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# THE STUDY OF THE RELATIONSHIP BETWEEN KNOWLEDGE MANAGEMENT AND ORGANIZATIONAL DEVELOPMENT AMONG FACULTY MEMBERS OF FASA OPEN UNIVERSITY

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#### **ABSTRACT**

The following research tries to study the relationship between knowledge management and organizational development aspects among the Fasa IAU faculty members as to the aim of the research it is applied and the methodology is descriptive and of correlational type. First theories on knowledge management and organizational development were studied. Research hypotheses were tested through field study. The statistical of this research included 125 Fasa IAU faculty members among whom, 95 individuals were selected as sample through Morgan table. The sampling method is simple random. To study knowledge management and organizational development, researcher-made questionnaires where used which include:

1. Organizational development questionnaire (a=/865) 2. Knowledge management questionnaire (a=/89).SPSS software was used for analyzing the data. To study the relationship among variables Pearson correlation coefficient and Regression were used. Results suggested that there is a positive significant relationship between knowledge management and organizational development aspects among Fasa IAU faculty members; that is, by the increase in knowledge management aspects, organizational development increases, and vice versa. Finally, suggestions are presented for further studies along with presenting research results.

**Keywords:** Knowledge Management, Organizational Development, Fasa IAU

#### INTRODUCTION

Today is the era of accelerating change and uncertainty about the future and not enough information available for managers' decision-making. If your organization does not keep pace with these changes, the destruction might not be far away, so the power of constant change and adaptation is essentially vital for the organization. In other words, stability and development of 21st century organizations depends the rapid changes and adapting to them, because rapid environmental change, improvement and organizational development are unavoidable in different situations. In line with environmental changes, organizations are required to improve and expand their operations. Organizational improvement is the way that in its implementation, the performance improves, but primarily is based on education, changing values and attitudes of employees and members of the organization. Organizational development is a response to changes, a complex educational strategy to change beliefs, attitudes, values and structure of organization in order to open the way for new challenges and better and easier adaptation with changes (Tousi, 2011).

On the other hand, the knowledge era shows significant changes in existing programs and systems in organizations. Meanwhile, organizations that promote empowerment and development of organizational capabilities in solving problems and work to increase the intellectual capital, in time of internal or external competition have a greater power of survival. Knowledge management is one of the important and valuable approaches which leads to the success of organizations by using and maintaining their technical expertise and avoids loss of critical knowledge which crops up as a result of retirement, downsizing or laying off employees, and changes in human memory. Knowledge is today's most important property of organizations. Therefore, knowledge management as a personal knowledge discovery and an informative subject can be stored in databases and exchanged with others in everyday work processes. The importance of knowledge to survive in the business environment has caused organizations to heavily emphasize activities such as producing, organizing, exchanging and applying

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knowledge under the umbrella term called knowledge management. Taking into account the important role and position of higher education in training specialists required by different sectors, improving and developing higher education, specially the faculty members as the essence and spirit of higher education, underlies the development of other sectors. According to "university consists of the faculty members and promoting and enhancing the quality of faculty members is the real meaning of increasing university's quality". Miller and Wilson (1963) have stated that "the heart of any university is its faculty." A university is becoming good or bad, effective or non-effective due to its faculty members. So the quality of a university depends on its faculty and institution, without having faculty with knowledge, capacity and professional capability, commitment and real motives, it is impossible to provide quality education (Hosseini, 1997). So universities have to move toward the comprehensive development of their faculties and should not neglect this.

#### Literature Review

The literature review is divided into two main sections of internal and external investigations. This part is trying to present similar research about faculty development within and outside the country.

#### Abroad Researches

A research entitled "Survey of knowledge management on organizational performance outputs in a traditional economy" has been done (Chechen *et al.*, 2010). Their research results show the positive effects of knowledge management on organizational outputs, such as innovation, creativity, and staff productivity improvement. In addition, their empirical research shows a positive correlation between the ability of knowledgeable workers and organization output.

Research by Perrin (2005) entitled "Analysis of the usefulness of an integrated knowledge for managing organizations" has been done. Perrin in this study that was conducted on 473 financial institution managers concludes that the most effective tools for exchange and sharing of knowledge among employees are the use of email, the Internet, organizational culture aligned with knowledge management, however due to lack of proper and timely use of these tools by employees, exchange of knowledge among staff of economic enterprises were delayed and people are unable to meet their needs in the areas of business knowledge.

