

A Qualitative Research on the University Administrators' Capacity to Use Management Knowledge Tools (The Case of TRNC Universities)

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Abstract

In order to reach goals and continue the ongoing learning process, like other organizations, universities also need the effective use of knowledge management. Knowledge management is an ongoing process and it has to be organized in a manner that is always open to new ideas. In universities where research and development studies play an important role, knowledge management has a very critical importance. Qualitative research techniques have been applied in the study. In the present research, 52 instructors and 25 different members of the board of directors of universities have been interviewed from five different universities. As a result of the comparison statement, results showed board of directors are not using knowledge management tools effectively in areas such as the improvement of knowledge, buying of knowledge, share and evaluation of knowledge, and figuring out of lack of knowledge, based on instructors capacity. Accordingly, research stated that board of directors should study the development of knowledge management tools.

Key Words

Knowledge, Knowledge Management Time Period, Knowledge Management Tools, Universities.

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Knowledge management becomes one of the necessary tools for modern-day organizations. Universities also have to pay intensive attention to knowledge management projects in order to accomplish their objectives and continue the ongoing learning process. The time period is very important and should be organized and developed for upgradable standards. In universities where research and development studies play an important role, knowledge management has a very critical position in the process (Mikulecka & Mikulecky, 2000). Knowledge is the main asset of universities; accordingly, universities play the main character to spread and manipulate knowledge for the society and are the key factor for implementing strategies. In order to reach their missions and social functions, universities should have effective use of knowledge management (Conceicao Heitor, & Oliveira, 1998; Oosterlinck, 2002). The new ideas and suggestions are important in order to develop the knowledge management tools; however, there are not enough studies on this important issue (Agrawal, 2004; Kidwell, Linde, & Johnson, 2000; Rowley, 2000).

According to strategic management literature, it has been discussed that resource based implementation has been more efficient and unique for the success of organizations and that organizations should focus on this strategic and valuable technique (Connor, 2002; Prahalad, & Hamel, 1990; Zack, 1999). Knowledge, today, is the most important and strategic resource in our environment (Kogut, & Zander, 1996; Nonaka, & Takeuchi, 1995; Wijetunge, 2002). "Knowledge" can be defined as "purposeful knowledge" (Davenport, & Laurence, 1998; Yahya, & Goh, 2002). Organizations should expand their resources to organize data in useful format. However, knowledge can only be reached if and only if organizations expend additional resources to discover patterns, rules, and contexts where the knowledge works. Knowledge can also be identified as the role of converting data to knowledge within the context of environment and experience. Knowledge has more critical function in decision making process, more than resource and data. Knowledge can be defined as accurate and non-accurate knowledge. Accurate knowledge can be described as formal-systematic knowledge where it can be easily explained and message transferred to the recipient. Whereas non-accurate knowledge is where the message is difficult to explain, transfer, and identify. It can be described in different ways such as talents, senses, meanings, values, etc.

The new organizational identity can be formed when the individuals' accurate and non-accurate knowledge combine each other in organi-

zations (Nonaka, & Takeuchi, 1995; Nonaka, Toyama, & Konno, 2000; Yim, Kim, Kim, & Kwahk, 2004). Knowledge is the most decisive organizational resource in the organizational structure of institutions which should be used and organized systematically in order to be efficient and effective. In order to manage knowledge, effective planning and programming is needed. The management of knowledge is the combination of important topics such as explaining, obtaining, developing the knowledge, the use of knowledge in an effective way and spread of knowledge in the organization. Knowledge management is the time period where organizations share common situations they have to adapt themselves in highly competitive and changing environment (Beijerse, 1999; Demarest, 1997; Perez, & Pablos, 2003).

According to Aktan and Vural's (2004) introduction from Jarrar's (2002, p. 322-323); the aim of knowledge management can be described in ways such as; increase competition between organizations, effective decision making and time planning, raise the responsibility towards customers, sharing of knowledge between employees and at the same time the prevention of non-educated employees, increase the interaction between co-workers in terms of knowledge and sharing knowledge between themselves, increase the performance of employees and the projects in progress, increase the quality of products and services, and motivate the innovations and new ideas.

Theoretically, universities' main function and mission is to provide and spread knowledge and ideas within communities (Loh, Tang, Menkhoff, Chay, & Evers, 2003). Universities have two main functions; these are research and education. Universities are the main producers of intellectual assets of nations with their graduates and also with the continuous research that they are doing in order to provide new and developed knowledge (Loh et al., 2003; Mothe, Gertler, Landry, Niosi, & Wolfe, 2000).

