Organizational learning as an approach to achieve outstanding performance: an applied study on Al-Taif University, Kingdom of Saudi Arabia

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Abstract

Organizational Learning (OL) has emerged as one of the most promising constructs in management and organizational literature. OL works as a catalyst to enhance performance. Organizations of developing countries are striving to improve their performance. Therefore, this study is seeking to find the relationship between OL and organizational performance. The present research aims at exploring OL as one of the most important organizational factors that can direct the behavior and attitudes of the faculty members to promote Outstanding University Performance (OUP). There are two constructs relevant to OL, namely, Adaptive Organizational Learning (AOL) and Generative Organizational Learning (GOL). This research is practical, according to its purpose, and descriptive, according to its data collection method. Out of the 310 questionnaires that were distributed, 280 usable questionnaires were returned, a response rate of 90%. The findings reveal that there are differences among the two groups of the faculty members regarding their evaluative attitudes towards OL and OUP. Also, this study reveals that the aspects of OL (AOL and GOL) have a significantly

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direct effect on OUP. Accordingly, the study provides a set of recommendations including the necessity to pay more attention to AOL, in general, and GOL, in particular, at the university.

**Keywords:** Organizational Learning, Organizational Performance, Saudi Arabia

## 1 Introduction

Organizational Learning (OL) works as a catalyst to guide the organization in a progressive way. OL leads to enhanced productivity and performance measured through financial and non-financial variables (Imran, et al., 2011). Performance cannot be sustained over time without learning, because organizations must be able to adapt to political, economical, societal, and technological changes. So, to improve performance, learning is required. The notion of OL has become very prominent recently. Managers see OL as a powerful tool to improve the performance of an organization. Thus, it is not only the researchers of organization studies who are interested in the phenomenon of OL but also the practitioners who have to deal with the subject of OL.

OL began to gain the interest of organizations, especially in the current century. It pays attention to recognizing deficiencies in the performance of an organization so as to confront the rapidly changing environmental challenges, provide solutions for these problems and present alternatives for promoting the performance of organizations of all types. Business organizations, due to the rapid environmental changes, began to adopt OL so as to attain outstanding performance.

Many authors relate OL with improvements in performance (Argyris & Schön, 1978; Fiol & Lyles, 1985; Dodgson, 1993; Bohn, 1994) or a behavior change that leads to improved performance (Fiol & Lyles, 1985; Senge, 1990; Garvin, 1993; Sinkula, 1994). Accordingly, performance measures are imperative for effective management of an organization (Griffis et al., 2007; Savaneviciene & Stankeviciute, 2010).

Learning is a major component in any effort to improve Organizational Performance (OP) and to achieve competitive advantages. In other words, OL allows the firm to increase the quality and quantity of its performance and to achieve competitive advantage (Kogut & Zander, 1996). In short, OL is positively related to OP; higher emphasis on OL equates to higher performance in the organization (Ramirez, et al., 2011). In a knowledge-based economy, it is important for managers to understand the relationship between OL and OP. De Geus (1988) argues that the ability to learn faster than your competitors may be the only sustainable competitive advantage for an organization. OL can be defined as a process of acquiring information, interpreting information, and using information to guide decisions. Jones (2000) defines OL and OP as an important
process through which managers try to increase organizational members’ capabilities in order to manage an organization and its environment to continuously enhance OP. Interestingly enough, research conducted by Škerlavaj & Dimovski (2006) demonstrated a statistically significant positive impact of OL on OP from the employee perspective. Also, Škerlavaj et al (2007) researched medium and large Slovenian companies and established a statistically significant link between OL culture on OP. For many years, researchers have suspected a positive correlation between OL and OP. Organizations who embrace OL are able to not only collect knowledge but also process the knowledge. For example, the feedback that is received from customers, employees, and competitors must be used strategically. Liao and Wu (2009) suggest that good strategy will allow businesses to earn long-run supernormal profits.

In developing countries, organizations are striving to be a part of the global economy by being more competitive. By adopting certain strategies such as OL, the organizations may have a better chance at becoming more sustainable and competitive. Consequently, this study attempts to find a relationship between OL and OP. The main focus is on OL and its relationship to OP. More specifically, this research attempts to evaluate the influence of OL on OP by determining which OP is the most and the least predictable when the effectiveness of OL is in the view. To improve their performance, organizations need to focus on continuous learning and use of knowledge, which can serve as a critical key to success for facilitating individual, team, and OL leading to continuous improvement and innovation in business operations (Watkins & Marsick, 1996; Weldy, 2009; Harrim, 2010). For example, universities use data from learning outcomes to continuously improve and help guide decisions on resources, curriculum development, and strategic plans.

The present study strives to determine the similarities and differences among staff members at Al-Taif University as regards OL and Outstanding University Performance (OUP) besides recognizing the type and degree of the relationship between OL and university performance at Al-Taif University.

The study is structured as follows: Section two gives a theoretical construct of OL, OL and learning organization, and OUP. Section three presents the research questions and hypotheses. Section four discusses the study methodology which includes the population and sample of research, method of data collection, research variables and method of measuring, and an overview of the statistical tests used in the study. Section five presents the testing of the hypotheses. Section six presents the main findings of the study. Section seven gives some recommendations for improving the outstanding performance in Al-Taif University. Section eight presents suggestions for further research.
2 Theoretical background

This section discusses the theoretical background of OL, OL and Learning Organization (LO), and OUP.

2.1 Organizational Learning OL

OL has become an important concept for organizational survival in this competitive environment. The notion of organizational learning has been over-emphasized in the literature, because of the complexity involved in the collective learning processes; it has been perceived as spiritual in nature (Yeo, 2007). OL is considered to be one of the most promising concepts in modern organizational and leadership literature. The concept of OL has grown dramatically, generating a great deal of debate and research (Bapuji & Crossan, 2004; Smith et al., 2000). Organizations have used OL as a strategy for achieving long-term success. Therefore, the analysis of OL is important for both practitioners and researchers. OL has been considered, from a strategic perspective, as a source of heterogeneity among organizations, as well as a basis for a possible competitive advantage (Liao & Wu, 2009).

