A Research on the Perception Level of the Success Criteria of Learning Organizations among a Group of Physicians and Nurses

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Abstract

According to results in research considering learning organizations the humankind’s unused potential can be brought to light if employees achieve personal development. Making the continuous development a way of life will improve the performance of employees and the performance of the organization in particular. A company’s philosophy based on continuous learning will lead to an advantage for the learning organizations, which constantly increase their abilities of directing their future in the competition. We believe that the ‘learning organizations’ is a management model that should be employed particularly in the health care institutions. This way, each topic can be examined, tested for improvement and continuous development can be maintained. Thus, the purpose of our project is to make the common vision, personal ability, learning in a team and systematic thinking accepted as basic skills and to define the perception level of the success criteria of the learning organizations among the groups of physicians and nurses working in the health care organizations, which should be learning organizations. This project consists of two parts: a theoretical part and a fieldwork. The theoretical part uses scientific books, articles, and researches. As fieldwork, a survey verifies whether physicians and nurses attending learning organizations match the criteria of success. The survey is conducted in a group of private hospitals in the city of Istanbul, Turkey.

Keywords: Learning Organizations, Success Criteria, Physicians, Nurses, Hospitals

1 Learning Organizations

Learning organization concept arose in the early 1990s and has become one of the modern management philosophies, which trace to the present day. In the 1990s, the number of firms that identify themselves as learning organizations has significantly increased. The companies such as General Electric, Johnsonville Foods, Quad Graphics, and Pacific Bell in the United States; Sheemess Steel, Nokia, Sun Alliance, and ABB in Europe; Honda and Samsung in Asia have been among the early pioneers [Marquardt 2011].

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Learning organizations aim learning new information constantly, benefit from the information they learned, re-evaluate that information in practice, and benefit from the results. They also provide for the use by rendering all of the other processes that occur with system thinking.

Learning organizations intend to function with the help of courses, which may contribute to employees’ personal development, so that they conduce toward innovation and transformation. The transformation should certainly not be only among individuals, it should be revealed among all employees in the organization, so that team performance would be increased. Thus, the company may have a competitive advantage in the market, in which it operates.

The main purpose of the learning organizations is to hold the competitiveness and the productivity at current levels at first and after that to increase them, when there are ambiguous market conditions and unclear technological development circumstances. Senge indicates that the important thing in organizations is not "change", but "transformation". The learning organization concept carried out the concept of "transformation" rather than "change". At this point, it is useful to highlight the difference of the concepts of "change" and "transformation". Transformation takes place in essence; change however is the reaction, shown to external influences. While "change" accommodates the company to the changing conditions, "transformation" creates change by hosting the dynamics of the change within.

Therefore, a learning organization aims to become a dynamic and a constantly evolving organization that is open for learning and personal development, in which employees can clearly demonstrate their ideas. It is very important in terms of the learning organization to question of each subject in all processes, to ensure compliance with the objectives and to emphasize the necessity of continuous learning. Lifelong learning can be explained essentially as people’s awareness of new skills for learning needs, acquirement new information and development of new behaviors and approaches in their lives from 'cradle to grave' (Garcarz, Chambers, and Ellis, 2003).

If the awareness of continuous learning cannot be created in a company, the existence of that company cannot even be a matter of discussion in today’s conditions. Therefore, the development should be started first from the employees within the system. The company must ensure people in the company to develop themselves, trainings should be organized that will help them to realize their weaknesses and strengths and as a result of these trainings people must perceive the organization as a system. A learning organization encourages learning at all stages of the organization, making the development of its employees, open communication and constructive dialogue a priority (Koçel, 2014). Thus, it opens the way for organizational learning by creating an environment that allows the development of individuals, who have the potential to create a system within a process of constant transformation.