Organizations focus on the information they need to succeed their objectives. This is also the same for universities. However due to their mission, which is the spread and creation of information, universities are directly related with knowledge. This gives universities the main advantage in terms of the process of information management. Universities can differ from organizations by synergic combination of education and research (Oosterlinck, 2002). Universities' research process can be defined as "research and development informational time period." Research and development can focus on the invasion of information. Accordingly, information management can support this idea.

This time period should give researches unlimited environment and provide connection between disciplines in order to raise the interaction and quality of information. Interaction between organization members has positive effects on information production; accordingly, information management should support this interaction. Interaction of organization members with people other than their organizations and especially the use of information from these people should have positive effect on “research and development time period” (Yli-Renko, Autio, and Tontti, 2002; Numprasertchai & Igel, 2004).

Knowledge management should be supported by knowledge management tools whereas knowledge management without its tools can be defined as inadequate. Knowledge management can be formed by tools which motivate learning process. It is difficult to accomplish knowledge management without its tools. Knowledge management tools play an essential role both in the knowledge management time period and gaining of knowledge process.

Accordingly, in developing nations where researching knowledge and knowledge management tools are rarely developed; both the tools and gathering of knowledge studies should have main priorities (Kalkan, & Keskin, 2002).

Knowledge management has 4 major steps in which knowledge management tools should be used in practice in order to develop knowledge. These tools are; finding the knowledge deficiency (by organizing meetings, brainstorming, working on the future scenarios, etc.) improvement and purchasing of knowledge (research and development activities, use of electronic resources, outsourcing, etc.), sharing of knowledge (partnership, team work, observations), evaluation of knowledge (control of internal and external effects, benchmarking, evaluation of reports). Successful knowledge management can depend on how knowledge resource tools are effectively applied.

Turkey and the Turkish Republic of Northern Cyprus (TRNC) in the university information management research related to any common for the very small number of primary and secondary education institutions to investigate the management of information systems, the current situation to be put in the middle of the work has been seen. Muratoğlu (2005)'s research on university administrators and teachers' knowledge management effectively in schools does not apply, school comparisons,

and information team to create effectively been made, the desired information immediately to reach the schools seriously as stored information and the knowledge base consists of the results has not got to have.

Purpose of the Study

Parallel to the modern-day changes and developments, universities, like all other organizations, have to manage knowledge and create strategies to stay alive in the market place. Universities play an important role in nations' development; therefore, they should focus on effective use of knowledge in order to function efficiently. Knowledge management could be designed as an ongoing process. The time period makes knowledge management necessary for all organizations. It is mentioned that "in order to accomplish their goals," different organizations may have different knowledge systems because of the different goals. In addition, different goals are motivated by different factors. Generally, being competitive and increasing the efficiency are the most common objectives of organizations with knowledge management adoption. Knowledge management plays an important role in universities where research and development is very vital and critical (Mikulecka, & Mikulecky, 2000). The effective use of knowledge management in universities, where spread of knowledge among communities, plays an important role. In order to reach their main mission, universities should focus on effective use of knowledge management (Conceicao et al., 1998; Oosterlinck, 2002). In this study, since there is not enough research on knowledge management in universities, the study aims to improve and develop studies in this area, and to find effective ways to implement the knowledge management and present these methods and apply them in most useful ways to universities administrative management.

Method

Qualitative interview techniques have been used in this research. Data have been collected in 3 different ways: Semi-interviews, open-ended questions, and close-ended questions. In semi-interview method, data questions can be prepared in advance and data are collected based on these questions (Karasar, 1998). This technique is not as strict as close-ended questions and not as flexible as open-ended questions. It provides more realistic environment in the collection of data process; this is the main reason why semi-interview technique is used in the study.

Working Groups

Sample of the study from which the data have been collected was chosen via snowball sampling. In this example, most of the data collected from university administrators and faculty may be appropriate for the purpose of investigation (Tavşancıl and Aslan, 2001). In this research, different ways of expressions are followed. In these kinds of research measurements, different ways of research techniques are taken into account. Administrators from the faculties of education in 5 participant universities that operate in Cyprus took part in the study and Table 1 below was established. A total of 25 university board of directors (administrative staff) and 52 teaching assistants (academic staff) took part in the study which equals to 77 participants in total.

Table 1.