A study entitled "knowledge management systems Success in knowledge-based organizations" by Halawi (2005) was done. The purpose of this study was to develop a model to measure the success of knowledge management system that can be used in knowledge-based organizations, and successful knowledge management system had several variables (system quality, student quality, service quality, willingness to use and user satisfaction) to measure the success of knowledge management systems, so results showed that this model has potential future application of knowledge management systems.

A study conducted by Walden University (2003) entitled "Knowledge Management" indicated that one of the factors for the organizations growth and survival is knowledge management and its process, and also a retarding factor for organizations in the present century is the lack of knowledge leaders who are supporters of knowledge management in organizations. It also has been reported that a strong organizational culture is influential in the implementation of knowledge management and organizational status.

Research by Mary *et al.*, (2003) entitled "faculty development in public two-year colleges" has been done. In this study 300 colleges were randomly selected and a questionnaire including 30 questions was sent to them. The study was divided into six main sections that included: 1) faculty development activities, 2) content, 3) program coordination, 4) participation in the program, 5) credits and 6) evaluation. Results from this study suggest that 90% of colleges have formal programs of faculty development and these programs focus on the development of personal, professional, organizational and curriculum dimensions (Mary, 2003).

Cheng (2002) concluded their research by stating that the major barriers to the effective implementation of knowledge management in organizations are lack of knowledge sharing and understanding of the benefits of knowledge management among staff. The fundamental reasons for the failure of knowledge management in organizations are:

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- Lack of organizational learning due to poor communication among employees.
- Failure to apply appropriate knowledge in daily activities.
- Failure to allocate appropriate time to learning and a lack of staff training.
- False perceptions of employees that knowledge management has small benefits for users.

Research to evaluate faculty development in two-year colleges in Texas by John (2000) has been done. In this study, a 65-item questionnaire was sent to all 64 two-year Texas schools. In this questionnaire, the effectiveness of faculty development programs, including organizational support, was studied and the results showed that schools in the study were neglecting this effective element.

The second element of effectiveness is credit programs. In order to flourish these colleges focused on a combination of various development activities, including: sabbatical, faculty promotion etc.

The third element of the faculty development programs is the rewarding system which has been used by some colleges successfully. The fourth element consists of faculty participation in faculty development programs that was used in none of these schools.

The fifth element is supporting the effectiveness of investment in teaching that showed about 15 colleges take this element into account.

Finally, the sixth element in the effectiveness of faculty development programs is valuable teaching.

Research by Fthey (2000) entitled "Diagnosis of cultural barriers in knowledge management" has been done in more than fifty financial institutions, and has four main categories as follows:

- Examining assumptions about what is knowledge? And which knowledge is valued for managing?
- Investigating the relationship between organizational knowledge and individual knowledge.
- Examining the social interactions that determine how knowledge is used in certain situations.
- Identifying the processes by which knowledge is created and distributed.

Fthey (2000) concluded that Knowledge management processes in these organizations: (creation, acquisition, transfer and application of knowledge) is less than average and doesn't have any scientific and practical application. It seems that these institutions are less likely to be able to implement knowledge management in their institutions due to poor organizational culture.

#### Researches Done in Iran

The result of research by Taghizade and Ghafar (2009) entitled "surveying of knowledge management's role and creativity on institutional development in the Islamic Azad University of Tabriz" showed that knowledge management and creativity have a positive significant effect on organizational development. Also the linear relationship obtained indicates that the impact of knowledge management on organizational development is more than the impact of creativity and finally the need to strengthen knowledge management strategies, creativity, and ultimately, organizational developments are presented (Taghizade, 2010). Research by Jamshidi (2007) entitled "Survey of Beheshti University faculty development and providing a model for continuous improvement" has been done. In this research, faculty development of Beheshti University has been studied in four dimensions of organizational development, professional development, educational development and personal development and the following results were obtained:

- Performance of Beheshti University in organizational development, professional training and individual faculty members has been evaluated as below average.
- From Beheshti faculty perspective, the impact of dimensions of organizational, educational, professional and personal development is evaluated as above average.
- There is a significant difference between the point of views of faculty members with different academic degrees concerning Beheshti University performance in the four dimensions of faculty development and the effect of each dimension in terms of development to facilitate the development process.
- There is a significant difference between different points of view of faculty members with different academic degrees concerning performance of Beheshti University faculty development in four dimensions.