The term "learn" in English denotes acquiring knowledge or skill via study, experience, thinking, memorizing or knowing (Oxford, 1960). Psychologists define this term as an acquisition of a series of responses throughout time that led to change of behavior (Buehel & Probst, 2000).

Some researchers defined OL as all systems, mechanisms and processes used to improve the potentials of individuals continuously so as to achieve specific goals relating to individuals and the organization (Fargo & Skyrme, 1995). OL is a mechanism by which the organization transforms the individual knowledge of employees into social knowledge (Grant, 1996; Spender, 1996). OL is an activity and process via which the organization may attain learning (Finger & Brand, 1999). Organizations need to be able to generate a culture that facilitates and allows the conditions to develop new capacities, to design new products and services, to increase the existing supply and to improve processes, oriented to sustainability (Cutcher, 2000). OL may take place due to the continuous interaction among individuals through learning. This helps them acquire experiences (Hodgkinson, 2000).

OL may reflect the process of learning in an organization among all employees and on all levels. It is the product of organizational members’ involvement in the interaction and sharing of experiences and knowledge. Thus, it is imperative for organizations to promote a “bottom-up” philosophy where suggestions for change start at the bottom of the organization and work their way up to the top. This shared form of knowledge implies that individual learning is a necessity, but not a sufficient condition for OL to occur. The information distributed through the organization’s members is shared and interpreted in a
systematic way. OL is one of the tools that may be used to accomplish the competitive edge of the organization (Ghosh, 2004). It is a process that leads to an organization's incessant learning (Thomas & Allen, 2006). OL is about how individuals collect, absorb, and transform information into organizational memory and knowledge. OL allows an organization to challenge their status quo and implement best practices to transform the organization into a thriving dynamic, robust, and innovative organization.

OL represents a complex interrelationship among people, their actions, symbols, and processes within the organization. It aims to generate, disseminate, and apply knowledge in an organization. It consists of five learning cycles (1) individual, (2) individual/group, (3) group, (4) group/organizational, (5) organizational (Kok, 2010).

The true development of the concept of OL was achieved by Senge (1990) as he presented the ideas of Adaptive Organizational Learning (AOL) and Generative Organizational Learning (GOL).

Farrago & Skyrme (1995) argue that there are four levels for OL (1) learning facts, knowledge processes and procedures so as to confront simple change cases, (2) learning skills needed for new businesses so as to adapt with changes in the environment, (3) learning for adaptation, this applies to dynamic cases that need new solutions. It is related to the need for experimentation and inferring lessons from previous successes and failures, and (4) it is learning for learning, this level requires creativity and innovation. It is interested in designing, not adapting with the future. According to the division of Senge (1990), these levels may be classified by allocating levels one and two in AOL and levels three and four in GOL.

AOL refers to learning by correcting errors through feedback of the process of learning and continuous improvement (Stewart, 2001). AOL is related to rationality, defensive relationships, low freedom of choice, and discouragement of inquiry (Argyris et al., 1985). AOL can be described as coping and dealing with the current environment in new and better ways (Senge, 1992). AOL is related to little change at the primary stage of learning (Malhotra, 1996). AOL focuses on evolutionary changes to counteract changes at the environment of the organization besides what it needs for survival. This type of learning does not achieve the competitive advantage of the organization, but it is necessary for its survival (Pemberton & Stonehouse, 2000).

AOL refers to the capacity to be able to cope with changes in the environment, whether internal or external in origin. Without this capacity, living beings cannot mature, grow, or survive. Prolonged resistance to change causes harmful stress and without adaptation, survival is endangered and death may result (Voci & Young, 2001). AOL focuses on evolutionary change in agreement with what occurs in the organization's environment. This helps it survive and saves costs and time (Sun & Scott, 2003).

GOL refers to learning via the cognitive aspect of the individual or organization. This requires the developing of systems and rules that help
determine the proper behavior, which leads to using new methods for carrying out business. The organization, in this case, goes beyond the sheer prompt solution of the problem, besides using a new methodology. GOL focuses on creating new capabilities or discovering new opportunities as the present system is useless and must be changed (Altman & Illes, 1998).

The vital outcome of GOL is the realization of high-specialization learning that may be generalized in all organizations of all conditions (Pemberton & Stonehouse, 2000). GOL focuses on creating new capabilities and renouncing the old ways of work deliberately. This is necessary for the organization, which operates amid extreme changes. This type of learning is very costly (Wijnhoven, 2001). GOL tries to improve the organization's ability to discover capabilities. Knowledge is transferred to modify conduct and to create new experiences. This means that GOL is an advance of AOL and complements it (Thomas & Allen, 2006). GOL associated with radical innovations would dramatically improve firm performance and is becoming essential in our organizations (Kang et al., 2007). Consequently, there is still a need to improve our understanding of how GOL takes place in organizations, where it can be located in the OL process, and how can we enhance it (Chiva et al., 2010).

2.2 OL and Learning Organization (LO)

The relationship between OL and Learning Organization (LO) is a cause and effect one as no correct process of learning is found without establishing an organization that can learn. The importance of OL and its applications in organizations, in general, and university learning, in particular, gets more evident in relating the automatic development of employees and raising the standard of performance and quality of outputs. In this way, organizations become outstanding for their being willing to change into LO (Seng, et al., 1994).

The management literature of applied orientation tends often to express the practicing consultants’ view of LO, whereas the literature of academic and theoretical orientation manifests the academicians’ view of OL, and each group uses different terminology, but they share common basic notions and themes: emphasis on the importance and vitality of learning, and that individuals and their experiences and skills are the main factor in organizational excellence (Argyris and Schon, 1996). According to Kerman et al (2012), “Learning organizations design timely and informative feedback loops to share data about the change processes. Effective data sharing puts data in the hands of the staff that will use it to further organizational change” (p. 253).

OL emphasizes Human Resources Management, training, knowledge and skills acquisition, whilst the LO links to “organizational capability”, i.e. the tacit, experiential learning that often goes on unnoticed in organizations (McHugh et al., 1998). OL focuses on grouping and analyzing processes relating to the learning of individuals and groups inside the organization, while the LO reflects the state of
attaining the possibility to recognize surrounding events and using specific means to diagnose and determine such action. OL, then, expresses an activity and a process via which the organization may achieve learning (Finger and Brand, 1999).

