Original Article: Acknowledge Management in Organizations and Centers

Marzieh Samimi*

M.A in Agriculture Engineering, Food Engineer & Risk Specialist in Industries, Iran

ABSTRACT

Knowledge, or knowledge, is a structure for producing and organizing findings about the natural world, in the form of explanations and testable predictions of epistemology, dealing with the three elements of data, information, and knowledge. In other words, epistemology discusses knowledge and its constituent elements, namely data and information. If we consider knowledge to have a paired and dual nature, each knowledge is both hard and soft. The only degree and degree of this mixture is two species that differ in different sciences. The concept of knowledge management has been used practically but informally for a long time. Therefore, in order to better understand the concept of knowledge management, we first examine the concepts of data, information and knowledge and the differences and relationships between them. Knowledge is neither data nor information However, they are related to both and their differences are not necessarily substantial and are simply hierarchically different. Data, information and knowledge are not concepts that can be used interchangeably. Understand these three words and how to get from one to the other. Another is very important in the success of scientific work.

Introduction

Data: Data is a fact or an item from a particular context without relation to other things. Data are raw facts and realities [1-3]. The data reflect complete, unified, and coherent interactions and exchanges, referred to as a minor component. These components are stored and managed in databases. Data has minimal text and alone does not imply the concept of a larger subject until it is processed [4-6]. Data is a series of objective, abstract facts about events.

Corresponding Author: *Marzieh Samimi (marziehsamimi68@gmail.com)*

From an organizational perspective, data is considered a series of regular recorded transactions [7-9].

Information: Adding context and interpretation to the data and linking them to each other leads to the formation of information [10]. Composite and related data information is associated with context and its interpretation. Data communication may represent information [11-13]. Relation of data alone may not lead to information. Unless it makes sense to understand them. Information actually includes summarized data that has been grouped, stored, refined, organized, and analyzed to clarify the context. Decisions can be made by examining information. Information usually takes the form of accumulated numbers, words, and propositions, and summarizes numbers and propositions. Information, unlike data, is meaningful.

Knowledge: Adding comprehension and memory to information leads to natural development after information. Summarizing as much as possible (accumulation) of primary information leads to knowledge. Knowledge in this case can be defined as insights from information and data that can be effective and divisible in different ways and in different situations. Knowledge minimizing the collection and reading of information It does not increase access to information. Effective knowledge helps to remove unwanted information and data [14-16]. Knowledge is a perception that is gained through experience, reasoning, direct understanding and learning. When people share their knowledge, the knowledge of each increase and new knowledge is obtained by combining one person's knowledge with other people. Rampersd expresses knowledge as a function of information, culture and skills [17-19].

Data hierarchy, information and knowledge

Iran has been the cradle of knowledge in the past. Iran is one of the countries that has made great strides in the field of education system in addition to international sanctions that have prevailed in almost all fields of research for the past 30 years [20-22]. Iran's university population has increased from 100,000 in 1978 to 2 million in 2006. Seventy percent of science and engineering students in Iran are women. Iran reportedly has the fastest scientific growth in the world and has made significant advances in aerospace technology, nuclear physics, medicine and stem cells (Figure 2) [23-25].

Definition of knowledge management

Knowledge management is the process of helping organizations find, select, organize, and disseminate important information, and is specialized in activities such as problem solving, dynamic learning, strategic planning, and decision making [27-29]. Knowledge management is any process or action of production, acquisition, acquisition, promotion and socialization and its application. Wherever knowledge is established, it enhances the learning and performance of the organization [30-32]. Quetz defines knowledge management as: Creates capital from the thoughts and ideas of members and knowledge-based assets. Knowledge management, knowledge management or management of scientific reserves means the systematic availability of information and scientific reserves, so that when needed, available to those who need them [33-35]. Knowledge management is the achievement of organizational goals by motivating knowledge workers and creating facilities for them according to the company's strategy rather than their ability to interpret data, to be able to do their daily work more efficiently and effectively. And information

(using existing results, information, experience, skills, culture, personality, personal characteristics, emotions, etc.) are added to the data and information through semantics [36-38]. Knowledge management is the explicit and systematic management of critical knowledge and the processes involved in creating, organizing, disseminating, using, and exploring knowledge. Knowledge management includes all the ways in which an organization manages its knowledge assets, including how to collect, store, transfer, apply, update and create knowledge [39-41]. We live in a world that is global. Becoming undergoes rapid and inevitable changes. In this world, economics has moved towards a knowledge-based economy and has challenged many of the current equations of countries, which in turn is the result of information and communication technology. In acquiring and applying up-to-date knowledge and information in order to improve operations and provide better services and products to the client. Such organizations need to adopt a new style of management called "knowledge management". Some organizations believe that Knowledge can be managed by focusing solely on people, technology and techniques [42].