2 Basic Principles of Learning Organizations

According to Senge (1990), there are five disciplines of learning organizations. (In this sense, discipline refers to the systematic of science or an understanding of a thought). These disciplines are considered as personal mastery, mental models, shared vision, team learning, and systems thinking. It is vital for an organization to possess all these five disciplines, developing together. It is much more difficult to integrate all the disciplines together rather than implementing them separately. However, the organizations that can achieve this will be learning organizations. For this purpose, the fifth discipline ‘systems thinking’ will help the organiza-
tions to bind other disciplines together and to combine them as a whole. Organizations may only learn through individuals. Individual learning does not guarantee organizational learning, but without individual learning, organizational learning cannot be realized.

2.1 Personal Mastery

People with high personal mastery level constantly improve their ability of creativity. From their continuous learning effort arises the spirit of learning organization. Learning organizations are characterized by the presence of a high degree of empowerment and personal learning (Sarlik 2010).

Personal mastery is a discipline that constantly provides openness and depth to the views of people, develops patience, and allows people to see the facts objectively. Thus, it forms a basis to the learning organization. The willingness and the capacity to learn of an organization cannot be greater than its own members (Senge 1990).

People in high personal mastery levels are in a constantly learning trend. Senge (1992), indicates that personal mastery is not a characteristic owned by people, but a process and a lifelong discipline. It also encourages the personal motivation to learn how activities affect an organization.

2.2 Mental Models

Mental models affect our conception of the world as well as our actions as ingrained assumptions, generalizations, and even imaginations, which are stuck at the back of our minds. For competitive advantage mental models create a unique resource for managers, by helping them to clarify assumptions, to explore the contradictions in assumptions and to think about new strategies based on new assumptions.

According to Senge (1990), even though people do not act upon the theory they defend, they act upon the mental models they possess. The more people reveal their different points of view of the world and develop efficient discussion capabilities, the more their decision-making processes go through a transformation. Mental models have the ability to eliminate the prejudices found in people’s mentality. Developing the capacity to work with mental models in an organization requires either the development of new skills or the implementation of institutional innovations, which will ensure these skills in everyday life.

Mental models are ”equivalent to the concept of paradigm because both paradigm and mental models represent an integrative set of ideas and practices that shape the ways people view and interact with the world.” (Senge 2012). Managers are often locked into a mentality due to which they inclined to separate out information that does not fit their current paradigm. In order to avoid this, managers have to break the old paradigm and stay outside their critical mental models to conform to a varying reality. As managers become ”paradigm-busters” (Senge 2012), they are prepared for constant challenges and have an imagination of ‘new ways to understand the world that do not logically follow from past beliefs’ (Wit and Meyer 2004).

2.3 Shared Vision

Shared vision is vital for learning organizations, because it provides focusing and required energy for learning. Although it is possible to learn how to comply with others without vision,
creative learning only takes place when people give effort to achieve something that is very important for them. Shared visions emerge from personal visions. Organizations, which give importance to have a shared vision, create the environment that allows employees to develop continually their own personal vision.

Personal mastery is the foundation of vision development. People with personal mastery focus on the realization for the vision and can take the necessary decisions with courage. The vision of a company can become effective, only when information is shared throughout the organization ([Senge](1990)). Shared vision also encourages future works.

### 2.4 Team Learning

Teams have a very important role in learning organizations, where continuous learning and regeneration for people is within possibility. In such an environment, people are in a mutual communication continuously. Today, new technologies, new tools, new opportunities, and cooperation are needed in the provision of health services in an effective and efficient manner.

According to the Joint Commission on Accreditation of Healthcare Organizations [Anonymous](2002), teamwork is defined as a basic parameter to ensure optimum quality and safety for patient care.

In some studies, the four benefits of the efficacy of teamwork are shown as: learning and development, resource management, task performance and communication. Moreover, teamwork in health care has demonstrated very successful results ([Ingram and Desombre](1999)).

Through techniques like dialogue and skillful discussion, teams transform their collective thinking, learning to mobilize their energies and ability greater than the sum of individual members’ skills. Team learning builds on the discipline of personal mastery. It is a process for developing the capacity of a team to reach the goals, which its members really want. While individual learning at one level is important, it is inconsequential at another level. Individuals may learn, but for the organization as a whole, there is no organizational learning. Therefore, teams become the essential ingredient, a "microcosm" for learning ([Senge](1990)).