The relationship between OL and LO is based on containment as it focuses on the environment of the learning process. It keeps on increasing the abilities of its members to attain results by granting them flexibility and freedom of thinking. This enables them to realize their ambition to create new means and models of thought so as to achieve their desirable outcomes. OL focuses on the way the process of learning occurs while members acquire information, skills and attitudes that virtually lead to the promotion of the organization and achieve its adaptation with the renewable changes in the ever-changing environment. This turns OL into a fundamental element of LO (Marqwardt, 2002).

OL is not the LO as it represents the aim or case that should be achieved, while OL represents the process through which that goal may be attained via formal and informal means. It is not either the LO or OL, rather OL and LO can and should coexist. For an organization to become an effective learner, there is a need for continuous learning cycle; any organization can claim that it is continuously learning and practicing OL (Gorlick, 2005).

There is little consensus in the literature on what an LO might look like, what is OL, and what is, if any, the relationship between LO and OL (Thomas and Allen, 2006).

The literature on OL has focused on the detached collection and analysis of the processes involved in individual and collective learning inside the organization, whereas LO literature has an action-orientation, and it is geared toward using specific diagnostic and evaluative methodological tools which can help identify, promote and evaluate the quality of learning processes inside the organization (Harrim, 2010).

### 2.3 Outstanding Performance OP

In English, the term "performance" is derived from "to perform" which means "doing work, achieving a mission or realizing a given activity. It is a reflection of the organization's ability and aptitude to realize its goals (Eccles, 1991).

It is the ability of the organization to achieve its long-term goals (Robins & Wiersema, 1995). OP is that which exceeds the normal average performance, besides being a part of a series of excellent performance (Privett, 1983).

Organizations that attempt to realize OP have their own characteristics that turn them different from conventional performance. The organization's performance reflects that of its employees. The advisory organization, Arther, has presented a number of features for organizations of OP. They are as follows (Kotler, 2000):
- **Beneficiaries**: organizations should specify people of interest and their needs. They include beneficiaries, employees, suppliers and distributors. The organization has to gratify the minimum expectations of each group so that it may be outstanding in its performance.

- **Processes**: organizations that try to achieve satisfaction of beneficiaries can not attain this without effective processes. Organizations of high performance are those that focus on developing new products, and attract beneficiaries to keep them.

- **Resources**: organizations need resources to carry out their process and they should own or control these resources so as to keep their outstanding position. They may get these resources from outside the organization; the most important resources that should receive due attention are human resources.

- **Organizational culture**: the organization is composed of constructs, policies and cultures. The crucial feature that distinguishes these components is quick change. It is noticeable that constructs and policies hardly change, while organizational culture is more difficult to change. Also, the interest of organizations to provide high culture helps employees achieve outstanding performance levels.

### 3 Research questions and hypotheses

Research questions highlight exactly what you would like to find out. The aim of the research is to support or verify the hypotheses or show that they are not valid statements. This research aims at answering the following questions:

**Question1**: Are there fundamental differences among the faculty members at Al-Taif University towards OL?

**Question2**: Are there fundamental differences among the faculty members at Al-Taif University towards OUP?

**Question3**: What is the relationship between OL (AOL and GOL) and OUP at Al-Taif University?

Drawing on the above-mentioned research questions, this study attempts to test the following hypotheses:

**Hypothesis1**: There is no significant discrimination among the faculty members at Al-Taif University regarding OL.

**Hypothesis2**: There is no significant discrimination among the faculty members at Al-Taif University regarding OUP.

**Hypothesis3**: There is no statistically significant relationship between OL (AOL and GOL) and OUP at Al-Taif University, as a whole and for each variable separately.
4 Research methods

This section includes the population and sample of research, method of data collection, variables of the study, method of measuring, means of data analysis and testing hypotheses statistically.

4.1 Population and Sample of Research

The present paper is interested in investigating OL as an approach to achieve OUP at Al-Taif University. This is why its population involves all categories of staff members; a total of 1625 items. Due to time constraints and costs for such a type of study, it has been decided to draw on the method of samples for collecting primary data needed for the study. In regard to the type of the sample, the researcher has drawn on the random sample when selecting the number of items of staff members at Taif University. In regard to size of the sample, it has been determined by the following equation: (Edris, 2004).

\[
n = \frac{N \times (Z)^2 \times P(1-P)}{Ne^2 + (Z)^2 \times P(1-P)}
\]

(n) refers to sampling size, (N) refers to size of the population of the study, (Z) refers to permissible error limits, 1.96 at 95% of confidence, (P) refers to number of items at the feature under study, 50%, (e) refers to permissible sample error while evaluating proportion, 50%. Using the abovementioned equation, size of the sample is = 310 items. Notably, relative distribution of the research sample has been accomplished in light of the number of the research population. The size of the sample is illustrated in the following Table 1:

<table>
<thead>
<tr>
<th>Category</th>
<th>Number</th>
<th>Percentage</th>
<th>Size of sample by category</th>
</tr>
</thead>
<tbody>
<tr>
<td>Males</td>
<td>878</td>
<td>54%</td>
<td>310 x 54% = 167</td>
</tr>
<tr>
<td>Females</td>
<td>747</td>
<td>46%</td>
<td>310 x 46% = 143</td>
</tr>
<tr>
<td>Total</td>
<td>1625</td>
<td>100%</td>
<td>310 x 100% = 310</td>
</tr>
</tbody>
</table>

Source: Staff Members Affairs Department, Taif University, KSA, 2011.

Finally, units of each sample have been chosen randomly by using name lists of staff members available at the Department of Personnel Affairs at Taif University.
Concerning the features of the sample units, males amounted to about 57% while females amounted to 43%. Regarding the type of the sample, the percentage of practical faculties was 53% while humanities faculties amounted to 47%. Concerning the academic degree, holders of the professor degree amounted to 15%, associate professor 28%, assistant professor 40%, lecturer 7% and demonstrator 10%. Also, 7% of the participants were in the 21-29 age group, 55% of the participants were in the 30-44 age group, and more than 45% of the participants were in the 45-65 age group. Regarding period of experience, the percentage of sample units whose experience was fewer than five years was about 22%, from 5 to 10 years was 35% and more than 10 years of experience was 43%. Table 2 illustrates features of sample units.