Challenges of knowledge management

The public and private organizations and the environment in which these organizations operate have changed drastically. Organizations have to rethink their structure to adapt to a changing and competitive environment, and to do so must be more flexible in the face of changes in the environment. They also need more sophisticated methods and techniques to manage their knowledge capital. New organizations know that:

1) Most of their scientific assets are available to them in the form of tacit knowledge (knowledge that is obtained through experience and work and is not documented) that this form of knowledge should be more supported by the organization to take.

2) Need coherent mechanisms to facilitate the promotion of organizational exchange.

3) The work processes of the organization need to be adapted to the specific characteristics of users of knowledge (such as the individual's position in the organization, individual competencies, cognitive style and interests and motivations of the individual) to improve the quality of work as much as possible. Although many knowledge management systems have emerged and are still emerging, they have only been able to meet the needs of individuals and organizations in relation to organizational knowledge to a very small extent. Most of these systems are traditional approaches to knowledge management. Have been formed and have only been able to effectively support one of the components of the knowledge cycle (knowledge classification, knowledge storage and knowledge modification).

* Limitations related to tacit knowledge management

* Limitations on the ability to engage knowledge users in a dynamic, active and ongoing knowledge exchange.

* Limitations related to the support of each user (user of knowledge) as well as attention to the interaction of the specific role of each user in the organization with the competencies, cognitive style, interests and motivations of the user.

Need to support individuals' tacit knowledge

The view of traditional knowledge management systems towards knowledge is very limited and superficial and they do not pay

attention to tacit knowledge of individuals. Tacit knowledge encompasses all the experiences and skills that individuals acquire unknowingly while working, and this form of knowledge is one of the most important forms of knowledge for new organizations.

Why is tacit knowledge management so important for organizations?

1. New organizations are constantly evolving and do not have enough time to formalize such knowledge.

2. Formalizing this knowledge is a very difficult task.

3. Extracting this knowledge from employees may cause serious resistance from individuals (because people consider this type of knowledge as a strategic tool by which they can maintain their position in the organization).

4. Tacit knowledge is an essential element of organizational learning. Tacit knowledge management is not limited to providing communication tools (such as email, etc.), but tacit knowledge management should support the dynamics of social interactions between people. It is a mistake to assume that people engage in social interactions subconsciously and for no apparent reason. The development of existing relationships depends on the degree to which people are satisfied with the relationship. Creating a social interaction process in a group is complex and time consuming and involves many factors such as (achieving an acceptable level of trust between people) for success, therefore requires a lot of support. The need to pay attention to the specific characteristics of each user: Traditional knowledge management systems usually do not pay attention to the specific characteristics of each user, but new systems should try to gain a deep understanding of the user that this understanding can include individual role in the organization, individual

competencies, style Why is it important to have a deep understanding of the user's personal characteristics? Because the more knowledge management systems are aware of the individual characteristics of the user, the better they will be able to transmit knowledge to people. Another reason is that user-centric systems (Figure 3). They make it possible to drastically change the role of individuals and to understand knowledge management systems [43].

Knowledge management process

The knowledge cycle or in other words, the knowledge management process consists of four main parts: In the first stage, the existing knowledge at the level of the organization and its obstacles (including explicit and implicit knowledge of individuals, databases, documents) must be identified and then acquired and stored properly. Then, in order for the knowledge to become valuable, it will lead to the synergy and rebirth of knowledge. The existing knowledge must be shared and shared with individuals. After these steps, the acquired knowledge must now be used for the higher goals of the organization. Knowledge creation involves the entry of new information into the system and the result of knowledge sharing and sharing with individuals. Knowledge creation itself involves the acquisition, discovery and development of knowledge.

Components of knowledge management

Davenport identifies the basic components of knowledge management:

1- Culture: includes the values and beliefs of the members of the organization in relation to the concepts of information and knowledge.

2- Action process: In fact, how do people use the information and knowledge in their institutions?

3- Policies: Include barriers that arise in the process of knowledge and information sharing in the organization.

4- Technology: What information systems are available in the institute?