### 2.5 Systems Thinking

Development of the five disciplines in one organization is vital. Integration of all disciplines with each other will be much more difficult than the implementation of each individually. ([Senge](1992)) addresses "systems thinking", which is based on "holistic thinking” as the fifth discipline, because he accepts that systems thinking fuses disciplines together and combines disciplines as a whole.

Systems thinking has its roots in the General System Theory, which was advanced by Ludwig von Bertalanffy in the 1940s and furthered by W. Ross Ashby in the 1950s. This theory is telling us that the whole is more than the sum of its components by empowering other disciplines. In addition, this discipline shows us that the essential characteristics of a system are not determined by the sum of its parts, but by the process of interactions between those parts. Thus, systems thinking is fundamental to any learning organization as it is used to implement the disciplines. Without it, each of the disciplines alone would not achieve their goals consequently.

System thinking is the reference point of a learning organization, integrating the four disciplines and is a way of discovering solutions to modern complex problems. This discipline
enables interrelationships between systems and teams; it concurrently allows the organization to understand the external environment.

3 Success Criteria in Learning Organizations

Measuring learning in learning organizations is very difficult. However, the positive developments that occurred in the organization can provide information about whether the organization has succeeded in becoming a learning organization.

The most effective behaviors for success criteria of an organization in terms of learning can be ranked as; people’s communication style, their attitude that they exhibit in the presence of changes within the organization, the use of information within the organization, their attitude mistakes and the reward system within the organization.

Apart from the rules for developing behaviors there are also a set of criteria for a learning organization, to be established within the organization, to become successful. These criteria are:

- **Spread Levels of Strategy and Vision**: One of the success criteria of learning organizations is strategic thinking and vision. Shared vision is of vital importance for learning organizations, because it provides focus and energy for learning. Although it is possible to learn how to comply with the others without vision, creative learning occurs only when people make an effort to achieve something that is very important for them. As information is renewed, vision is constantly revised and improved. However, it is important sharing the created strategies and visions with people and having these visions embraced by the people in an organization. The vision of the organization should be conveyed to all employees and make them aware of the vision. A vision teaches employees how to concentrate on learning in the organization.

- **Knowledge Acquisition and Information Sharing**: Organizational learning is defined as to collect information and methods by companies about their activities and to organize and use this information to increase the efficiency of the employees. According to Fiol and Lyles (1985), organizational learning is "the improvement of activities by understanding the created and developed knowledge". [Huber (1991)] indicates that learning depends on the effectiveness of organizational behavior, obtained via processing information in an organization. Therefore, organizations, which encourage organizational learning and forming units to develop strategies, have been named as learning organizations. Managers in learning organizations must constantly be busy in activities aimed at creating new knowledge and should provide the necessary environment for the formation of these activities.

- **Change Management and Perspective to Change**: Changes in organizations refers to transportation of any event or activity from one point to another. The constant change represents a recurring change in the circumstances related to the organization or the person bringing the organization or the person to a new position.

- **Individual Development and its Contribution to Organizational Development**: Consistent development is shown as one of the basic concepts of learning organizations.
Each individual of the organization is encouraged to learn, methods are created for acquiring knowledge and skills for all employees, and learning is realized through individuals (Argyris and Schönb 1996). Managers should create an environment that will give employees opportunity to improve themselves and facilitate learning.

- **Learning with Experiences and Perspective on Mistakes**: Learning occurs with the addition of new information on the existing information. Organizations should review their achievements and failures regularly and evaluate them in a systematic manner because they should be able to record the obtained results in a way that all employees can attain. Additionally, the lessons learned from the mistakes in an organization provide learning as well. Experiences should be transferred to other employees to avoid a repetition of the same mistakes. In a learning organization, employees should not be punished for the mistakes they make, but they should be able to take lessons from them.