### Table 2: Characteristics of the Sample Units

<table>
<thead>
<tr>
<th>Variables</th>
<th>Number</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>1- Sex</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Male</td>
<td>160</td>
<td>57%</td>
</tr>
<tr>
<td>Female</td>
<td>120</td>
<td>43%</td>
</tr>
<tr>
<td>Total</td>
<td>280</td>
<td>100%</td>
</tr>
<tr>
<td><strong>2- Faculties</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Practical faculties</td>
<td>147</td>
<td>53%</td>
</tr>
<tr>
<td>Humanities faculties</td>
<td>133</td>
<td>47%</td>
</tr>
<tr>
<td>Total</td>
<td>280</td>
<td>100%</td>
</tr>
<tr>
<td><strong>3- The Academic Degree</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Professor degree</td>
<td>43</td>
<td>15%</td>
</tr>
<tr>
<td>Associate professor</td>
<td>78</td>
<td>28%</td>
</tr>
<tr>
<td>Assistant professor</td>
<td>113</td>
<td>40%</td>
</tr>
<tr>
<td>Lecturer</td>
<td>20</td>
<td>7%</td>
</tr>
<tr>
<td>Demonstrator</td>
<td>26</td>
<td>10%</td>
</tr>
<tr>
<td>Total</td>
<td>280</td>
<td>100%</td>
</tr>
<tr>
<td><strong>4- Marital Status</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Married</td>
<td>253</td>
<td>90%</td>
</tr>
<tr>
<td>Single</td>
<td>27</td>
<td>10%</td>
</tr>
<tr>
<td>Total</td>
<td>280</td>
<td>100%</td>
</tr>
<tr>
<td><strong>5- Age</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 5 years</td>
<td>21</td>
<td>7%</td>
</tr>
<tr>
<td>From 30 to 45</td>
<td>153</td>
<td>55%</td>
</tr>
<tr>
<td>More than 45</td>
<td>106</td>
<td>38%</td>
</tr>
<tr>
<td>Total</td>
<td>280</td>
<td>100%</td>
</tr>
<tr>
<td><strong>6- Period of Experience</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Less than 5 years</td>
<td>63</td>
<td>22%</td>
</tr>
<tr>
<td>From 5 to 10</td>
<td>98</td>
<td>35%</td>
</tr>
<tr>
<td>More than 10</td>
<td>119</td>
<td>43%</td>
</tr>
<tr>
<td>Total</td>
<td>280</td>
<td>100%</td>
</tr>
</tbody>
</table>
4.2 Method of Data Collection

The study has drawn on the quantitative method for collecting primary data necessary for the study. The questionnaire used in the questions list included four pages, besides the foreword page which addresses informants. It aims at informing them with the nature and aims of the study, besides gaining their cooperation for answering the questions in the list. The other pages include guided and direct questions, all of which were posed to all staff members at Al-Taif University in the same wording and order. This reduces the probabilities of bias in data collection necessary for the problem of the study.

The questionnaire list has been piloted by a limited sample of staff members at Taif University (25 items only). This necessitated some amendments in the questionnaire; some phrases were reworded while others were omitted so as to suit the nature and aims of the present study. The data of the questionnaire of staff members at Taif University have been collected by contacting informants in informal interviews to explain the nature and aims of the questionnaire and to seek their cooperation. The researcher also handed each informant a list of questions and gave them enough time to answer the questions at a suitable time and place for them. All completed lists were retrieved through personal contact. This method is the commonest in collecting primary data and it attains a high percentage of replies.

The questionnaire included three types of questions. The first question type is related to recognizing OL, the second question type detects OUP, and the third question type is related to the demographic characteristics of staff members at Taif University.

The data collection took approximately two months. Replies were 90%, 280 lists out of the 310 distributed. This is most likely due to the high level of interest of staff members at Taif University in the subject matter of the questionnaire.

4.3 Research Variables and Method of Measuring

4.3.1. Organizational Learning OL

The present study has investigated OL as an independent variable. The researcher has drawn on the scale of Senge et al., (1994) for measuring OL (AOL and GOL). Fourteen statements have been modified upon reading a host of studies including (Voci and Young 2001; Smith and Taylor, 2000; Appeldan and Goramsson 1997; and Osterberg, 2004). Statements 1-7 illustrate AOL while statements 8-14 handle GOL. It should be mentioned that OL has been measured by a five-item scale of Likert of agree or disagree where each statement has five options (absolutely agree-agree-neutral, disagree-absolutely disagree). The informant is expected select the answer that suits his or her choice, (5) indicates full agreement while (1) indicates full disagreement, with neutral degrees in-between.
4.3.2. Outstanding University Performance OUP

The present study has investigated OUP as a dependent variable. The researcher has drawn on the scale presented by Kotter (2000) to measure OUP which requires the presence of four factors (beneficiaries, processes, resources, and organizational culture) as keys for OUP. It should be indicated that OUP has been measured employing the Likert scale of five points which ranges from fully agree (5) points to fully disagree (1) point, while numbers 2, 3, and 4 reflect varying degrees of evaluation. Informants had to choose the suitable answer.

4.4 Methods of Data Analysis and Testing Hypotheses

For purposes of the statistical analysis and hypotheses testing, the researcher has employed the following methods: (1) the Alpha Correlation Coefficient (ACC), which aims at verifying the degree of reliability in the scale of OL and OUP, (2) the two-group discriminant analysis, which aims at discriminating among the staff members at Taif University in regard to OL and OUP, (3) Multiple Regression Analysis (MRA), which aims at verifying the type and strength of the relationship between OL as independent variables and OUP as a dependent variable, and (4) the statistical testing of hypotheses which includes Wilk's Lambda and chi-square that goes hand in hand with the discriminant analysis and F-test and T-test which go hand in hand with the MRA. All these tests accompany analysis means which are to be used. They are found in SPSS.

5 Hypotheses testing

The findings of analysis may be discussed and explained through the following main points: (1) Evaluating reliability of scales, (2) OL, (3) OUP, and (4) the relationship between OL and OUP.