Culture in knowledge management

Organizational culture and structure should support the knowledge management system in the organization. Organizational culture, where creativity and innovation are a value, is one of the advancing dimensions of knowledge management. Culture (beliefs and ideas) is shared by members of the organization. Values The organization, unwritten principles and rules and methods of implementation, constitute the cultural resource of knowledge. Be valued, all employees of the organization at all levels and in any situation, to believe that they should share their knowledge and information for the growth and success of the organization, and this thinking is encouraged and supported in the organization. In such an organizational culture, thinking is not considered a waste of time, but is encouraged. The atmosphere in the organization is such that all people are eager to learn and transfer what they have learned to others. Team, department and even limited organization the free flow of information, knowledge and ideas is established. All members of the organization are evaluated and encouraged based on their contribution to the growth of the organization's knowledge. Individuals can easily access experts and specialists and benefit from their knowledge. The work environment is such that people can discuss in an informal environment without disturbing others and without restrictions. Meetings are managed in such a way that there is never one person in charge of the meeting and there is free and multilateral dialogue with everyone. The organizational environment has many characteristics that are a potential source of knowledge. Therefore, by communicating with these characteristics, an organization can find its own sources of knowledge. This can be a virtual source of knowledge that can be accessed or acquired from the environment. Considered. The World Wide Web, for example, is a relatively simple and inexpensive virtual knowledge resource [41].

Elements of knowledge management

Elements of knowledge management are:

Individual: The knowledge worker is the main unit for creating, storing and using knowledge in the organization.

Group: Networks (formal and informal) are important assets in terms of knowledge, which are usually non-objective. Groups are made up of employees with shared experiences that usually produce increasing knowledge.

Organization: The whole organization can be viewed as an institution, which embodies the results of a set of knowledge.

Steps to implement knowledge management in the organization (implementation steps)

It is natural that the implementation of knowledge management in the organization, like the implementation of any other method, should be done in a step-by-step and smooth process, the implementation of knowledge management consists of six steps.

Teaching concepts and attracting managers

Implementing a comprehensive plan in the organization requires the attention of managers as well as training the concepts and subject matter of the plan at the expert level. Especially since knowledge management

should be led by the members of the organization. Therefore, at the beginning of the plan should be participatory training workshops. Implemented to attract the opinion and expertise of the members of the organization. These workshops include topics such as:

➢ Concepts of knowledge management in the organization (introductory)

➢ Concepts of knowledge management in the organization (advanced)

➢ Knowledge management and information technology

➢ Organizational culture Sharing knowledge, cores and needs?

➢ How to increase the level of knowledge of the organization?

➢ Knowledge problems of our organization

➢ Solutions Implement knowledge management in a similar organization.

Assessing the level of knowledge of the organization: After familiarizing and attracting the attention of managers, it is necessary to examine the current situation in a completely transparent manner. In this regard, questionnaires are distributed in the organization and among experts, based on the type of organization, checklists similar to knowledge management plans the results of these questionnaires as well as organizational information are entered into a computer dynamics system and the growth charts of various organizational knowledge (based on the latest theories of knowledge management) are obtained as output. The dynamics system simulates the organizational knowledge scenario and draws it in the form of diagrams. These diagrams show the current state of knowledge of the organization and its future with the current situation. These diagrams are

analyzed by knowledge management experts and in joint meetings with managers and the strengths and weaknesses of the organization in various structural dimensions. Technology and humanity are defined in terms of knowledge [44].

Forming a knowledge team: After evaluating the knowledge management specialists and managers of the organization and selecting the desired scenario and the next knowledge step, according to the needs of the leading scenario, knowledge management teams at different levels of the organization are selected from among the organization members, take on new tasks (which, of course, do not pose a problem in time).

Formulation of knowledge vision: Based on the acceptable scenario, the knowledge vision of the organization is drawn and based on it, the strategic knowledge plan is determined based on the strengths and weaknesses of the organization in terms of knowledge. The knowledge management plan must first be implemented in a small area as a pilot project. Therefore, all of the above is designed in this section.

Implementation of the pilot project: The part of the organization that has been approved as a pilot project is re-analyzed and based on the results of the analysis with the same method and taking into account the results obtained from the whole organization, methods and solutions of knowledge management in three The field of structure, technology and human beings are examined. Also, these solutions are analyzed at cost and using various methods to find the optimal (preferred) solution, according to the opinions of managers and experts, approved solutions are determined. These solutions are planned and implemented in the pilot project. During and after the implementation process, the

results are implemented, evaluated and reported, and finally, the report is submitted to managers to correct the process and evaluate the performance of knowledge management.