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- There is a significant difference between different points of view of faculty members with various teaching experiences about the performance of University in four dimensions.
- There is a significant difference between the faculty views about the performance of Beheshti University in educational development process among male and female faculty members.

Ehsani (2005) in a study entitled "providing a framework for implementing knowledge management in R & D organizations" came to the conclusion that to implement knowledge management in organizations, especially R & D organizations, all the effective factors should be involved in such situations. It argues that there is no possibility of designing a framework for all organizations, but knowledge management in accordance with state and local characteristics of each organization should be implemented (Kazemzadeh, 2006).

Khalil (2005), in his thesis entitled "Relationship between knowledge management and organizational creativity in Tabriz Oil Refining Company," with the attitude of the staff survey has shown that there is a direct relationship between knowledge management and organizational creativity. This research has also shown that there is relationship among all the indicators for knowledge management and creativity.

Research by Lahyjanyan (2004) entitled "the study of knowledge management in higher education system and providing a good model" has been done. In this study, statistical society includes a number of chives of universities and colleges, deputies, directors of groups, faculty members and Tehran institutions of higher education. In this study the factors that led to the formation of knowledge management in higher education system have been introduced as follows:

- Cultural migration and creating a knowledge management in colleges is inevitable and needs to be approved by competent authorities. And especially the dominant culture at universities is very effective.
- Creating and developing knowledge management programs and courses to increase knowledge, insight and skills of managers, staff and students of higher education.
- Institutionalizing knowledge management system according to the implicit knowledge in addition to the obvious and explicit knowledge.
- Study opportunities for teachers and students from other countries to obtain education and knowledge. Research by Sayahpourr (2009) entitled "The survey of faculty members' points of view at Beheshti University toward in-service training in the years 1375 to 1380" was performed. This research has evaluated 132 faculty members' points of view at Beheshti University about spending in-service training in the years 1996-2002. The following results are obtained: according to the research conducted, faculty members' points of view toward in-service training on the sample group (men and women) with regard to academic rank, education, years of service and different colleges were homogeneous and uniform and finally faculty members have a positive attitude toward in-service training (Sayahpour, 2002).

In the research by Zare (1991), the factors affecting the quality of the scientific faculty of the university according to their own opinion were examined. In this study the extent of Iran's scientific quality is compared with other countries and possible scientific quality of universities and scientific and research centers considering the five-year plans for economic development, social and cultural turns is cleared (Zare, 1991).

## Hypotheses

# The Main Hypothesis

There is a significant relationship between knowledge management and organizational development of Fasa faculty.

Secondary hypotheses:

- 1) There is a significant relationship between knowledge creation and development of the university faculty of Fasa
- 2) There is a significant relationship between organizing knowledge and organizational development of the university faculty of Fasa
- 3) There is a significant relationship between exchange of knowledge and organizational development of the university faculty of Fasa

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- 4) There is a significant relationship between the application of knowledge and organizational development of the university faculty of Fasa
- 5) There is a significant relationship between knowledge management and organizational development of the university faculty of Fasa based on gender.
- 6) There is a significant relationship between knowledge management and organizational development of the university faculty of Fasa based on teaching experiences.

## MATERIALS AND METHODS

In this study the researcher has sought to examine the relationship between organizational development and knowledge management cycle using faculty comments, so the research method is descriptive and correlational.

Data collection tools:

- Library methods, the Internet, local and foreign papers and studying the theoretical basis for background research.
- Field method

In this study, two questionnaires were used as follows:

1) Knowledge Management Questionnaire

The questionnaire is based on the theory of knowledge management cycle (Jashpara, 2004) designed by Abbasi (1389). The questionnaire contains 43 items with five-item Likert range (very high, high, medium, low and very low) and scores were given to them in order of 1-2-3-4-5. This questionnaire measures knowledge management in terms of the four components of knowledge production, knowledge organization, sharing and applying knowledge. The distribution of the questionnaire is presented in the table.