5.1 Evaluating Reliability Scales

The reliability of the scales of OL and OUP of the faculty members at the university were evaluated to minimize errors of measuring and maximize constancy of the scales used. Alpha Correlation Coefficient (ACC) was used as it is the most widely employed method of analyzing reliability to evaluate the degree of internal consistency among the contents of the scale under testing.

According to scales testing in social researches, it was decided to exclude variables that had a correlation coefficient less than 0.30 and that the acceptable limits of ACC range from 0.60 to 0.80, in accordance with levels of reliability analysis in social sciences.
ACC was applied on OL scale in total manner for the entire scale and each variable of the scale separately. The results revealed that ACC for the scale as a whole represented about 0.93, which is an indication of a high degree of reliability. The extent of internal consistency among contents of OL may be illustrated using ACC throughout the Table 3.

Table 3: Evaluation of the Internal Consistency among Contents of OL Using ACC, The Output of Reliability Analysis

<table>
<thead>
<tr>
<th>The Dimension of OL</th>
<th>Number of Statement</th>
<th>Alpha Correlation Coefficient</th>
</tr>
</thead>
<tbody>
<tr>
<td>Adaptive Organizational Learning</td>
<td>7</td>
<td>0.915</td>
</tr>
<tr>
<td>Generative Organizational Learning</td>
<td>7</td>
<td>0.904</td>
</tr>
<tr>
<td>Total Measurement</td>
<td>14</td>
<td>0.935</td>
</tr>
</tbody>
</table>

It is noticeable that the primary result of evaluating reliability reflects the fact that the scale under testing is reliable for measuring OL at the university.

Also, ACC was applied on the scale of OUP in a total manner for the entire scale and for each variable of the scale. Results of analyzing reliability revealed that ACC of the scale represented about 0.88, which is an indication of a high degree of reliability. The extent of internal consistency among contents of OUP may be revealed using ACC throughout the Table 4. This illustrates that the primary findings of reliability evaluation reflect the fact that the scale under testing is reliable for measuring OUP at Al-Taif University.

Table 4: Evaluation of the Internal Consistency among Contents of OUP Using ACC, The Output of Reliability Analysis

<table>
<thead>
<tr>
<th>The Dimension of OUP</th>
<th>Number of Statement</th>
<th>Alpha Correlation Coefficient</th>
</tr>
</thead>
<tbody>
<tr>
<td>Beneficiaries</td>
<td>3</td>
<td>0.681</td>
</tr>
<tr>
<td>Processes</td>
<td>3</td>
<td>0.856</td>
</tr>
<tr>
<td>Resources</td>
<td>3</td>
<td>0.786</td>
</tr>
<tr>
<td>Organizational Culture</td>
<td>3</td>
<td>0.630</td>
</tr>
<tr>
<td>Total Measurement</td>
<td>12</td>
<td>0.883</td>
</tr>
</tbody>
</table>
According to the above-mentioned results, two scales had been defined; the first is for OL (14 variables), where ACC for scales as a whole represented about 0.93 and the second is for OUP (12 variables), where ACC for scales as a whole represented 0.88. These scales are reliable in the course of the later stages of analysis in the study.

5.2 Organizational Learning (OL)

This section discusses the results of the statistical analysis for answering the first question of this study on the verification of the extent of differences and discrimination among the faculty members at Al-Taif University in terms of their evaluative attitudes towards OL and testing the first hypothesis of the study which states:

**Hypothesis:** There is no significant discrimination among the faculty members at Al-Taif University regarding OL.

The two-group discriminant analysis was applied on a model including two groups of the faculty members at Al-Taif University, as well as their evaluative attitudes towards OL. The discrimination analysis method was applied on two groups enabled us to answer the previous question as follows:

A- Discriminant Functions and Matrix on the Basis of OL

The functions and matrix at Al-Taif University are represented in Table 5. This table reveals the following findings:

1- Eigen values represent 0.068 in the discrimination function among the faculty members and their evaluative attitudes towards OL there.

2- There are differences among attitudes of the faculty members towards OL (the percentage of differentiation which we could interpret in the model was 100% of discrimination analysis function).

3- There is a significant relationship between the faculty members and their attitudes towards OL (multiple correlation coefficient represents 0.25 in the discrimination analysis function).

4- Wilks Lambda value represents 0.94 in the discrimination analysis function.

5- Results of discrimination analysis of the two groups revealed that the value of chi-square represents 18.09 in the discrimination analysis function.

6- The percentage of the accurate classification of the faculty members according to their evaluative attitudes towards OL is 58%, which implies the differences among the faculty members towards OL there. Also, there are about 42% of the faculty members who are similar in regard to their evaluative attitudes towards OL at Al-Taif University.
Table 5: Discriminant Functions and Matrix on the Basis of OL

<table>
<thead>
<tr>
<th>A- Discriminant Functions</th>
</tr>
</thead>
<tbody>
<tr>
<td>Dala</td>
</tr>
<tr>
<td>1</td>
</tr>
</tbody>
</table>

B- Discriminant Matrix

<table>
<thead>
<tr>
<th>Groups</th>
<th>Number</th>
<th>Predict Member of Groups</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Males</td>
<td>160</td>
<td>97 (60.6%)</td>
<td>63 (39.4%)</td>
</tr>
<tr>
<td>Females</td>
<td>120</td>
<td>55 (45.8%)</td>
<td>65 (54.2%)</td>
</tr>
<tr>
<td>Total</td>
<td>280</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

The Percentage of the exact division 57.9%

B- The Relative Importance of OL

Using the discrimination analysis method we could define the relative importance of OL and variables which show more discrimination among the faculty members at Al-Taif University. It included two variables relating to OL as shown in Table 6.

Table 6: Discrimination Coefficients among the Faculty Members on the Basis of OL

<table>
<thead>
<tr>
<th>The Factor Discriminating among Faculty Members</th>
<th>Mean</th>
<th>F-Test</th>
<th>Level of Sig</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Group 1</td>
<td>Group 2</td>
<td></td>
</tr>
<tr>
<td>It is important for workers of the university to have the opportunity for experimentation and the search for better ways to accomplish the work.</td>
<td>3.76</td>
<td>3.81</td>
<td>11.74 **</td>
</tr>
<tr>
<td>The administration of the University continues to exchange views with the staff.</td>
<td>3.88</td>
<td>3.35</td>
<td>9.35 **</td>
</tr>
</tbody>
</table>

It is noticeable that it is important for workers of the university to have the opportunity for experimentation and search for better ways to accomplish the
work. This is the top factor discriminating among the faculty members at Al-Taif University (discrimination coefficients represent 0.83. The following variable is that the administration of the University continues to exchange views with the staff (discrimination coefficient represents 0.79).