Participant

Name of University	Duty			Instructor	Total
	Management				
	Dean	Vice Dean	Head of Department		
Near East University (NEU)	1	1	4	19	25
Girne American University (GAU)	1	1	3	9	14
Cyprus International University (CIU)	1	1	4	9	15
European University of Lefke (EUL)	1	-	2	6	9
Eastern Mediterranean University (EMU)	1	-	4	9	14
Total	5	3	17	52	77

Data Collection Procedure

Research knowledge was obtained between 15 March-01 July 2008 at convenient hours for the participants at their own private place after relevant interviews were conducted. In the research, how university participants perceive knowledge management and their ability and means to handle the relevant knowledge was examined. In obtaining the relevant

knowledge, the relevant interview document, included the relevant knowledge management (including knowledge deficiency, improvement and purchasing of knowledge, sharing of knowledge and evaluation of knowledge). The questions in the interview document included the works of Beijerse (1999) and his well-developed tools list including general conditions of universities and knowledge management including development evaluation. In order to get approval after the interview document, the relevant forms were given to three experts and their approvals were obtained and relevant changes were made. Sample interviews were conducted with two university board of directors and one instructor then was established where the questions were clear and precise, whether the relevant observers to the questions asker were in conflict to the relevant questions asked were all reached on the capacity with the relevant knowledge. Two other experts also researched the relevant questions and answers and decided whether the answers were inaccurate record of the questions asked and whether the answers were irrelevant with the questions. After this study, it was found that the relevant questions were valid and accurate. It is agreed and well known that in qualitative research techniques the relevant data is concerned with whether the knowledge perceived is real.

Analyzing the Relevant Knowledge

In this research, content analysis was used. Content analysis was completed in four phases and divided into four categories (Yıldırım & Şimşek, 2005).

The coding of the Knowledge

In the interview sessions, the recorded cassettes were put in numbered lines. Interview notes and cassettes were all given to an expert to evaluate and relevant controls were made. After the interview notes were obtained, the relevant knowledge was put in a logical manner and was grouped together in a coded manner. After the relevant research was coded, a code list was obtained and the relevant knowledge acted as a key list. After the key list was read by the participants, “knowledge agreed” and “knowledge disagreed” in principal argued and brought to a consensus. In order to find at the accuracy of the knowledge, Miles and Huberman’s (1994) suggested accuracy formula was followed and 94% accuracy was recorded. For the accuracy of the knowledge obtained 70% and over is recorded as accurate knowledge.

Finding new Themes

In this part, first of all, codes obtained in the primary section will be categorized under themes created at the beginning. In determining the similarities between the codes, the codes were categorized and organized.

Arranging Data into Codes and put in Themes

In this category, participants' answers and data were put into a language whereby the reader would understand in a clear and precise manner and were given to the reader. In order to ascertain which interview notes belong to the participants, footnotes were used along the research and interview notes were put into quotation marks. Later on, notes with quotation marks were expressed as which participant the relevant notes belong to.

Example-1 "....." (G: ÜY (BD))

G: Interview; ÜY (University Dean); ÖE (Instructor); B:B University; D: Dean; DY: Assistant Dean; BB: Head of Department.

Interpretation of Data

At the final stage, detailed analysis of the research data obtained was interpreted with the relevant solutions. Gathered knowledge was continuously interpreted in the research and the relevant solutions were supported by the data.

Results

In this part, like other organizations, universities around the world are conducted in such a manner to use knowledge efficiently to survive and to accomplish their aims. In this relation, Beijer's (1999) knowledge management tools were implemented in our research and examined on the participant universities administrative staff and instructors to evaluate their ability to use knowledge management competently.

1st Phase: Deficiency of Knowledge

According to the university's vision, mission, and objectives, educational and managerial skills have a great impact on knowledge management,

regards to instructors and administrative staff, relevant knowledge deficiency, the tools used in connection with these data and the questions asked to ascertain the competency of the researched data of 25 administrative staff and 52 academic staff members were recorded in Table 2 with the relevant themes and percentages.

Table 2.

Knowledge Management Tools in the Order of Use to Determine the Deficiency of Knowledge

Time Period	Knowledge Management Tools	University Managers Who are Competent	%	University Academicians Who Find Managers Competent	%
Identifying the Knowledge Deficiency	Meetings in order to identify lack of knowledge	19	76	11	21
	Brain-storming sessions	8	32	5	9
	Teaching Assistants' Skills Evaluation	23	92	41	79
	Research to figure out most effective method	21	84	20	38
	Future scenarios	4	16	5	9
	Use of researchers and counselors	15	60	8	15

Organizing Meetings

One of the data gathering techniques for knowledge management is organizing meetings. Participants are interviewed regarding the effectiveness of the method of knowledge management tools. 76% of the participants which can be classified as managerial positions said that they organize meetings in order to improve knowledge management. Accordingly, based on these comments, we can conclude that they can easily address knowledge deficiencies in these meetings. Instructors which are the 79% of the participants which has huge number claim that organizing meetings are not enough and the board of directors do not use that tool that much. In most cases, meetings which can be organized in rare

periods, do not give that much credit to the instructors' ideas and meetings should be organized more often and on more regular bases in order to obtain sufficient results. As a result of organizing meetings, we can conclude that differences of ideas between administrative and academic staff and meetings are not organized properly.

