتفاظ بالمعرفة في الجامعة الإسلامية بغـــزة		
الرقم	**السؤال**	**الدرجة 1-10**
.1	تستطيع كليات الجامعة وإداراتها تحديد نوع المعارف الواجب الاحتفاظ بها.	
.2	يمكن الاحتفاظ بالمعرفة داخل الجامعة بنسخها على حواسيب الجامعة.	
.3	لا تشكل مغادرة الكوادر الخبيرة أي مخاطر على أداء الجامعة.	
.4	تحدد الجامعة نوع المعرفة التي يجب الاحتفاظ بها لاستمرارية تطوير أداء كوادرها.	
.5	يشكل الاحتفاظ بالمعرفة أمراً ضرورياً لتقدم الجامعة وريادتها.	
2- مستوى الاهتمام الذي توليه الجامعة الإسلامية للاحتفاظ بالمعرفة		
الرقم	**السؤال**	**الدرجة 1-10**
.6	تعمل الجامعة باستمرار على خلق معرفة جديدة من خلال التفاعل مع الطلبة.	
.7	ترعى إدارة الجامعة حقوق الإبداع والتميز للعاملين لديها مما يشجع المبدعين والمتميزين على مشاركة معارفهم مع باقي أعضاء الفريق.	
.8	تحدد إدارة الجامعة نوع المعرفة اللازم توفرها لدى العاملين لإنجاز المهام.	
.9	تحدد الجامعة خبرات ومهارات العاملين بها والتي يحب الاحتفاظ بها.	
.10	تشجع الجامعة كلياتها ودوائرها على الاحتفاظ بالمعرفة.	
3- أبعاد الاحتفاظ بالمعرفة		
الرقم	**السؤال**	**الدرجة 1-10**
.11	في دائرة العمل، يتم حل المشاكل بطريقة بناءة.	
.12	في دائرة العمل، نستطيع أن نحدد نوع المعرفة اللازمة لأداء مهمات العمل.	
.13	في دائرة العمل، نتعلم باستمرار القيام بمهام جديدة متغيرة.	
.14	في دائرة العمل، نطور باستمرار آليات جديدة للعمل من خلال التفاعل مع الطلبة.	
.15	في دائرة العمل، نقوم بخلق المعرفة من خلال مناقشة بعضنا البعض.	
.16	في دائرة العمل، نقوم بتوثيق كافة الأنشطة المنتجة للمعرفة: مثل الاجتماعات، المحاضرات، الدورات التدريبية، حلقات النقاش .... إلخ.	
.17	في دائرة العمل، هناك تواصل فعال بين الأعضاء الأكبر سناً والأعضاء الأصغر سناً.	
.18	في دائرة العمل، عند تقاعد أحد أعضاء الفريق يتم التمديد له لفترة محددة لتدريب من يخلفه.	
.19	في دائرة العمل، نستخدم خبراتنا لتطوير آليات العمل.	
.20	في دائرة العمل، نستخدم خبراتنا لتطوير مهارات اتخاذ القرار.	
.21	في دائرة العمل، يشارك ذوو الخبرة خبراتهم لتهيئة الفريق لأداء المهام الغير متوقعة.	
.22	في دائرة العمل، هناك تواصل فعال بين الأعضاء ذوي المعرفة والخبرات المختلفة.	

يرجى وضع الدرجة التي تناسبك فكلما اقتربت الدرجة من 10 دل ذلك على الموافقة العالية على ما ورد في العبارة ، والعكس صحيح.

المحور الثاني: العوامل التنظيمية المؤثرة على استبقاء المعرفة في الجامعة الإسلامية

4- إدارة الأداء		
الرقم	**السؤال**	**الدرجة 1-10**
.23	للجامعة رسالة واضحة ترعى الاحتفاظ بالمعرفة.	
.24	للجامعة خطة استراتيجية ترعى الاحتفاظ بالمعرفة.	
.25	للجامعة خطط تنفيذية ترعى الاحتفاظ بالمعرفة.	
.26	يتم تقدير إسهامات الموظفين المتميزين بأدائهم بالمكافآت والحوافز.	
.27	لدى الجامعة نظام معلوماتي لإدارة الأداء يراعي الاحتفاظ بالمعرفة.	
5- دعم الجامعة الإسلامية		
الرقم	**السؤال**	**الدرجة 1-10**
.28	تعمل الجامعة على خلق نظم لإدارة المعرفة داخل كلياتها ودوائرها.	
.29	تشجع الجامعة موظفيها على اقتراح أفكار جديدة.	
.30	تشجع الجامعة التعاون بين مختلف الأقسام والدوائر.	
.31	تشجع الجامعة التفاعل بين الأشخاص الذين لديهم اهتمام نحو المشاكل المطروحة.	
.32	تولي الجامعة اهتماماً لتطوير البنية التحتية التكنولوجية اللازمة لنشر المعرفة.	
6- تطبيق الاستراتيجية		
الرقم	**السؤال**	**الدرجة 1-10**
.33	تتضمن استراتيجية الجامعة تشجيع التطوع لدى الأفراد والجماعات ذات الأهداف المشتركة مثل اتحاد الطلبة.	
.34	تتضمن استراتيجية الجامعة برامج تدريب وتطوير فعالة لبناء القدرات ونشر المعرفة.	
.35	تتضمن استراتيجية الجامعة الاستعانة بخبراء في مواضيع معينة لتدريب كوادرها.	
.36	تتضمن استراتيجية الجامعة تبني قصص النجاح وتشجيعها.	
.37	تتضمن استراتيجية الجامعة ما يضمن الاستفادة من خبرات المتقاعدين.	
7- المعرفة المعرضة لخطر الفقدان		
الرقم	**السؤال**	**الدرجة 1-10**
.38	على مستوى الجامعة، يعد الاحتفاظ بخبرات ومعرفة الكوادر القيادية أمراً هاماً للغاية.	
.39	على مستوى الجامعة، يعد الاحتفاظ بخبرات ومعرفة الكوادر الأفضل أداءً أمراً هاماً للغاية.	
.40	على مستوى الجامعة، يعد الاحتفاظ بخبرات ومعرفة الكوادر التي اقتربت من التقاعد أمراً هاماً للغاية.	
.41	على مستوى الجامعة، يعد الاحتفاظ بخبرات ومعارف الكوادر ذوي الخبرات النادرة أمراً هاماً للغاية.	
.42	لدى الجامعة عملية تطوير مهنية فعالة تساعد على بناء المعارف والقدرات والكفاءات.	