C- Comparative Description of the faculty Members on the Basis of OL

Comparing the mean of the attitudes of the faculty members towards OL and variables that have more ability to discriminate among them, we could comparatively describe these types, as in Table 6.

As for male staff, they tend to agree that the administration of the university continues to exchange views with the staff (with a mean of 3.88) and it is important for workers of the university to have the opportunity for experimentation and search for better ways to accomplish the work (with a mean of 3.76).

As for female staff, they tend to agree that it is important for workers of the university to have the opportunity for experimentation and search for better ways to accomplish the work (with a mean of 3.81), and the administration of the University continues to exchange views with the staff (with a mean of 3.35).

Accordingly, it was decided to reject the null hypothesis and accept the alternative hypothesis as a whole. This is because it has been clear that there is statistically significant discrimination among the faculty members on the basis of evaluative attitudes towards OL. This decision was based on the value of Wilks Lambda in the discrimination analysis function, which amounts to 0.94 (see Table 5). Besides the value of chi-square calculated (18.09) in the free degree of (2) in the same discrimination analysis function exceeds its table counterpart (9.21) at the level of statistical significance of 0.01 (see Table 5). On the other hand, it was decided to reject the same null hypothesis of two variables of OL (14 variables) taken individually as there is fundamental discrimination among the faculty members on the basis of each variable at a level of statistical significance of 0.01, according to the test of univariate F (See Table 6).

5.3 Outstanding University Performance OUP

This section handles results of the statistical analysis for answering the second question of the study on the verification of the extent of difference and discrimination among the faculty members at the university in terms of their evaluative attitudes towards OUP and testing the second hypothesis of the study which states:

*Hypothesis 2: There is no significant discrimination among the faculty members at Al-Taif University regarding OUP.*
The two-group discriminant analysis was applied on a model including two
groups of the faculty members at the university, along with their evaluative
attitudes towards OUP. This technique enabled us to answer the previous question
as follows:

**A- Discriminant Functions and Matrix on the Basis of OUP**

The functions and matrix at Al-Taif University are represented in Table 7. This table reveals the following findings:

1- Eigen values represent 0.25 in the discrimination function among the faculty
members and their evaluative attitudes towards OUP there.
2- There are differences among attitudes of the faculty members towards OUP
(the percentage of differentiation which we could interpret in the model was
100% of discrimination analysis function).
3- There is a significant relationship between the faculty members and their
attitudes towards OUP (multiple correlation coefficient represents 0.45 in the
discrimination analysis function).
4- Wilks Lambda value represents 0.80 in the discrimination analysis function.
5- Results of discrimination analysis of the two groups revealed that the value of
chi-square represents 61.07 in the discrimination analysis function.
6- The percentage of the accurate classification of the faculty members according
to their evaluative attitudes towards OUP is 70%, which implies the
differences among the faculty members towards OUP there. Also, there are
about 30% of the faculty members at Al-Taif University who are similar in
regard to their evaluative attitudes towards OUP (see Table 7).

<table>
<thead>
<tr>
<th>Dala</th>
<th>Eigen Values</th>
<th>The % of Differences</th>
<th>MCC</th>
<th>Wilks Lambda</th>
<th>Ch-Square</th>
<th>Degree of Sign</th>
<th>Level of Sign</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>0.25</td>
<td>100.0</td>
<td>0.45</td>
<td>0.80</td>
<td>61.07</td>
<td>4</td>
<td>0.000</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Groups</th>
<th>Number</th>
<th>Predict Member of Groups</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Physicians</td>
<td>160</td>
<td>122 (76.3%)</td>
<td>160</td>
</tr>
<tr>
<td>Administrative</td>
<td>120</td>
<td>45 (37.5%)</td>
<td>120</td>
</tr>
<tr>
<td><strong>Total</strong></td>
<td>280</td>
<td></td>
<td>290</td>
</tr>
</tbody>
</table>

The Percentage of the exact division 70.4%
B-The Relative Importance of OUP

Using the discrimination analysis method we could define the relative importance of OUP and variables which show more discrimination among the faculty members at Al-Taif University. It included four variables relating to OUP as shown in Table 8.

Table 8: Discrimination Coefficients among the Faculty Members on the Basis of OUP

<table>
<thead>
<tr>
<th>The Factor Discriminating among Faculty Members</th>
<th>Mean</th>
<th>F-Test</th>
<th>Level of Sig</th>
</tr>
</thead>
<tbody>
<tr>
<td>The university administration supports the efforts of its staff in order to achieve the best university performance.</td>
<td>4.35</td>
<td>4.09</td>
<td>17.03 **</td>
</tr>
<tr>
<td>The university administration is seeking to provide services that exceed the current expectations of the beneficiaries.</td>
<td>4.13</td>
<td>3.87</td>
<td>26.78 **</td>
</tr>
<tr>
<td>The university administration tries to satisfy the needs of all recipients of University service.</td>
<td>4.17</td>
<td>3.93</td>
<td>35.42 **</td>
</tr>
<tr>
<td>The university administration has the material and non-physical resources that distinguish them from other universities.</td>
<td>4.16</td>
<td>3.99</td>
<td>20.42 **</td>
</tr>
</tbody>
</table>

It is noticeable that the university administration supports the efforts of its staff in order to achieve the best university performance. This is the top factor discriminating among the faculty members (discrimination coefficients represent 0.72). The following variable is that the university administration is seeking to provide services that exceed the current expectations of the beneficiaries (discrimination coefficient represents 0.68). The following variable is that university administration tries to satisfy the needs of all recipients of university service (discrimination coefficients represent 0.62). Another variable that discriminates among the faculty members is that university administration has the material and non-physical resources that distinguish them from other universities (discrimination coefficients represent 0.46).
C - Comparative Description of the faculty Members on the Basis of OUP

Comparing the mean of the attitudes of employees towards OUP and variables that have more ability to discriminate among them, we could comparatively describe these types, as in Table 8.

