

Investigating the role of organizational learning and organizational innovation in knowledge management and firm performance relationship

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ABSTRACT: The present study sought to examine the relationship between knowledge management and organizational performance. Main focus of research is to make clear the role of innovation and organizational learning in the relationship between knowledge management and organizational learning. The populations of this study are all managers and experts in Guilan Province which is one of the most important industries in the country. Data analysis was based on a sample of 339 questionnaires. Pearson correlation and hierarchical regression analysis with SPSS software were used to evaluate hypotheses and confirmatory factor analysis with Lisrel software was used for confirming measurement's models. The results suggest that there is significant positive relationship between knowledge management, innovation, organizational learning and organizational performance. Organizational learning mediate the relation between Knowledge management and organizational innovation, also organizational innovation mediate the relation between organizational learning and organizational performance.

Keywords: Knowledge management, organizational performance, organizational learning, organizational innovation

INTRODUCTION

The most basic characteristic of intelligent organization of century 21 is on information and knowledge. Unlike old organizations, present organizations has advanced technology which is required getting, managing and receiving knowledge and information for improving performance, management and following Inexhaustible changes. Knowledge is a powerful device that can make changes and innovation in the world. (Rostami et al, 2012)

By reviewing the research literature we result although in many surveys separately we check the relation of variables in this research but in each of these studies all of these factors don't check simultaneously.

LITRATURE REVIEW

The concept of innovation as a vital device for making value and strength of competition's organizations in environment is so different with more complexities. First point of innovation to knowledge, expert and reliability of human resource as the main entrance in process of making innovation and value is dependant. (montes et al, 2004) there is a point that shows the organizations cannot act in knowledge making so that in relation of its members happen the knowledge making and on the other hand there is a side knowledge in people's mental that is not common and has less value. (Ahmadian et al, 2011) studies about innovation show that with integration of internal organizational knowledge and external organization of innovationis improved. (Taleghani et al. 2012) Grant says that one of the ways of improving continuous innovation can form organizational knowledge again. (Taleghani et al, 2012) by attention to said points of following theory is said;

First Hypothesis: between knowledge management and organizational innovation there is a positive and meaningful relation.

In changing economics many of organizational try to keep competition state or continue their life. For developing and execution the organizational learning is reported as one of saved strategic devices long term success of an organization. (Senge, 1990) pillar and et al (2005) says that knowledge and creating or giving it is with compounding in organization to one organization to one main strategic source for organizational learning. Organizational learning of one dynamic process based on knowledge bases that shows moving among different surfaces from personal level to group source and then organizational level and repeated returning (Rostami et al, 2012) by attention to said points is said following theory.

Second Hypothesis: between knowledge management and organizational learning there is a meaningful and positive relation.

The success management of knowledge by its effect is determined on organizational action so that the understanding of how effective is knowledge management and its relation with organizational growth which is useful with organizational growth. Different ways of knowledge management on coding amount, availability and usefulness of knowledge is affected and this effect finally causes increasing the organizational act. (Alhavari, 2004) For relating knowledge management programs and organizational act, conveying organization aims and working process is needed. Knowledge management is a commercial process that can help to company to achieve to its goals. The differentiation between available state and favorite state affect on organizational act and help them. (Alhavari, 2004) according to Danport (1999) that the activities of knowledge management are related to interference activities that affect on financial results that can show following theory.

Third Hypothesis: between knowledge management and organizational action there is positive and meaningful relation.

Innovation means creating and using ideas, processes and new products and organizational learning process on educating, publishing and using knowledge that this process is related with organizational innovation. Creating process of organizational knowledge is besides organizational learning which one of innovation basis is for finding new ways for solving problems, so learning capabilities is the main index of organization and innovation. (Moradi et al, 2013) on other hand organizational learning support innovation, ideas and new knowledge and capabilities power and its executing is increased (Hajipour, kord, 2011) reviewing literature shows working on organizational innovation in last decades is with checking the role of organizational learning. In most researches being positive relation between organizational learning and organizational innovation is determined. Based on following theory is said.

Fourth Hypothesis: between organizational learning and innovation there is positive ad meaningful relation.

According to role and positive effect that knowledge management has on knowledge management (first theory) and by checking the role of knowledge management on organizational learning (second theory) and effect of organizational learning effect on innovation (third theory) can be defined fifth theory of the research:

Fifth Hypothesis: organizational learning in relation between knowledge management and organizational innovation had variable role organizational innovation. Researchers tried to relate organizational learning with commercial results in relative organization but these actions are restricted and this relation as one of the biggest challenges is accounted. In surveying 190 spanish organization these writers understood that organizational learning with innovation, contraction and financial and economic results of organization has a positive relation however other researchers know the relation between organizational learning and action which is obvious. (Allameh, Moghaddami, 2009) so it is needed in each organization there are devices for improving learning capacity of organization and the effect of these devices is assessed(Herrera, 2007) based on sixth theory of research is determined:

Sixth Hypothesis: between organizational learning and action there is meaningful and positive relation.

Nowadays with dynamic and complicated jobs doing them is needed learning and organizations in future to know how commitment and capacity of staff is in knowing better of their needs. (Hureley, Hult, 1998) organization is committed to learning is probably with getting the power if changing technology in products and processes and innovation power cause improving its action. The power of innovation is the most important factor which is determined by action. Corporations with capacity of high innovation can b adopted by environmental and development of new powers to conflict and high action. (Hult, Ferrel, 1997) according to these points that innovative effects on organizational action and seventh theory of research is by following form:

Seventh Hypothesis: between organizational innovation and action there is a positive and meaningful relation. According to positive effect that organizational learning has on organizational innovation (fourth theory) and also on organizational action (sixth theory) and also the role of organizational action (seventh theory) the eighth theory of present survey is presented in this way:

Eighth Hypothesis: organizational innovation in relation between organizational learning and action has a variable role.