- **Creating Organizational Memory**: All information obtained in the organization, is stored in the memory of the organization to be used again where necessary. It seems very important to establish the organizational memory to access the information and use them when required. It is the same for outdated information as well. Organizational memory leads to a mechanism for reducing costs in the organization and for effective decision-making.

- **Rate and Compliance of Technology Utilization**: Learning organizations use technology to obtain information, use information, store information and transfer it to all the employees. Information and technology systems used in learning organizations are defined as systems, which use, obtain, develop, regulate, and store information in memory for future use. Information system in a learning organization trains employees, provides coordination and cooperation in working with other employees.

- **Supporting and Rewarding Employees**: A tie will be established between organization and the individual by providing an environment for achieving self-growth, and rewarding success. As a result, employees will show more effort in order to create a learning organization.

- **Role of Leader and Team Work in Learning Organization**: In learning organizations, managers are required to possess a perspective based on general success and achievement within the organization, rather than on individual success and achievement. This perspective brings with it a leadership concept that is unique to learning organizations. Leadership is obtained through personal traits, rather than through hierarchical position, and it endures its influence with the factors of creativity and change. Learning organizations, within the scope of continuous change philosophy, aim to achieve information exchange within the organization through keeping its communication channels open and empowering its employees. Garvin, Edmondson, and Gino (2008) noted that behaviors of powerful leaders develop organizational learning.

- **Systems Thinking**: Systems thinking is an integral concept within the organization. Systems thinking considers all activities within all processes of the organization, which seem irrelevant to each other, as a whole. Systems thinking is the one that holds other disciplines together. Systems thinking keeps other disciplines ready to use by integrating
them. Systems thinking tries to strengthen other disciplines (personal mastery, mental models, shared vision, team-learning), and thus, provides more contribution to the organization. Specifically, a study by Akhtar, Arif, Rubi, and Naveed (2011) noted that only two dimensions of organizational learning had positive impact on organizational performance, namely inquiry and dialogue and systems connection. Supported by Jyothibabu, Farooq and Pradhan (2010), inquiry and dialogue promotes thinking collectively and communication which contributes positively to organizational performance. Additionally, systems connection had a similar impact on organizational performance as employees were found to be well-versed internally and externally with their surrounding environments and were able to establish link between the two (Akhtar, Arif, Rubi, and Naveed 2011).

4 Learning Organizations in terms of Hospitals

Today, the importance of new technology, new instruments, new applications, and knowledge has been important in order to provide efficient healthcare services. Among the services that rely on knowledge, healthcare services might be the most important services. Healthcare employees, who carry these knowledge-intensive, labor-intensive, and technology-based services, must be open to change and innovations in order to achieve success.

Qualitative healthcare service could only be achieved, by the leadership of managers, physicians, nurses, and other healthcare personnel. Leadership in healthcare services is important in terms of following innovations and adapting to the current situations. In order to provide qualitative healthcare services and work efficiently, healthcare employees need leaders, who are cooperative, empowering, and good communicators.

Another way of increasing efficiency and effectiveness is developing new organizational structures. Difficulty of struggling with increasing costs and varying quality makes continuous research and continuous learning obligatory, thus, it forces hospitals to become learning organizations (Mahler 2007). It is believed that introducing a learning culture in health care organizations could improve the quality of professional practice, satisfaction, lifelong learning, and patient care, while also lowering costs (Bell, Robinson, and See 2013). However, despite the impressive documentation on learning organizations, studies on this topic in health care settings remain scarce in the current literature (Bell, Robinson, and See 2013). Health care professionals are also in need of knowledge since their practice requires lifelong learning in order to improve their competencies and provide effective and quality care for their patients (Tsai 2014).

Therefore, hospitals must be encouraged to be learning hospitals through developing and generating learning individuals, groups, and learning culture.