Brainstorming Sessions

32% of the participants in managerial positions claim that brainstorming sessions are sufficient enough in defining knowledge deficiencies. However, 9% of the participants which are instructors claim that brainstorming sessions are sufficient whereas the remaining 91% claim that brainstorming sessions are useless and insufficient. There are differences between instructors and administrative members' ideas about brainstorming sessions. However, when we look at the percentage results we can conclude that both the board of directors and instructors claim that brainstorming sessions are not organized frequently and therefore they conclude that this method is insufficient.

Benchmarking Studies

84% of the participants in managerial positions claim that benchmarking studies are sufficient. We conclude that they track universities or, in other words, competitors' methods. 38% of the instructors claim that benchmarking methods are sufficient enough to figure out the best methods that they use, whereas the rest of the remaining 62% participants argued that managers are not capable of using these methods efficiently. Based on these comments, we can conclude that they do not have enough studies and research in this area; they are having difficulties of adapting new methods and ideas in their organization. The boards of directors are following the old fashion methods and they are worried about changes and the adaptation of new methods. Instructors and board of directors have differences in their ideas in terms of benchmarking studies.

Developing Future Scenarios

16% of the interviewees in managerial positions claim that they are capable of developing future scenarios and that this method is sufficient. 9% of the academic staff said future scenarios methods are sufficient. However, 91% of the instructors said it is insufficient and that administrative posts are unable to apply this method.

As we can see from the percentage comparisons, there are differences between instructors' and the board of directors' ideas about future scenarios. However, when we look at the percentage results we can conclude that both the board of directors and instructors claim that brainstorming sessions are sufficient but administrative posts are unable to apply this method.

2nd Phase: Improvement and Buying of Knowledge

As one of the stages of knowledge management tool, which is the improvement and purchasing of knowledge; questions asked for tools that are used for improvement and purchasing of knowledge reflect the participant's ideas in the Table 3.

Table 3.

Knowledge Management Tools in Order to Used to Improvement and Buying of Knowledge

Time Period	Knowledge Management Tools	University Managers Who are Competent	%	University Academicians Who Find Managers Competent	%
Improving and buying knowledge	Research and development studies	4	16	2	4
	Use of technology	22	88	45	86
	Buying education from outsources	21	84	25	48
	Make employees attend workshops and conferences	24	96	34	65
	Ideas of students	23	92	47	90
	Ideas of consultants	21	84	39	75
	Observation	21	84	22	42

Research and Development Studies

84% of the administrative post participants declared that they are not doing any kind of research and development studies. In addition to this,

96% the boards of directors are insufficient in terms of research and development studies. It would be better to say, the board of directors' and instructors' ideas about research and development studies are parallel to each other based on research and percentage results.

Outsourcing Knowledge

84% of the administrative staff stated that they apply the method of outsourcing knowledge. 48% of the academic staff claimed that the boards of directors use this tool sufficiently. On the other hand, 52% of the participants said the boards of directors do not apply the tool adequately. As a result, according to the majority of academicians interviewed, we can conclude that because of the boards of directors' illogical reasons they are not outsourcing and purchasing knowledge on a long term basis they are using this method to save the day. Based on the data and questions asked, in conclusion, administrative and academic staff members' ideas are parallel to each other and they do not have that much difference in ideas and approaches.

Motivate Employees to Attend Conferences, Workshops and Seminars

96% of the administrative post holders interviewed confirmed that they motivate and encourage employees to attend conferences, workshops, and seminars. According to the result, we can conclude that they put all their efforts in terms of financial and academics terms for personal development of instructors. 65 % of the participants claim that this method is used effectively by the boards of directors, however, 35% of the participants' opinion is that this method is used by directors insufficiently. According to this statement, we can conclude that the boards of directors only motivate instructors to attend these seminars and workshops. However, they do not have much budget for it. Based on the data and questions asked, board of directors and instructor's ideas are not parallel to each other and their ideas differ from each other.

Observational Method

84% of the participants which are in a position of the board of directors said they are using observational method. However, 42% of the participants claim that this method is used effectively by board of direc-

tors. Data and questions asked shows that the boards of directors and instructor's ideas are not parallel to each other and their ideas differ from each other but we can say that observational methods are used effectively by board of directors as management knowledge tool.