Table 1: Questions related to knowledge management and their components

Knowledge management components	Number of questions	Questions		
Knowledge creation	13	1-2-3-4—5-6-7-8-9-10-11-12-13		
Knowledge Organization	10	14—15-16-17-18-19-20-21-22-23		
Knowledge Exchange	9	24-25-26-27-28-29-30-31-32		
Knowledge Application	11	33-34-35-36-37-38-39-40-41-42-43		

#### 2) Organizational Development

In this study to determine the institutional faculty development, institutional development researcher-made questionnaire is used. The questionnaire contains 35 items with five-item Likert range (very high, high, medium, low and very low). For too many options (score 5), high (score 4), moderate (grade 3), low (score 2) and very low (score 1) are considered.

# Validity and Reliability of Questionnaires

To calculate content validity of the questionnaires, the questionnaires were given to a number of professors and experts and after taking their views the questionnaires were modified. The questionnaires were revised by experts and confirmed.

To ensure reliability, questionnaires were contributed two times within 20 days among 30 faculties and after analyzing data from these questionnaires, the reliability coefficient (Cronbach's alpha) was confirmed and approved.

Organizational Development Questionnaire: A= 0.865

Knowledge management questionnaire: A=0.89

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Table 2: Cronbach's alpha coefficient of reliability test for knowledge management

Knowledge management questionnaire						
Cronbach's alpha Number						
0.89	43					

Table 3: Cronbach's alpha coefficient of validity test of organizational development

Organizational development questionnaire						
Cronbach's alpha	Number					
0.865	35					

#### RESULTS AND DISCUSSION

#### Results

#### Hypothesis 1

There is a significant relationship between knowledge creation and development of the university faculty of Fasa.

Table 4: The relationship between knowledge creation and development of the university faculty of Fasa in 1390

Variables	Number	Minimum score	Maximum score	Average	Standard deviation	Coefficient correlation	Significant Level
Knowledge creation	88	32.00	63.00	47.2500	5.58168	0.217	Below
Organizational development	81	60.00	169.00	114.0000	21.39626	0.317	0.007

Pearson correlation coefficient is used to test this hypothesis. According to the table and results, correlation coefficient is r=0.317. There is a significant 0.007 confidence level in this relationship. To determine the effect of knowledge creation on organizational development regression analysis is used so there is a significant relationship between knowledge creation and development of the university faculty of Fasa.

#### Hypothesis 2

There is significant relationship between organizing knowledge and organizational development of the university faculty of Fasa.

Table 5: The relationship between organizing knowledge and organizational development of the university faculty of Fasa

Variables	Numbe r	Minimu m score	Maximu m score	Average	Standar d deviation	Coefficient correlation	Significanc e Level
organizing knowledge	92	26.00	48.00	36.5543	3.98449	0.070	0.010
Organizationa l development	81	60.00	169.00	114.000 0	21.39626	0.278	0.018

Pearson correlation coefficient is used to test this hypothesis. According to the table and results, correlation coefficient is r=0.278. There is a significant 0.018 confidence level in this relationship. To determine the effect of knowledge creation on organizational development regression analysis is used. With the increase of knowledge of the components of a single, enterprise development component 1.563 unit increase. So there is significant relationship between organizing knowledge and organizational development of university faculty of Fasa.

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## Hypothesis 3

There is a significant relationship between exchange of knowledge and organizational development of university faculty of Fasa.

Table 6: The relationship between exchange of knowledge and organizational development of the university faculty of Fasa

Variables	Number	Minimum score	Maximum score	Average	Standard deviation	Coefficient correlation	Significant Level
Exchange of knowledge	94	14.00	41.00	29.7553	5.30710	0.672	Below
Organizational development	81	60.00	169.00	114.0000	21.39626	0.672	0.0001

Pearson correlation coefficient is used to test this hypothesis. According to the table and results, correlation coefficient is r=0.672. There is significant 0.0001 confidence level in this relationship. With the increase of knowledge of the components of a single, enterprise development component 2.837 unit increase. So there is a significant relationship between exchange of knowledge and organizational development of the university faculty of Fasa.

# Hypothesis 4

There is a significant relationship between the application of knowledge and organizational development of the university faculty of Fasa.

Table 7: The relationship between the application of knowledge and organizational development of university faculty of Fasa

Variables	Number	Minimum score	Maximum score	Average	Standard deviation	Coefficient correlation	Significant Level
Application of knowledge	87	27.00	50.00	39.8736	4.5291	0.545	Below 0.0001
Organizational development	81	60.00	169.00	114.0000	21.39626		

Pearson correlation coefficient is used to test this hypothesis. According to the table and results, correlation coefficient is r=0.545. There is significant 0.0001 confidence level in this relationship. With the increase of knowledge of the components of a single, enterprise development component 2.69 unit increase. So there is a significant relationship between the application of knowledge and organizational development of the university faculty of Fasa.