As for male staff, they tend to agree that the university administration supports the efforts of its staff in order to achieve the best university performance (with a mean of 4.35), and the university administration tries to satisfy the needs of all recipients of University service (with a mean of 4.17). They also tend to agree that the university administration has the material and non-physical resources that distinguish them from other universities (with a mean of 4.16). Finally, the university administration is seeking to provide services that exceed the current expectations of the beneficiaries (with a mean of 4.13).

As for female staff, they tend to agree that the university administration supports the efforts of its staff in order to achieve the best university performance (with a mean of 4.09), and the university administration has the material and non-physical resources that distinguish them from other universities (with a mean of 3.99). They also tend to agree that the university administration tries to satisfy the needs of all recipients of University service (with a mean of 3.93). Finally, the university administration is seeking to provide services that exceed the current expectations of the beneficiaries (with a mean of 3.87).

Accordingly, it was decided to reject the null hypothesis and accept the alternative hypothesis as a whole. This is because it has been clear that there is statistically significant discrimination among the faculty members at Al-Taif University on the basis of evaluative attitudes of the faculty members towards OUP. This decision was based on the value of Wilks Lambda in the discrimination analysis function, which amounts to 0.80 (see Table 7). Besides, the value of chi-square calculated (61.07) in the free degree of (4) in the same discrimination analysis function exceeds its table counterpart (13.28) at the level of statistical significance of 0.01 (see Table 7). On the other hand, it was decided to reject the same null hypothesis of five variables of OUP (12 variables) taken individually as there is fundamental discrimination among the faculty members on the basis of each variable at a level of statistical significance of 0.01, according to the test of univariate F (See Table 8).

5.4 The Relationship between OL and OUP

This section attempts to answer the third question on the type and degree of the relationship between OL (AOL and GOL) and OUP along with testing the third hypothesis, which states that:
**Hypothesis:** There is no statistically significant relationship between OL (AOL and GOL) and OUP at Al-Taif University, as a whole and for each variable separately.

This hypothesis was divided into two subsidiary hypotheses as follows: (1) There is no statistically significant relationship between AOL and OUP, (2) There is no statistically significant relationship between GOL and OUP.

The MRA was used to identify the type and strength of the relationship between OL and OUP. Correlation of coefficients between them is illustrated in Table 9.

### Table 9: Correlation Coefficients between OL and OUP

<table>
<thead>
<tr>
<th>The Dimension of OL</th>
<th>Beneficiaries</th>
<th>Processes</th>
<th>Resources</th>
<th>Organizational Culture</th>
<th>Total OUP</th>
</tr>
</thead>
<tbody>
<tr>
<td>AOL</td>
<td>0.255</td>
<td>0.246</td>
<td>0.267</td>
<td>0.729</td>
<td>0.454**</td>
</tr>
<tr>
<td>GOL</td>
<td>0.326</td>
<td>0.408</td>
<td>0.426</td>
<td>0.616</td>
<td>0.547**</td>
</tr>
<tr>
<td>Total Measurement</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td>0.548**</td>
</tr>
</tbody>
</table>

This reveals that there is significant correlation between the aspects of OL (AOL and GOL) and OUP as a whole and for each variable separately.

This section will discuss the relationship between OL (AOL and GOL) and OUP. The MRA was employed to identify the type and strength of the relationship between the aspects of OL and OUP separately. Results of applying the MRA are illustrated as follows:

#### 5.4.1. The Relationship between AOL and OUP

Results shown in Table 1 reveal the following:

1- There is a statistically significant relationship between AOL and OUP. It represents 55%, according to the multiple correlation coefficients.

2- AOL may interpret about 31% according to coefficient of determination (R-Square) of the total differentiation in the OUP.

3- The results of MRA reveal that the variables of the AOL providing more explanation of the differences in the level of OUP include the facts that "I need to learn new knowledge and techniques so that I can complete my work at the university" (0.60), "The university administration recognizes that training and
development are fundamental functions" (0.52), "The university administration is aware that the certificate obtained by the individual is an important part that must be completed through the applied knowledge acquired through his work" (0.45), "The university administration is trying to deal with anything that happens in the external environment" (0.34), and "If an error occurs in my university, I expect the assistance and support from others to learn from this error" (0.12) as Table 10 shows.

Table 10: The Relationship between AOL and OUP

<table>
<thead>
<tr>
<th>The Variables of AOL</th>
<th>Beta</th>
<th>R</th>
<th>R²</th>
</tr>
</thead>
<tbody>
<tr>
<td>The university administration recognizes that training and development are fundamental functions.</td>
<td>0.522</td>
<td>0.290</td>
<td>0.084</td>
</tr>
<tr>
<td>University administration is trying to deal with anything that happens in the external environment.</td>
<td>0.345</td>
<td>0.383</td>
<td>0.146</td>
</tr>
<tr>
<td>The University is ready to learn from other universities on how to develop methods to work with.</td>
<td>0.008</td>
<td>0.370</td>
<td>0.136</td>
</tr>
<tr>
<td>If an error occurs in my university, I expect the assistance and support from others to learn from this error.</td>
<td>0.337</td>
<td>0.451</td>
<td>0.203</td>
</tr>
<tr>
<td>The university sets up training programs for workers at all stages of the development of their professional work.</td>
<td>0.117</td>
<td>0.361</td>
<td>0.227</td>
</tr>
<tr>
<td>The university administration is aware that the certificate obtained by the individual is an important part that must be completed through the applied knowledge acquired through his work.</td>
<td>0.452</td>
<td>0.317</td>
<td>0.100</td>
</tr>
<tr>
<td>I need to learn new knowledge and techniques so that I can complete my work at the university.</td>
<td>0.604</td>
<td>0.417</td>
<td>0.174</td>
</tr>
</tbody>
</table>

- Multiple Correlation Coefficients
- Coefficient of Determination
- The Value of Calculated F 16.897
- Degree of Freedom 7,272
- The Value of Indexed F 5,649
- Level of Significant 0.000

* P < .05  ** P < .01

In the light of the above-mentioned facts, it was decided to reject the null hypothesis which states that there is no significant statistical relationship between AOL as one of the aspects of OL and OUP. The alternative hypothesis has been accepted because the model of MRA has shown that there was fundamental relationship at the level of statistical significance of 0.01 (according to F-test) between AOL as an independent variable and OUP as a dependent variable at the level of statistical significance level of 0.01 according to T-test (See Table 10).
5.4.2. The Relationship between GOL and OUP

Results shown at the Table 11 reveal the following:

1- There is a statistically significant relationship between GOL and OUP. It represents 56%, according to the multiple correlation coefficients.