يرجى وضع الدرجة التي تناسبك فكلما اقتربت الدرجة من 10 دل ذلك على الموافقة العالية على ما ورد في العبارة ، والعكس صحيح.

المحور الثالث: العوامل السلوكية المؤثرة على استبقاء المعرفة في الجامعة الإسلامية

8- المواقف والمشاعر المتعلقة بالمعرفة		
الرقم	**السؤال**	**الدرجة 1-10**
.43	تولي الجامعة اهتماماً باختيار موظفيها ممن لديهم خصائص شخصية تدعم الاحتفاظ بالمعرفة.	
.44	تولي الجامعة اهتماماً باختيار موظفيها ممن لديهم الشخصية الداعمة لمشاركة المعرفة.	
.45	تولي الجامعة اهتماماً بزرع قيم الثقة والعدل والتعاون في نفوس الموظفين.	
.46	تولي الجامعة اهتماماً باختيار موظفيها ممن لديهم مهارات تواصل جيدة.	
.47	تعتمد الجامعة معايير راسخة تستند إلى المعرفة عند اختيار موظفيها الجدد.	
9- ممارسة القوة		
الرقم	**السؤال**	**الدرجة 1-10**
.48	تدعم الجامعة تماسك فرق العمل والتفاعل الاجتماعي بينها.	
.49	تقوم الجامعة بتشكيل اللجان الخاصة لحل النزاعات بين الموظفين وعدم ترك المشاكل تتعاظم.	
.50	تستعين الجامعة بالخبراء من الخارج مما يساعد على خلق معارف جديدة.	
.51	تشجع الجامعة الخبراء داخلها على مشاركة معارفهم.	
.52	تعزز الجامعة مناخاً من الثقة بين موظفيها.	
10- القيادة		
الرقم	**السؤال**	**الدرجة 1-10**
.53	تتصف قيادة الجامعة بصفات القدوة المشجعة للمعرفة.	
.54	تقوم قيادة الجامعة بإتاحة فرص خلق المعرفة للتعلم.	
.55	تشجع قيادة الجامعة سلوكيات بناء المعرفة.	
.56	تتسم قيادة الجامعة بريادة المعرفة.	
.57	تولي قيادات الجامعة اهتماما بتدفق المعرفة لتبادلها بين العاملين.	
11- نمو المعرفة وتطورها		
الرقم	**السؤال**	**الدرجة 1-10**
.58	العمل مع زملائي وليس بمفردي يحسن من قدرتي على الاحتفاظ بالمعرفة.	
.59	أشارك بفاعلية في فرص برامج تعليمية لتطوير نفسي باستمرار.	
.60	أشعر بالرضا لمشاركة خبراتي عند العمل مع الآخرين.	
.61	عدم الاحتفاظ بالمعرفة المتراكمة داخل الجامعة يشكل عائقا أمام تقدمي الوظيفي.	
.62	أنا أشعر بالرضا لأداء وظيفتي دون الحصول على أي حوافز.	

أشكر لكم حسن مشاركتكم

Appendix 3

Questionaire referees:

الدكتور وسيم الهابيل	الجامعة الإسلامية
الدكتور رشدي وادي	الجامعة الإسلامية
الدكتور سمير صافي	الجامعة الإسلامية
الدكتور نبيل اللوح	ديوان الموظفين العام
الدكتور يوسف الجيش	الجامعة الإسلامية
الدكتور محمد المدهون	كلية الإدارة والسياسة
الدكتور جمال الزعانين	جامعة الأقصى
أ. الدكتور عبد الجليل صرصور	جامعة الأقصى
الدكتورة ديبة الزعانين	جامعة الأقصى