Independent continuation of knowledge management unit: If the pilot plan is acceptable, the plan for implementing knowledge management in a step-by-step process will be implemented in other parts of the organization. However, in this part, the formation of knowledge management unit in the organization is required to be recognized. From now on, this unit will implement the complete knowledge management in the organization only by receiving recommendations from the knowledge management consultant independently. The successful continuation of this process causes the organization to keep pace with the developments, knowledge in the global economy and maintain competitiveness and create new markets The organization becomes a knowledge-based company.

Success factors of knowledge management

Harry Harn states that based on my own experiences as well as case studies of knowledge management in the world, the main factors that are critical to the success of knowledge management can be classified into four groups. These four groups are: people, processes, technology and continuous strategic commitment. A group of researchers believe that the above factors can be divided into two categories: technology and processes in one group, people and continuous strategic commitment in another group.

1. Technology: Knowledge management technology solutions provide the foundation for supporting and sharing knowledge, collaboration, workflow, and document management. These tools provide a central

resource where employees, customers, partners, and suppliers can share information. Exchange and guide each other and ultimately make better decisions. The most common forms of knowledge management technology are knowledge inputs, such as the Internet, intranets, and extranets. Some of these technologies are general, such as standard Microsoft or Lotus Notes databases, and some There are specialized tools such as business intelligence, document management.

2. Processes: Includes standard processes for knowledge donation, content management (acceptance, content, quality retention, preservation of current content, archiving or deletion of old content). Here, too, it is important that processes be simple and clear to all. The employees of the organization are fully understood and used [17].

3. Individuals: The most important challenge in knowledge management is to ensure the participation of members in knowledge sharing, cooperation and reuse of knowledge for results. This important issue should be accompanied by changing the culture of the organization and a culture governs the organization to avoid hoarding knowledge. To create an atmosphere of intimacy and trust. To achieve this goal, it is necessary to pay attention to people's motivations. In order to reorganize reward systems, performance appraisal and other systems of performance measurement should be considered.

4. Ongoing strategic commitment: Strategic management plays a key role in promoting desirable behavior through pattern or continuous communication. An essential principle for success in knowledge management is the creation of a strategic, ongoing commitment to knowledge management by top and senior managers. Studies show management initiative

Knowledge failed in several organizations because they assumed knowledge management to be short-term, diverting attention from the next big wave, and diverting their attention from the next big wave. Organizations can use the following factors as a guide to success in implementing a knowledge management initiative:

➢ The existence of knowledge leaders or heroes is the personal knowledge leader who actively creates and drives the knowledge program.

➢ Creates a culture that encourages innovation and learning and knowledge sharing.

➢ Accelerates the process of learning and knowledge transfer.

➢ Creates a common understanding of Organizational missions

➢ Existence of a clear plan that shows the relationship between knowledge and its benefits * Attractive insights

➢ Appropriate technology infrastructures

➢ Making information, knowledge and metadata available to employees in order to perform quality work and realize service paradigm.

Factors of knowledge management failure

The most important obstacle to the effective implementation of knowledge management in the organization is the lack of culture, knowledge sharing and lack of understanding of the numerous benefits of knowledge management among employees. In other words, the main reasons for the failure of knowledge management in various institutions are:

➢ Lack of organizational learning, due to poor communication between employees (02%)

➢ Lack of success in using knowledge management in all daily activities (91%)

➢ Lack of appropriate time to learn how to make good use of knowledge management and understand its complexities (81%)

➢ Lack of staff training (51%)

➢ Misperception of staff indicates that knowledge management offers few benefits to its users (31%)

➢ What has been said so far suggests that the most important concerns of implementing knowledge management effectiveness include human aspects. Many organizations have failed to implement knowledge management effectively in the organization because they have not properly introduced the concepts of knowledge management to employees.

Knowledge management models

So far, various researches have introduced models of knowledge management, each of which focuses on one aspect of management.

Knowledge Process Model: Davenport and Prosak presented the model, stating that the individual who produces information and can make sense of the data, they place significant emphasis on the following five processes.

1- Formulation of goals based on knowledge

2- Classification and identification of a part of the desired knowledge

3- Processing

4- Review

5- Summarizing and summarizing data.

This model gives meaning to the raw facts in the data. This model also states the rules that exist in the use of software or databases to convert data into meaningful information. The information process is affected and affected:

these factors are explicit knowledge and tacit knowledge Participatory model in teaching and learning: The participatory model in teaching and learning emphasizes the following axes:

1. Create a new mental model for each new situation instead of applying the same general instructions to multiple situations.

2- Arguing about qualitative patterns and direct perception instead of experience and analysis and determining quantity and quantity.