## Hypothesis 5

There is a significant relationship between knowledge management and organizational development of the university faculty of Fasa based on gender.

Table 8: The relationship between knowledge management and organizational development of university faculty of Fasa based on gender

Variables	Number	Minimum	Maximum	Average	Standard	Coefficient	0
		score	score		deviation	correlation	Level
Knowledge							
management	26	140.00	190.00	155.2308	16.90753		Dalam
in women						0.687	Below
Organizational	0.1	60.00	160.00	114 0000	21 20626		0.0001
development	81	60.00	169.00	114.0000	21.39626		

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Pearson correlation coefficient is used to test this hypothesis. According to table and results, correlation coefficient is r=0.687. There is significant 0.0001 confidence level in this relationship. The Pearson correlation coefficients for the female professors are 0.687 and for male professors are 0.527; it can be said that the relationship between these two components is more conspicuous in female professors. So there is a significant relationship between knowledge management and organizational development of the university faculty of Fasa based on gender, but the relationship between these two components is more conspicuous in female professors.

# Hypothesis 6

There is a significant relationship between knowledge management and organizational development of the university faculty of Fasa based on their experiences.

Table 9: The relationship between knowledge management and organizational development of the university faculty of Fasa based on teaching experiences

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Variables	Number	Minimum score	Maximum score	Average	Standard deviation	Coefficient correlation	Significant Level		
Knowledge management in people with less than 5 years of teaching experience	21	140.00	202.00	162.4286	16.50022	0.656	0.003		
Organizational development	25	60.00	156.00	120.4400	17.72494				

Pearson correlation coefficient is used to test this hypothesis. According to table and results, correlation coefficient is r=0.656 for people with less than 5 years of teaching experience. The Pearson correlation coefficients for people with 10-14 years of teaching experience is r=0.041, and finally for people with more than 15 years of teaching experience is r=0.698. So there is a significant relationship between knowledge management and organizational development of the university faculty of Fasa with more than 15 years of teaching experience.

#### Discussion

Due to the important role of universities in the creation of knowledge and comprehensive development of individuals, it is necessary to identify the main components of universities which are influential in the maintenance of high education missions, and also the performance of each of these components should be analyzed. The knowledge management of the faculty members in their own occupation and specialization can lead to the promotion of educational quality of universities. Therefore identifying the influential factors on knowledge management is of special importance in order to increase the knowledge management of faculty members and consequently to promote the quality of high education. On these grounds there are various factors which are related to knowledge management and can help organization to better benefit from knowledge management; one of these elements is organizational development. In fact organizational development through preparing the mentality of the staff and providing them with a positive perspective on learning and increasing knowledge, leads to the success of the organization. Based on this the present research studies the relationship between knowledge management and organizational development of faculty members of Fasa Open University.

# Conclusion

According to the important role of universities in knowledge production and the comprehensive development of individuals and the community, it is necessary to identify the components which have lasting influences on higher education. The faculties are most important components of the system of higher education and have a vital role in improving the quality of this system. Knowledge management

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and professional faculty in their work could lead to the enhancement of educational quality. Therefore, identifying factors affecting the management of knowledge is important, so the regulation of these factors can increase the knowledge management system of higher education faculty and the quality of the performance. There are several factors that are associated with knowledge management and knowledge management can help organizations make better use of them, and one of them is organizational development. The enterprise can flourish with the preparation of staff and positive mentality to their attitude towards learning and knowledge synergies, which successfully lead the organization. Accordingly, this study examines the relationship between knowledge management and organizational development of the faculty of Fasa University. Therefore knowledge management and organizational development questionnaires were designed and distributed among 100 university faculty members. The results show that there is positive and significant relationship between knowledge management, its components and organizational development. So knowledge management should focus on organizational development and strengthen it. Organizational development will enhance the knowledge management component. Regression results in explaining aspects of knowledge management and organizational development show that components of creating, organizing, sharing and applying knowledge are implying into the equation and in total, 87/82 percent would account for changes in organizational development. Also according to the coefficients, the knowledge component by a factor of 2.837 has the highest regard, and predicts the effects of power and knowledge creation component by a factor of 1.307 has the weakest ability to predict the impact on organizational development.

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