3rd Phase: Sharing of Knowledge

As one of the stages of knowledge management tool, which is sharing of knowledge; questions asked for tools that are used for sharing of knowledge reflect the participants' ideas in the Table 4.

Table 4.
Knowledge Management Tools in Order to Use as Sharing of Knowledge

Time Period	Knowledge Management Tools	University Managers Who are Competent	%	University Academicians Who Find Managers Competent	%
KnowledgeSharing	Use of network	24	96	49	94
	Continuous partnership	22	88	21	40
	Organization of work groups	21	84	18	35
	Informal meetings	24	96	45	86
	Social gatherings on regular basis	21	84	21	40
	Discussion groups	20	80	19	37

Continuous Cooperation

88% of the participants who are actually the board of directors support the idea of continuous cooperation tool. According to that statement, the board of directors should constantly cooperate and share ideas regarding the academic and administrative aspects either inside or outside the universities. 40% of these attendants who participated as instructors think that managers are sufficiently using the method of sharing data and knowledge, but rest of them 60% think as opposite way. Based on the data and questions asked, we can conclude that there is a conflict between the board of directors and instructor's ideas.

Team Formation and Organizing Task Groups

84% of the participants who attended the research think that it would be more beneficial to form teams and organize groups in order to achieve team-work and communal work sharing responsibility and achieving goals together. On the other hand, only 35% of the instructors think the same as administrative staff. Based on the data and questions asked, we can conclude that the boards of directors' and instructors' ideas are not parallel to each other and their ideas differ from each other.

Creating Brainstorming Culture

80% of the administrative staff claimed that they supported brainstorming and they actually practiced it with others. However, only 35% of the academic staff attending the survey thinks that administrative staff is using this method and the rest (63%) think that administrative staff is not sufficiently using brainstorming as a tool.

In general, academic staff thinks that the administrative staff is not successful at creating and supporting these tools because of cultural differences.

4th Phase: Analyzing Knowledge

As one of the stages of knowledge management, questions asked for tools that are used for analyzing knowledge reflect the participants' ideas in the following table (Table 5).

Table 5.

Knowledge Management Tools in Order to Use as Analyzing Knowledge

Time Period	Knowledge Management Tools	University Managers Who are Competent	%	University Academician Who Find Managers Insufficient	%
Evaluation of Knowledge	Internal and external controls	19	76	15	28
	Interviews with students and teaching assistants	22	88	45	86
	Comparisons with other universities applications	21	84	19	37
	Evaluation of reports	19	76	10	19
	Interview with the graduate students and former teaching assistants	17	68	7	13

Internal and External Inspections

76% of the participants who attended the survey as administrative staff claimed that they have practiced internal and external inspections. It can be concluded that the administration is sufficient for internal and external inspections. However, only 28% of the academic staff thinks that administrative staff is sufficient about this, and 72% of the academics think that their administrative staff is actually not sufficient at this method of inspections.

Results shows that the boards of directors are not using this tool well enough and with teaching assistants their answers are not parallel and did not agree with the board of directors.

Evaluation of Data

76% of the participants who are in administrative positions use the evaluation of data tool. Surprisingly, 19% of the teaching assistants confirmed that the participants were rightly using this tool and they were competent.

To sum up, directors were not capable in obtaining results from the relevant reports and did not take any resources to put the relevant results right. There were disputes between the directors' and instructors' views.

Results and Suggestions

Knowledge management tool can be divided into four parts including the relevant suggestions.

I. Phase: Identifying Knowledge Deficiencies

Participants which are the place of directors, in order to ascertain the deficiency in knowledge, conduct meetings and try to ascertain the competency of the relevant meetings, the frequency of meetings, the subject matter of the meetings, and obtain knowledge about the deficiency in knowledge. However, the instructors commented that the relevant tool was not properly used by the boards of directors, also stated that the boards of directors were not conducting enough meetings. The meetings lacked detailed and uniform analyses of the relevant situation and also lacked the poor evaluation of the knowledge and feedback of

the teaching assistants. A proper meeting to enable them to identify the deficiency in knowledge was not conducted. After the commencement of the meeting, the clear difference in the opinions of teaching assistants and board of directors were observed. However, according to Arslangiray (2003), group members differing in opinions could be started at easily during the meetings.

Conducting brainstorming sessions were used in a way of establishing the competency of the boards of directors and instructors in relevant to the activities and helped identifying the deficiency in knowledge. Majority of the boards of directors stated they were not competent in the brainstorming sessions and could not use the relevant tool properly. The majority of the participants who are instructors commented that the sessions were not adequate, no brainstorming sessions were conducted, and no feedback was obtained from the people. Percentage-wise either the administrative staff or the academics staff has different opinions. According to Rawlinson (1995), these knowledge deficiencies could be easily solved by these brainstorming sessions.