3- Thinking in terms of a general and interconnected system instead of separate components

4- Emphasis and focus on the learning process and the mental models that govern it, instead of emphasizing the results, mastery of basic skills, ability to participate, ability to deal with constant turmoil, work at different levels with different instructions, improve staff skills, problem solving and Decision-making is adapting to changing situations, accepting change, updating employee knowledge, achieving measurable results, and connecting theory and practice, and action with action.

Insight from information to insight and knowledge model: How intelligence is used and its stages from information to knowledge, information retrieval, information organization, and scientific application of knowledge in life. The success of an organization depends on the extent to which Use knowledge and create new knowledge. Before an organization can manage knowledge or create new ideas, it must know how much knowledge it has. In order to do this, a framework and system for classifying knowledge is needed. Knowledge classification requires asking some questions about the organization. To succeed in knowledge classification, the organization must understand the dynamics of complexity and

then understand the process of knowledge creation [10].

Tacit knowledge model: According to this model, more than two thirds of the vital knowledge of any organization comes directly from tacit knowledge. This is the knowledge that employees keep in mind. By implicitly relying, most organizations focus on explicit knowledge and information retrieval. Demonstrates how tacit knowledge profoundly affects knowledge creation processes. These feedbacks are not only derived from knowledge but also enriched with non-quantitative information. This model relies mainly on four intangible factors: innovation, understanding, judgment, and experience. The most important goal of applying knowledge management in all types of institutions is to quickly adapt to changes in the environment in order to improve efficiency and profitability. As a result, knowledge management refers to the process of how knowledge is created, disseminated and applied in the organization. Cochlear model of knowledge: This model provides a model that helps to recognize and implement knowledge management. This model combines empathetic knowledge, rational knowledge, systemic knowledge and Practical knowledge comes with it. In addition, a set of separate latent or overt knowledge will not be adjustable and distributable in the organization and create new knowledge until it becomes a collection. Creating organizational knowledge requires constant interaction between different states of knowledge. The helical model analyzes knowledge as follows:

1) Knowledge production: Acquisition of process knowledge-combining knowledge of being real knowledge-creating knowledge of knowledge registration

2) Knowledge storage: knowledge process (how knowledge)

3) Application of knowledge: cause (why we know).

Conceptual model of knowledge management: This model emphasizes the three axes of data, information, knowledge through tacit knowledge and tacit knowledge in knowledge production and emphasizes the importance of information systems as a major input factor. Using tacit knowledge, documents, resources Documentary data and reports are understood, judged and experienced through tacit knowledge.

Knowledge solution model: This model defines knowledge as the full application of information and data plus the skills, abilities, ideas, and potential motivations of individuals. Knowledge helps to determine what needs to be done? When should it be done? Where should it be guided? What is its importance? And how should it be done to maximize efficiency and effectiveness? He says knowledge guides one to know how to process data and information and get useful results. In this model, three main elements in knowledge creation are discussed: data, information and knowledge, all of these elements affect all elements of knowledge creation and production. The most important goal of applying knowledge management in various institutions is to quickly adapt to changes in the environment to improve efficiency and profitability. As a result, knowledge management refers to the process of how knowledge is created, disseminated and applied in the organization. In other words, the

ultimate goal of knowledge management is to share knowledge among employees in order to enhance the added value of knowledge in the organization. One of the goals of knowledge management is to establish communication between people who know, so that individual knowledge gradually becomes organizational knowledge. Or another goal of knowledge management is the growth and promotion of knowledge among employees. For this purpose, it is necessary to learn information technology and understand its main effects in this process. In fact, the ultimate goal of knowledge management is to increase intelligence or productivity of the organization. In the following, the obstacles affecting the use of knowledge management in organizations were summarized as follows.

Barriers related to individuals

In the literature, much emphasis has been placed on the importance of the role of individuals in knowledge management processes. In general, employees should be actively involved. Activities such as gathering knowledge, distributing knowledge and applying it as a basic part of their individual success and satisfaction in the organization Participate. Obstacles related to individuals include psychological phenomena that occur as a person's perception of their surroundings gives, such as lack of motivation, fear of loss and the like. These barriers are summarized in Table 1.