MATERIALS AND METHODS

Research methodology in this research in point of objective, useful and in point of descriptive is relative. Food cooperation of Guilan province as statistical society is conveyed and managers and exerts in these organs will select. Based on information of industry organization of province has accounted 202 companies. According to doing conveys the number of managers and experts of this company is 20 people. Bu use of sampling Kokeran formula in base of error 0.05 and p equal to 0.5 the amount of 351 people is accounted.

The questionnaire of research involved in 42 questions. Checking the questionnaire by use of analysis is determining by helping Lizrel software is conveyed. The strength of questionnaire by use of Kronbakh Alpha is conveyed that for related questions to knowledge management characters, organizational innovation, organizational learning, organizational action and all questionnaires is equal to 0.87, 0.91, 0.85 and 0.79 percent. For analysis of collecting data from factor analysis is confirming of structure and Pierson and regression relatives for checking main theories of research.

Confirmatory factor analysis and fitting models

The results related to confirmatory factor analysis of index relate to three factors. Results show that all factor loadings and indexes like statistics T are expectable. All questions related to four factors have factor loadings higher than 0.40 means the amount of factors of questions are expectable. Also the amount of T for all questions more than 1.96 means all relations between each factor with index.

Also fitting models of assessment is related to all factors shows that models related to each factor are suitable. Because amount of Kai do o free grade (NC) is in suitable extraction between 1 and 3. Amount of RMSEA below 0.8 and RMR close to zero and the amount of other index is more than 0.8 that all are suitable amount.

Analysis research theories

For conveying research theories from Pierson relative test and regression analysis we use hierarchical. Results related to relative analysis and regression in table 2 and 3 is given.

Table 1. Results given from Pierson relative test

Variable	R	Sig.	Result
Dependent: KM Independent: Organizational innovation	0.743	0.000	Accepted
Dependent: KM Independent: Organizational learning	0.611	0.000	Accepted
Dependent: KM Independent: Organizational Performance	0.984	0.000	Accepted
Dependent: Organizational learning Independent: Organizational innovation	0.510	0.000	Accepted
Dependent: Organizational learning Independent: Organizational Performance	0.751	0.000	Accepted
Dependent: Organizational learning Independent: Organizational Performance	0.655	0.000	Accepted

According to regression test results based on analysis results ANOVA relation is a line between dependant and independent variable in all processes confirm. According to meaningful level lower than 0.05 regressions between knowledge management and organizational learning and organizational learning and innovation confirm. So the first cause for each of two theories is done. Also according to meaningful level lower than 0.05 regressions between organizational learning and innovation and organizational innovation and organizational action confirm. So the second cause also is done for all two theories. Finally it will be like that according to third cause in first model has a meaningful relation between dependent and independent variable and when mediator variable enter to the equation in second model. This relation according to meaningful variable is meaningless it means the relation stopped and mediator role of organizational learning and innovation in related theories is registered. When with entrancing the mediator variable the relation among dependent and independent variable stopped we can say entering variable fully has a mediator role in relation. According to the results of regression analysis and pierson relative theories 1 to 8 of research in assurance level 99 percent is confirmed.

Table 2. Results given from regression test hierarchical

Dependent Variable	Input Variable	B	S.E.	B	t	Sig.
Learning	Constant	0.508	0.188	0.561	18.61	0.000
	KM	0.558	0.051		4.121	0.000
Innovation	Constant	2.854	0.171	0.25	15.656	0.000
	Learning	0.213	0.045		4.727	0.000
Innovation	Constant	1.516	0.108	0.743	14.075	0.000
	KM	0.597	0.029		20.356	0.000
Innovation	Constant	0.113	0.239	0.205	1.169	0.332
	Learning	0.175	0.030		5.881	0.000
	KM	0.587	0.028		0.731	0.951
Innovation	Constant	2.854	0.171	0.25	656.15	0.000
	Learning	0.213	0.045		4.727	0.000
Performance	Constant	0.133	0.175	0.734	2.760	0.000
	Innovation	0.937	0.047		19.845	0.000
Performance	Constant	3.548	0.183	0.151	19.357	0.000
	Learning	0.046	0.050		4.929	0.000
Performance	Constant	2.680	0.226	0.228	11.864	0.332
	Innovation	0.264	0.070		1.773	0.000
	Learning	0.541	0.090		0.481	1.042

RESULTS AND DISCUSSION

The findings of research show that organizational learning is effective on organizational innovation. Also organizational innovation on organizational action has a positive and meaningful effect in relation between organizational learning and action and role of mediator variable is important. In fact organizational learning with effect on improving in organization causes some suggestions. According to role of knowledge management in innovation improving, learning and organizational action in organization is important. According to role of people in transferring organizational knowledge for improving innovation and motivation of staff can understand the importance of role of teaching, programs and teaching periods, encourage and organizational rewards. Attracting and training working forces with innovation and high innovation and works in using their strength such as using storm techniques in organization and having teaching periods for improving their strength. Having systematic point of view and open environment of learning has trusting and responsibility among people is improved and this responsibility can lead to increasing its action.

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