2- GOL may interpret about 32% according to coefficient of determination (R-Square) of the total differentiation in the OUP.

3- The results of MRA reveal that the variables of the GOL providing more explanation of the differences in the level of OUP include the facts that "Debate among the University staff focuses on ideas on who say these ideas" (0.30), "The administration of the university is open to ideas and proposals personnel" (0.15), "The administration of the University continues to exchange views with the staff" (0.12) and "There is openness between university workers regarding the exchange of different viewpoints (0.11) as Table 11 shows.

### Table 11: The Relationship between GOL and OUP

<table>
<thead>
<tr>
<th>The Variables of GOL</th>
<th>Beta</th>
<th>R</th>
<th>R²</th>
</tr>
</thead>
<tbody>
<tr>
<td>The administration of the university is open to ideas and proposals personnel.</td>
<td>0.157 *</td>
<td>0.409</td>
<td>0.167</td>
</tr>
<tr>
<td>workers at the university are always in a position to encourage reflection on the submission of proposals that would improve its working methods.</td>
<td>0.002</td>
<td>0.378</td>
<td>0.143</td>
</tr>
<tr>
<td>Workers at the university have adequate time to learn from problems rather than solve only.</td>
<td>0.057</td>
<td>0.393</td>
<td>0.154</td>
</tr>
<tr>
<td>It is important for workers of the university to have the opportunity for experimentation and the search for better ways to accomplish the work.</td>
<td>0.050</td>
<td>0.452</td>
<td>0.204</td>
</tr>
<tr>
<td>There is openness between university workers regarding the exchange of different viewpoints.</td>
<td>0.111</td>
<td>0.478</td>
<td>0.228</td>
</tr>
<tr>
<td>The administration of the University continues to exchange views with the staff.</td>
<td>0.119</td>
<td>0.459</td>
<td>0.211</td>
</tr>
<tr>
<td>Debate among the University staff focuses on ideas on who say these ideas.</td>
<td>0.303 *</td>
<td>0.491</td>
<td>0.241</td>
</tr>
</tbody>
</table>

- Multiple Correlation Coefficients 0.565
- Coefficient of Determination 0.320
- The Value of Calculated F 18.246
- Degree of Freedom 7, 272
- The Value of Indexed F 5.649
- Level of Significant 0.000

* P < .05
Accordingly, it was decided to reject the null hypothesis which states that there is no significant statistical relationship between GOL as one of the dimensions of OL and OUP. The alternative hypothesis has been accepted because the model of MRA has shown that there was fundamental relationship at the level of statistical significance of 0.01 (according to F-test) between GOL as an independent variable and OUP as a dependent variable at the level of statistical significance of 0.01 according to T-test (See Table 11).

6 Discussion of the findings

This study on OL as an approach to achieve OUP at Al-Taif University revealed a host of results. The most important results are summed up as follows:

1- There are differences among the faculty members at the university regarding their evaluative attitudes towards OL. The most important dimensions of OL more capable of distinguishing among the faculty members include the fact that it is important for workers of the university to have the opportunity for experimentation and the search for better ways to accomplish the work. The administration of the university continues to exchange views with the staff.

2- There are differences among the faculty members at the university regarding their evaluative attitudes towards its OUP. The most important OUP dimensions most able to distinguish among the faculty members include the fact that the university administration supports the efforts of its staff in order to achieve the best university performance, the university administration is seeking to provide services that exceed the current expectations of the beneficiaries, the university administration tries to satisfy the needs of all recipients of university service, and the university administration has the material and non-physical resources that distinguish them from other universities.

3- There is a statistically significant relationship between the dimensions of OL (AOL and GOL) and OUP at Al-Taif University.

7 Recommendations

In light of the aforementioned results, the most important recommendations include the following:

“The university should embrace OL and reap the benefits. The administrators should spend lavishly on making the university a learning organization. This will assist the university with a competitive advantage. Srihawong and Srisa-Ard (2012) explain, ‘the top administrator successfully led the organization to the state of being learning organization since the top administrator was able to
encourage and motivate the staff to be driven and contribute to the development as the top administrator had vision and leadership to do so” (p. 240).

1- The university should pay more attention to GOL. This may be accomplished through various means, the most important of which include:
   - Careful searching for experienced persons in modern management so as to recognize staff members and interact with them in a manner that leads to their promotion and development of their university.
   - The best response for the desires and needs of staff members should be accomplished so as to raise their participation into achieving GOL. This will elevate the level of their performance and support the competitive abilities of the university.
   - Granting staff members more authority for broadening horizons of their work and urging them to provide new development in their specialization.

2- Adopting the features of outstanding performance at the university (beneficiaries, processes, resources, organization culture) so that the university may be promoted at the present as a cognitive organization.

3- It is necessary to have more studies on OL and its relation to university performance so as to update it to catch up with academic developments in fields of knowledge.

4- By embracing OL, the leadership of an organization will learn to value communication, accountability, and transparency (Kaifi & Noori, 2011, p. 94).

8 Suggestions for future research

The present study has attempted to disclose the OL as an approach to achieve OUP at Al-Taif University, but the scope of the study indicates the existence of other fields of other prospective studies of no less importance in this field, including:

1- The impact of OL on level of job satisfaction and turnover intentions of organizational members.

2- The impact of leadership communication on OL.

3- OL and its impact on some variables like job satisfaction, organizational commitment, job empowerment, organizational culture, etc. Such studies may be adopted in various venues on a global scale.

4- OL and its impact on organizational efficiency at production and service organizations.
References