From the knowledge management tools the most useful tool (Benchmarking) is the search between the competence in directors and the instructors, and the search for the best tool for this purpose. Instructors have added that the tool was never used properly. According to Koçel (2005), by using benchmarking procedure in the universities, they are trying to update the relevant expertise they have and also try to solve the relevant knowledge deficiency in the procedure.

Future scenarios knowledge management tool were developed and 16% of the participants were adequate in using this deficiency in knowledge management tool. Plans and suggestions were made for the next 10 years, and from these plans knowledge deficiency was observed. However, 84% of the participants were inadequate in using the relevant knowledge tool. This knowledge is a clear indication that the relevant knowledge management tool was not properly used and leads to confusion and impracticability between the instructors and directors.

II. Phase: Improvement and Buying of Knowledge

In the knowledge management phase, about improvement and buying of knowledge tool, 16% of the participants claim that they were using the relevant tool and partly putting this tool in practice. However, 84%

of the participants never used the relevant tool or used the tool inadequately. Serbest (2004) pointed out that developing universities at present should use research and development in order to develop themselves.

From the knowledge management tools obtaining education from abroad should be used and if needed experts in relation to the subject matter should be called to request guidance. However, obtaining education from abroad is not considered to be an ideal way and is considered that to be economic and rush decision used by the board of directors in order to avoid problems. Therefore, the difference in point of views of board of directors and instructors were established.

From the knowledge management tool, participants need to attend courses, conferences, and seminars to help solve deficiency of knowledge problem. Teaching assistants also confirmed that financially and academically this tool was not used by the academics and the administrative staff. Academicians used their own savings to attend the relevant activities including the seminars, courses, and found it to be very difficult to set the dates for the relevant courses.

The observational method of management knowledge tool is used to reach the main source of knowledge and observational method is effective. With observational method, they are able to observe knowledge in the main source. Observational methods are effective in order to improve and develop knowledge. The managerial position holders claim that they are adequately using this tool. However, according to the instructors, the boards of directors are insufficiently using this tool. They are not capable of following the latest changes in their environments. In addition to that, because there is not that much competition between universities, the boards of directors do not follow latest changes that much. This knowledge is a clear indication that the relevant knowledge management tool was not properly used and leads to confusion and impracticability between the instructors and directors.

III. Phase: Sharing Knowledge

Sharing knowledge management tool is used by the boards of directors in terms of continuous partnership and organizing work groups. The boards of directors use this method for the continuous development and improvement of knowledge. Instructors claim that the sharing of knowledge method is not used by the boards of directors sufficiently. They are

not sharing knowledge with instructors and are not in corporation with instructors. Due to factors such as cultural reasons, and highly competitive work place, they are afraid to take responsibilities and prefer not to co-operate with instructors. Instructors also claim that there is competition only when needed and interactions between the boards of directors and instructors are in terms of expert and apprentice. In addition to that, all the interactions are at individual levels and taking place in unplanned ways. We can conclude that there are differences between the ideas of instructors and the boards of directors. Team work is needed in terms of raising the quality of knowledge, raising the efficiency and following the latest changes in the environment. Today, ensuring the quality, productivity, growth, and external environment in which new information emerging in light of rapidly developing areas of team work required are specified (Sarihan, 1998).

Discussion groups in terms of knowledge management tool are used by the administrative staff in areas such as in order to form discussion environments, sharing of knowledge in these meetings, discuss the problematic areas, and obtain the best results with the help of this method in terms of knowledge sharing. Academic staff claim that due to differences between administrative members and academics such as cultural differences, it is difficult to use this method. Discussion groups are the major tool which shows the democratic level of both the nations and individuals (Yeşil, 2004a, s. 165). Accordingly, individuals should directly interact in discussion groups in order to understand the discussion group culture (Mendel-Reyes, 1998, s. 36-37).

IV. Phase: Evaluation of Knowledge

The evaluation of knowledge as knowledge management tool is used by administrative staff in order to monitor internal and external controls. As an internal control, student averages, instructors' satisfaction and personal development are used. On the other hand, as an external control, YÖK's evaluation in regular bases on whether universities are following rules and regulations are used. Academics can claim that administrative staffs are insufficient in internal controls. They are not following which books instructors are using, which topics they are teaching, and the evaluation of instructors' academic knowledge. As an external control, they claim that nobody comes from YÖK to evaluate ins-

titutions. However, YÖK comes in rare bases to control the boards of directors whether they follow the rules and regulations in management level. According to the instructors, administrative staff does not use this method adequately. Administrators and academics have differences in ideas and their way of thinking goes parallel.