The process of becoming a learning organization for hospitals consists of three steps. The first step is based on developing learning individuals. The second step is developing learning teams. Lastly, the third step is establishing the learning organization. Organizations, in which these steps are not achieved, cannot be named as learning organizations. Creating a learning organization will be possible if these three steps are completed and internalized. Organizational learning emerges through shared knowledge, understanding, and behavioral scripts, and it ends up with organizational gain (Koçel, 2014).
5  Research

5.1  The Aim of the Research

The aim of this study is to measure the perception level of success criteria and to find out whether there is a difference between the perception levels of success criteria between doctors and nurses in learning organizations. Questionnaires were distributed to 404 doctors and nurses working in three foundation owned hospitals in Istanbul.

The hypotheses used are as follows:

- H1 : There is a difference between the perception levels of success criteria of Physicians and nurses.
- H2 : There is a difference between the perception levels of success criteria according to tenure.
- H3 : There is a difference between the perception levels of success criteria according to position.
- H4 : There is a difference between the perception levels of success criteria according to gender.

5.2  The Design of the Research

Explanatory and analytical research design has been used in this study. Since it is carried out in the natural environment of the hospitals, it is a field survey. The questionnaire consists of two parts: First part includes demographic question and the second part includes perception levels of success criteria. Second part of the questionnaire was prepared by the author based on the basic principles of learning organizations and success criteria variables advocated by Senge. Likert scales were used for the items in the questionnaire with five point scale (“totally agree”, “agree”, “undecided”, ”disagree” and ”totally disagree”).

5.3  Unit of Analysis

The unit of analysis of this research is individuals, who are the physicians and nurses of the foundation-owned hospital group.

5.4  Method

The data received from the questionnaires returned by the doctors and nurses from the above-mentioned hospitals were subjected to statistical analysis using SPSS(21.0) Program. Reliability test (Cronbach alpha), factor analysis and t-test was used in the analysis of the data.

5.5  Analysis of Results

Out of 404 questionnaires 385 questionnaires were filled properly; therefore 385 questionnaires were used for statistical analysis. The reliability coefficient of the questionnaire was found to be 0.951. Demographic characteristics of 385 people in total are shown in Table 1.
Reliability analysis coefficient (Cronbach Alpha) of perception level of success criteria within learning organizations for physicians and nursing occupations is determined as 0.951, which refers to a high internal consistency.

It is seen that questionnaire items are related to each other, and, thus, they are forming groups among themselves. The items gathered under a common dimension are named as factor. Five factors were found according to the factor analysis done in this study. Variables having eigenvalues greater than 1 were taken into consideration.

As it is seen in Table 2, KMO measurement value and Bartlett test results are significant for factor analysis. As it is seen in Table 3, the five factors found in factor analysis explain 53.744% of the total variation.
Table 3: Obtained Factors in Factor Analysis

<table>
<thead>
<tr>
<th>FACTORS</th>
<th>EIGENVALUE</th>
<th>PERCENTAGE OF VARIANCE</th>
<th>CUMULATIVE PERCENTAGE OF VARIANCE</th>
</tr>
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<tbody>
<tr>
<td>1</td>
<td>14.687</td>
<td>31.249</td>
<td>31.249</td>
</tr>
<tr>
<td>2</td>
<td>3.338</td>
<td>7.101</td>
<td>38.35</td>
</tr>
<tr>
<td>3</td>
<td>2.847</td>
<td>6.058</td>
<td>44.408</td>
</tr>
<tr>
<td>4</td>
<td>2.548</td>
<td>5.421</td>
<td>49.83</td>
</tr>
<tr>
<td>5</td>
<td>1.84</td>
<td>3.914</td>
<td>53.744</td>
</tr>
</tbody>
</table>

It was seen that the five factors are statistically significant, and they are normally distributed. Thus, parametric tests were applied.