Table 1: Obstacles related to individuals in knowledge management

Resources	Barrier
McLaughin et al., 2008; Riege ,2007	**Lack of time and heavy workload**
Yin-Tong Sun & Scott 2005; Szulanski 1996; Riege 2007; Schilling & Kluge, 2009; McLaughin et al., 2008; Lucas,2000	**Fear of losing knowledge ownership / control of knowledge assets / frontiers**

Yin-Tong su & scott, 2005; Schilling & Kluge, 2009 McLaughin *et al.*, 2008; Szulanski, 1996; Hauke, 2006; Tong and Mitra, 2009	**Competition between individuals / specialized identity**
Szulanski 1996; McLaughin *et al.*, 2008; Schilling & Kluge, lack of storage capacity 2008	**Trust / reliability of the knowledge source or recipient of knowledge**
Szulanski 1996; Schilling & Kluge2009	**Lack of storage capacity**
Yin-Tong Sun & Scott 2005; Riege, 2007; Schilling Kluge2009; Lawrence *et al.* 2005. &	**Lack of absorption capacity**
Yin-Tong Sun & Scott 8002; Riege, 8002; Schilling& Kluge, 8009; McLaughin et al.,8002	**Weaknesses in interpersonal and communication skills**
Riege, 2008; Szulanski, 1996; McLaughin et al 2008Schilling & Kluge, 8009	**High levels of stress / risk**
Riege, 2008; Schilling & Kluge ,2009 Schilling and Kluge 2009; Sun & Scott, 2005	**Lack of motivation** **Lack of senior management support**
Riege ,2007	**Divergent ideals of groups: Innovation as a threat**

Barriers related to technology

Information technology is a key enabler for knowledge management. Because it provides a stronger platform for knowledge management and increases its impact on the organization. Effective knowledge management is impossible without effective information systems and technologies. There is a wide variety of technologies such as business intelligence, knowledge base, interaction, portals, customer management systems, data mining, workflow and the like. Which enable the acquisition, maintenance and sharing of information and support employees in applying and providing knowledge in the system. In this section, technology-related barriers to the application of knowledge management are listed below:

➢ Lack of available technology

➢ Excess information

➢ Old systems

➢ Useful technology

➢ Unrealistic expectations of

Obstacles related to processes

The process is a way to identify the knowledge that needs to be acquired. Knowledge that is in the minds of the organization's experts to be used is to perform knowledge audit. With the help of an audit, the types of knowledge required for resources, weaknesses and the strengths, knowledge flows, and applications that are needed to develop and create a knowledge strategy for the organization are evident

May be.

➢ Lack of fit between knowledge and important organizational goals

➢ Poor knowledge targeting

➢ Difficult distance / relationship

➢ method of leadership

➢ Culture

➢ Strict rules and regulations

- ➢ Vague job descriptions (not my job phenomenon) / Job descriptions without flexibility

- ➢ Decentralization (silo structure, with strong departmental structure)

- ➢ High turnover rate in senior management.

- ➢ Low rate of retention of knowledge of experienced and highly skilled staff / high turnover

- ➢ Staff and management

- ➢ Long-term organizational success: the pitfalls of competency.

- ➢ Incompatible management strategies, systems, policies, actions and processes

- ➢ Knowledge

- ➢ Not being positive

- ➢ Need rewards

- ➢ Lack of formal authority on the part of the innovator or respondent.

- ➢ Lack of fit between innovation and organizational assumptions and beliefs

Conclusion

In knowledge organizations, knowledge is easily transferred and made available to all employees. Once employees have access to organizational knowledge, they can recognize and make sense of their environment. They can find new and better ways to get things done, work together, fill knowledge gaps, increase productivity, customers Satisfy and ultimately gain effective competitiveness. Organizations that generate new knowledge through research and development or informal learning processes are superior to organizations that operate on the knowledge of others. Knowledge management addresses issues such as adaptation. Organizationally, survival and the ability to cope with increasing environmental change. In fact, knowledge management seeks a synergistic combination of information processing, information technology and human creativity. Obstacles to knowledge management indicate the fact that knowledge management success requires Organizations are determined to remove these barriers. Knowledge management in the organization must be believed and employees and managers must believe in its effectiveness, and only then will they act to remove obstacles. It is important to pay attention to each of these barriers. Removing these barriers requires investment. As mentioned, human barriers (individuals) are one of the major barriers to knowledge management. If people do not want to share their knowledge with others and the organization for any reason, knowledge management programs will be seriously endangered and this issue becomes more important due to the social nature of knowledge. Furthermore, organizational barriers (processes) in the form of Structural factors, managerial factors and job-related factors were discussed. Paying attention to these factors will play a decisive role in the position of knowledge management. Knowledge management will not be effective without a proper and trustworthy participatory culture. Culture will have a tremendous effect on behavior because it embraces the system of values and beliefs of any society. Political processes and factors such as influencing the policy-making process, pressure groups and. It can have a negative effect on knowledge management because knowledge is related to power and gaining power is important for policy making. Also, the lack of proper technical infrastructure (technology) to maintain information retention creates serious barriers to knowledge management and will cause the loss of a large part of information and reprocessing in business and information. Finally, it should be