Accreditation institutions used as an external control in developed nations. Universities work so hard in order to reach the standards of these institutions. Accordingly, there are always processes of continuous development. Students' and other departments' evaluations are used as an internal control. Accordingly, evaluations from these sources are used in the development and improvement of universities. Sullivan and Glanz (2005) suggest that in order to improve and develop institutions, raising the quality of students, implementing of external and internal controls are necessary.

Evaluation reports as knowledge management tool is used by administrative staff. Academicians make every instructor to write the end of semester reports and they evaluate these reports. On the other hand, they make surveys and interviews with students about topics such as courses and other regulations. As a result, they evaluate the results of these reports. However, they are not talking about the systems and ways to improve areas which have deficiency. Academicians claim that administrative staff is insufficient in the evaluation of these reports. They lack obtaining end of semester reports and make conclusions about these evaluations. Today, it is becoming more and more difficult to analyze the social and economic incidents as they get more complicated day by day. That's why we are facing with difficulties in social life (Karagöz & Ekici, 2005). Therefore, it becomes more difficult to gather analytical and numeric knowledge and to come up with solutions and conclusion to the statistics of these outcomes.

References/Kaynakça

- Agrawal, A. M. (2004, April). *Knowledge management application in higher technical institutions in India*. International Association for Management of Technology (IAMOT) 13th International Conference Proceedings, Washington. Retrieved June 12, 2004, from <http://arago.cprost.sfu.ca/~smith/conference/viewpaper.php?id=1180&cf=4>.
- Aktan, C. C. ve Vural, D. (2004). *Rekabet gücü ve Türkiye* (Rekabet Dizisi 3). Ankara: Türkiye İşveren Sendikaları Konfederasyonu.
- Arsllangiray E. (2003). Eğitimde bir özgüven ve demokrasi ortamı sessiz toplantı. *Ankara Üniversitesi Eğitim Fakültesi Dergisi*, 36(2), 89-96
- Beijerse, R. P. U. (1999). Questions in knowledge management: Defining and conceptualizing a phenomenon. *Journal of Knowledge Management*, 3(2), 94-109.
- Conceicao, P., Heitor, M., & Oliveira P. M. (1998). Expectations for the university in the knowledge-based economy. *Technological Forecasting and Social Change*, 58, 203-214.
- Connor, T. (2002). The resource based view of strategy and its value to practising managers. *Strategic Change*, 11(6), 307-316.
- Davenport, T. H., & Laurence, P. (1998). *Working knowledge: How organizations manage what they know*. Boston, MA: Harvard Business School Press.
- Demarest, M. (1997). Understanding knowledge management. *Long Range Planning*, 30(3), 374-384.
- Kalkan V. D., & Keskin, H. (2002, June). *A new theoretical quest for public administration and a preliminary research: Conceptualising knowledge management as an organisational process for public institutions, a comparison of Turkish public and private sector perceptions and use of knowledge management*. Proceedings of the 2002 IASIA Annual Conference, Public Administration between Globalisation and Decentralisation: Implications for Training and Education Distribution: IIAS (2004), İstanbul, Turkey.
- Karagöz, Y. ve Ekici, S.(2005). Sosyal bilimlerde yapılan uygulamalı araştırmalarda kullanılan istatistik teknikler ve ölçekler. *Cumhuriyet Üniversitesi İktisadi ve İdari Bilimler Dergisi*, 5(1), 25-43
- Karasar, N. (1998). *Bilimsel araştırma yöntemi* (sekizinci baskı). Ankara: Nobel Yayın Dağıtım.
- Kidwell, J. J., Linde, K. M. V., & Johnson, S. L. (2000). Applying corporate knowledge management practices in higher education. *Educause Quarterly*, 4, 28-33.
- Koçel, T. (2005). *İşletme yöneticiliği* (onuncu baskı). İstanbul: Arkan Ltd.
- Kogut, B., & Zander, U. (1996). What firms do: Coordination, identity and learning. *Organization Science*, 7(5), 502-518.
- Loh, B., Tang, A. C., Menkhoff, T., Chay, Y. W., & Evers, H. D. (2003). *Challenges and prospects of applying knowledge management in university research: The case of the Singapore Management University*. Work in progress. Retrieved June 12, 2004, from <http://www.uni-bonn.de/~hevers/papers/Loh-Tang-Menkhoff-Chay-Evers2003-new.pdf>
- Mendel-Reyes, M. (1998). A Pedagogy for citizenship: Service learning and democratic education. *New Directions for Teaching and Learning*, 73, 31-38.