<table>
<thead>
<tr>
<th>FACTORS</th>
<th>TESTS</th>
<th>VARIABLE</th>
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</thead>
<tbody>
<tr>
<td></td>
<td></td>
<td>GENDER</td>
</tr>
<tr>
<td></td>
<td></td>
<td>TITLE</td>
</tr>
<tr>
<td></td>
<td></td>
<td>POSITION</td>
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<td>GROWTH FACTOR</td>
<td>LEVENE TEST</td>
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<td></td>
<td>T TEST</td>
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<td>VALUE OF SIGNIFICANCE</td>
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<td>TEAM FACTOR</td>
<td>LEVENE TEST</td>
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<td></td>
<td>T TEST</td>
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<td></td>
<td>VALUE OF SIGNIFICANCE</td>
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<td>STRATEGY FACTOR</td>
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<td></td>
<td>T TEST</td>
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<td>T TEST</td>
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<tr>
<td></td>
<td>VALUE OF SIGNIFICANCE</td>
<td>0.803</td>
</tr>
</tbody>
</table>

*p > 0.05

Figure 2: Independent Sample t Test

As it is seen in figure [2], development factor is not statistically significant on the perception
of success criteria in terms of tenure, position, and gender variables. Team factor is only significant for position variable. Specifically, there is a statistically significant difference between employees and managers in terms of the perception of success criteria. However, there is not a statistically significant difference for the perception of team factor according to gender and tenure. It was concluded that strategy factor is not statistically significant on the perception of success criteria in terms of tenure, position, and gender variables. It was concluded no significant differences in perception of success criteria according to the title, position, and gender variables. Knowledge factor is only significant for position variable. However, there is not a statistically significant difference for the perception of knowledge factor according to gender and tenure.

Development, strategy, and change factors are not statistically significant on the success perception of physicians and nurses depending on tenure, position, and gender variables. Moreover, it was found that perception levels are close to each other. However, it was found that subordinates’ perception levels of knowledge and team factors are statistically higher than those of managers.

6 Conclusion

Changing environmental conditions and developing technologies bring the necessity of learning for organizations in order to survive. In order to comply with the developments in the environment and technology, organizations are required to possess skills that help its learning process. Individuals reached to personal mastery are in the act of continuous learning. Knowledge and experiences of these people might become important for the organization to develop new and successful solutions during the emergencies. Principally, concepts related to the principals of learning organizations are not new to the organizational scholars. Innovativeness of Senge’s learning organizations approach is based on that his success of achieving a holistic perspective by examining these concepts all together. In addition to the behaviors necessary for the success of the learning organization, there are other criteria, which are required to be developed within the organization. These criteria are leadership, teamwork, continuous acquisition of new knowledge, dissemination the knowledge acquired, and establishment of the sufficient technical framework for accessing to the knowledge.

In this study, surveys obtained from physicians and nurses working in a hospital group were analyzed. In the application, measurement of the success perception criteria for physicians and nurses in learning organizations was aimed.

Development, strategy, and change factors are not statistically significant on the success perception of physicians and nurses depending on tenure, position, and gender variables. Moreover, it was found that perception levels are close to each other. However, it was found that subordinates’ perception levels of knowledge and team factors are statistically higher than those of managers.

There is not a statistically significant difference between physicians and nurses, and the reason behind this might be attributed to the fact that both groups have higher education levels. Furthermore, the reason behind subordinates’ higher perception toward knowledge and team factors might be based on the following factors such as increasing education levels among nurses, especially among young nurses, continuous internal trainings, support given to graduate and Ph. D. education, and encouragement toward participation in scientific conferences.

Consequently, concepts related to the principals of learning organizations are not new to
the organizational scholars; however, philosophy of learning organization should be a lifestyle for every healthcare personnel. Issues of potential improvements and how these improvements might be achieved should be analyzed continually. In every healthcare organization, due to the nature of the healthcare services, making learning an important part of the organizational culture, with the help of individuals reached to personal mastery level, will assist hospitals to provide higher quality services.

We made this study with the assumption that group hospitals are learning organizations. In further researches, it should also be considered whether there is a difference in terms of the perception of levels among physicians and nurses, as well as other staff groups, such as caregivers and sisters in a hospital.

References