noted that the role of technology in overcoming the challenges facing knowledge management systems should not be overlooked. Advances in communication technology are the main reason for the introduction of knowledge management and its expansion in organizations. New organizational forms emerged only because the knowledge base can now be shared with others through electronic tools. The growing trend of networking has led to the emergence of communication structures that cannot be described in the form of traditional organizational models. New information technologies, such as the Internet, have revolutionized the way organizational knowledge databases are used. By combining these unique technologies and skills and the experience of employees, a source of energy will emerge that will advance knowledge management. Given that the ultimate goal of knowledge management is to eliminate the intermediate layers between producers and users of knowledge, and since universities can be considered as the main models of knowledge organizations, it is expected that academic communities will apply knowledge management methods more seriously to produce, share, Organize and use information resources, knowledge and intellectual capital more effectively. These valuable assets, regardless of whether they are internal or external and whether they are overt or covert, must be discovered and updated; And by using the latest technologies to be properly available to those interested. Obviously, the success of knowledge management projects depends on the joint collaboration of different academic groups. In this regard, the important contribution of university libraries in introducing knowledge management and presenting its achievements to the public should be appreciated. Also, holding internal discussions and regular meetings of different

academic strata is another knowledge management program that can be organized by libraries. Designing such programs can provide a good opportunity for academics to accumulate and disseminate knowledge and enhance the culture of knowledge sharing in the university and the community and organizations in need of knowledge management. And help future executives become familiar with successful role models, help them build a learning organization, and learn from others. These measures can prevent many rework and mistakes, provide long-term empirical knowledge and in-service training for professionals, and reduce the decline due to retirement or change of job position as much as possible.

References

[1] E. Sawacha, S. Naoum, D. Fong, *International journal of project management*, **1999**, *17*, 309-315. **[Crossref], [Google Scholar], [Publisher]**

[2] E.A. Mahdiraji, M.S. Amiri, *Journal of Engineering in Industrial Research*, **2020**, *1*, 111-122. **[Crossref], [Google Scholar], [Publisher]**

[3] E.A. Mahdiraji, M.S. Amiri. *Journal of Engineering Technology and Applied Sciences*. **2020**, *5*, 133-147. **[Crossref], [Google Scholar], [Publisher]**

[4] E.A. Mahdiraji, A. Yousefi Talouki, *Journal of Chemical Reviews*, **2020**, *2*, 284-291. **[Crossref], [Google Scholar], [Publisher]**

[5] C.M. Tam, S.X. Zeng, Z.M. Deng, *Safety Science*, **2004**, *42*, 569-586. **[Crossref], [Google Scholar], [Publisher]**

[6] S.T. Ng, K.P. Cheng, R.M. Skitmore, *Building and Environment*, **2005**, *40*, 1347-1355. **[Crossref], [Google Scholar], [Publisher]**

[7] P. Manu, M. Ankrah, D. Proverbs, S. Suresh, *International Journal of Project*