- Mikulecka, J., & Mikulecky, P. (2000, September). University knowledge management issues and prospects. In Djamel A. Zighed, Jan Komoroski, Jan Zykwow, *Principles of Data Mining and Knowledge Discovery 4th European Conference Proceedings, PKDD* (pp. 157-165). Lyon, France: Springer-Verlag Publisher, pp.157-165.
- Miles, M. B., & Huberman, A. M. (1994). *Qualitative data analysis: An expanded sourcebook* (2nd ed.). California: SAGE Publications.
- Mothe, J., Gertler, M., Landry, R., Niosi, J., & Wolfe, D. (2000, September). *Knowledge management: The new challenge for firms and organizations*. Prepared by the Innovation Systems Research Network (ISRN), A Rapporteurs' Report on the OECD High Level Forum, Ottawa, Canada.
- Muratoğlu V. (2005). *Eğitim örgütlerinde bilgi yönetimi stratejileri*. Yayımlanmamış yüksek lisans tezi, Fırat Üniversitesi, Sosyal Bilimler Enstitüsü, Elazığ.
- Nonaka, I., & Takeuchi, H. (1995). *The knowledge-creating company*. New York, NY: Oxford University Press.
- Nonaka, I., Toyama, R., & Konno, N. (2000). SECI, Ba and leadership: A unified model of dynamic knowledge creation. *Long Range Planning*, 33(1), 5-34.
- Numprasertchai, S., & Igel, B. (2004). Managing knowledge through collaboration: Multiple case studies of managing research in university laboratories in Thailand. *Technovation*, Vol. 25 No.10, pp.1173-1182.
- Oosterlinck, A. (2002). *Knowledge management in post-secondary education: Universities*. OECD working paper. Retrieved June 12, 2004, from <http://www.oecd.org/dataoecd/46/21/2074921.pdf>
- Perez, J. R., & Pablos, P. O. de (2003). Knowledge management and organizational competitiveness: A framework for human capital analysis. *Journal of Knowledge Management*, 7(3), 82-91.
- Prahalad, C. K., & Hamel, G. (1990). The core competence of the corporation. *Harvard Business Review*, 68(5-6), 79-91.
- Rawlinson J. G. (1995). *Yaratıcı düşünme ve beyin fırtınası*. İstanbul: Rota Yapım Tic. Şti.
- Rowley, J. (2000). Is higher education ready for knowledge management? *The International Journal of Educational Management*, 14(7), 325-333.
- Sarıhan, İ. H. (1998). *Teknoloji yönetimi*. İstanbul: Desnet.
- Serbest, A. H. (2004, Mayıs). *Mühendislik fakülteleri altyapısı ve ar-ge kaynakları*. 1. Ulusal Mühendislik Kongresi'nde sunulan bildiri, Eski Foça, İzmir. 20-21 Mayıs 2004.
- Sullivan, S., & Glanz, J. (2005). *Supervision that improves teaching. Strategies and technics* (2nd ed.). California, CA: Corwin Press.
- Tavşancıl, E. ve Aslan, E. (2001). *İçerik analizi ve uygulama örnekleri*. İstanbul: Epsilon Yayıncılık.
- Wijetunge, P. (2002). Adoption of knowledge management by the Sri Lankan University librarians in the light of the National Policy on University Education. *International Journal of Educational Development*, 22, 85-94.
- Yahya, S., & Goh, W. (2002). Managing human resources toward achieving knowledge management. *Journal of Knowledge Management*, 6(5), 457-468.

Yeşil, R. (2004a). Tartışma eğitiminde okul ve öğretmen rolü. *Eğitime ilişkin çeşitlemeler* (Editör: Musa Gürsel). Konya: Eğitim Kitabevi. ss. 165-181.

Yıldırım, A. ve Şimşek, H. (2005). *Sosyal bilimlerde nitel araştırma yöntemleri* (ikinci baskı). Ankara: Seçkin Yayıncılık.

Yim, N. H., Kim, S. H., Kim, H. W., & Kwahk, K. Y. (2004). Knowledge based decision making on higher level strategic concerns: System dynamics approach. *Expert Systems with Applications*, 27, 143-158.

Yli-Renko, H., Autio, E., & Tontti, V. (2002). Social capital, knowledge, and the international growth of technology-based new firms. *International Business Review*, 11, 279-304.

Zack, M. H. (1999). Developing a knowledge strategy. *California Management Review*, 41(3), 125-145.

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