Management, **2013**, *31*, 1017-1026. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[8] A. Azadeh, Z. Gaeini, B. Moradi, *Safety science*, 2014, *32*, 415-427. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[9] Y. Wang, H.P. Lo, *Journal of Management Development*, **2003**, *22*, 483-526. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[10] C.H. Lawshe, *Personnel Psychology*, **1975**, *28*, 563-575. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[11] K.K. Kuan, K. Warwick, *IEE Proceedings C: Generation, Transmission and Distribution*, **1992**, *139*, 235-240. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[1٢] E.A. Mahdiraji, N. Ramezani, *2015 2nd International Conference on Knowledge-Based Engineering and Innovation (KBEI)*, Tehran, Iran, **2015**, 405-411. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[1٣] E.A. Mahdiraji, M.S. Amiri. *International Journal of Smart Electrical Engineering*, **2020,** *9*, 13-21. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[1٤] E.A. Mahdiraji, M. Amiri, *Journal of Engineering Technology and Applied Sciences*. **2020**, *5*, 133-147. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[1٥] M.M.A. Aziz, E.S.T. El Din, D.K.L Ibrahim, M. Gilany, *Electric Power Components and Systems,* **2006**, *34*, 417–432. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[16] A. Samimi, S. Zarinabadi, A. Bozorgian, A. Amosoltani, *Progress in Chemical and Biochemical Research*, **2020**, *3*, 46-54. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[17] A. Bozorgian, S. Zarinabadi, A. Samimi, *Journal of Chemical Reviews*, **2020**, *2*, 122-129. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[1^] E.T. El Din, M. Gilany, M.A. Aziz, D.K. Ibrahim, *Power Engineering Society General Meeting, 2005. IEEE*, **2005**, *3*, 2485–2491. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[1٩] K. Ming-Cai, W. Yang, Z. Jun-Fang, H. Guang, Y. Qiu, *Sustainable Power Generation and Supply (SUPERGEN 2012), International Conference on*, **2012**, 1–6. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[20] B. Raei, A. Bozorgian, *Journal of Chemistry Letters*, **2020**, *1*, 143-148. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[21] S. Karami, M. Javan Nikkhah, KB. otouhifar, V. Rahjoo, A. Ahmadpour, *Iranian Journal of Plant Protection Science*, **2020**, *51*, 129-146. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[22] M. Bagheri Sadr, A. Bozorgian, *Journal of Chemical Reviews*, **2021**, *3*, 66-82. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[23] A. Haghighi Asl, A. Ahmadpour, N. Fallah, *Journal of Modeling in Engineering*, **2018**, *16*, 295-307. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[24] A. Bozorgian, *Journal of Chemical Reviews*, **2021**, *3*, 50-65. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[25] N. Kayedi, A. Samimi, M. Asgari Bajgirani, A. Bozorgian, *South African Journal of Chemical Engineering*, **2021**, *35*, 153-158. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[26] S.V. Mousavi, A. Bozorgian, N. Mokhtari, M.A. Gabris, H.R. Nodeh, *Microchemical Journal*, **2019**, *145*, 914-920. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[27] A. Bozorgian, *Advanced Journal of Chemistry, Section B: Natural Products and Medical Chemistry*, **2021**, *3*, 54-61. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[28] A. Haghighi Asl, A. Ahmadpour, N. Fallah, *Applied Chemistry*, **2017**, *12*, 253-286. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[29] A. Bozorgian, A. Samimi, *International Journal of New Chemistry*, **2021**, *8*, 41-58. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[30] M. Bagheri sadr, A. Bozorgian, *International Journal of Advanced Studies in Humanities and Social Science*, **2020**, *9*, 252-

261. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[31] A. Bozorgian, *Journal of Engineering in Industrial Research*, **2020**, *1*, 1-19. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[32] A. Bozorgian, *Progress in Chemical and Biochemical Research*, **2020**, *3*, 169-179. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[33] A. Surendar, A. Bozorgian, A. Maseleno, L.K. Ilyashenko, M. Najafi, *Inorganic Chemistry Communications*, **2018**, *96*, 206-210. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[34] A. Bozorgian, *Advanced Journal of Chemistry, Section B*, **2020**, *2*, 91-101. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[35] A. Bozorgian, *Advanced Journal of Science and Engineering*, **2020**, *1*, 34-39. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[36] J. Mashhadizadeh, A. Bozorgian, A. Azimi, *Eurasian Chemical Communication*, **2020**, *2*, 536-547. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[37] A. Bozorgian, *International Journal of Advanced Studies in Humanities and Social Science*, **2020**, *9*, 205-218. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[38] F. Zare Kazemabadi, A. Heydarinasab, A. Akbarzadeh, M. Ardjmand, *Artificial cells, nanomedicine, and biotechnology,* **2019**, 47, 3222-3230. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[39] A. Bozorgian, *International Journal of Advanced Studies in Humanities and Social Science*, **2020**, *9*, 241-251. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[40] A. Bozorgian, *International Journal of Advanced Studies in Humanities and Social Science*, **2020**, *9*, 229-240. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[41] A. Bozorgian, Z. Arab Aboosadi, A. Mohammadi, B. Honarvar, A. Azimi, *Eurasian Chemical Communications*, **2020**, *2*, 420-426. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[42] S.E. Mousavi, A. Bozorgian, *International Journal of New Chemistry*, **2020**, *7*, 195-219. **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[43] X. Yang, M.S. Choi, S.J. Lee, C.W. Ten, S.I. Lim, *IEEE Trans.Power System*, **2008**, *23*, 1809-1816, **[Crossref]**, **[Google Scholar]**, **[Publisher]**

[44] E.S.T.E. Din, M. Gilany, M.A. Aziz, D.K. Ibrahim, *Power Engineering Society General Meeting, 2005. IEEE*, **2005**, *1*, 80–86. **[Crossref]**, **[Google Scholar]**, **[Publisher]**