RELATIONSHIP OF PERSONALITY TRAITS WITH ABSORPTION CAPACITY: A CASE OF WATER AND POWER DEVELOPMENT AUTHORITY PAKISTAN

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ABSTRACT
It was a cross sectional study conducted based on primary data collected from employees of Water and Power Development Authority. The multiple regression analysis was performed to test the hypotheses. The primary objective of this research was to understand the relationship between absorption capacity and different types of personality traits. It is found that conscientiousness has no significant relationship with absorption capacity. Whereas, personality traits i.e. extraversion, neuroticism, openness and agreeableness were having significant and positive relationship with absorption capacity. A sample of 337 employees was drawn through simple random sampling and results are limited to employees working in WAPDA. For other organizations same relationship may not exist and similar studies can help in testing generalizability of the findings.

KEYWORDS: Extraversion, neuroticism, openness, agreeableness, Conscientiousness, Absorption Capacity

INTRODUCTION
Human resources started gaining priority depending upon their substantial impact on organizational performance. For understanding human resources scholars have started studying personality traits and their relationship with different possible variables [19]. The reason behind studying such relationship was to place right person at the right time at the right place to achieve desired outcomes [3]. According to resource based view of organization, organizations hire employees based on their abilities, knowledge and skills to achieve core competencies. For which, organizations want their employees to acquire knowledge from outside of the organization and share it with other employees of the organization [20]. Later on, the phenomenon was named as absorption capacity (ACAP). As ACAP means the capacity of individual to accept and understand the knowledge which was not the part of his/ her knowledge repository [8]. Employees of an organization acquire knowledge based on their personal experiences and social setting. As individuals are the source of learning and adoption of new knowledge from the external environment, present study is focusing on understanding the relationship of different personality traits with absorption capacity in context of Water and Power Development Authority (WAPDA) i.e. a public sector organization.

The study was conducted with the clear purpose to understand the relationship of different personality traits viz. Extraversion, Agreeableness, Openness, Neuroticism and Conscientiousness with absorption capacity of the employees of WAPDA, Pakistan. A study
conducted by Li et al. [19] was the main source of motivation to conduct this research. As Li et al. [19] found a significant role of personality traits of individuals in performance, attitude, behaviour and job roles. The study also found that hiring process of individuals can be improved by studying which of the personality traits will be the best suitable for a specific job. The findings of the research can also provide guidelines for managers to conduct effective job interviews. Based on this understanding developed by Li et al. [19] present study is an effort to study relationship between different personality traits and absorption capacity in context of Pakistan, especially WAPDA. The findings of the research will provide clear guidelines for authorities in improving the hiring and placement of employees of WAPDA.

The research revolves around following two questions;
Q 1. Which of the personality trait has significant relationship with absorption capacity of the employees?
Q 2. What is the direction of relationship of different personality traits with the absorption capacity of the employees?

LITERATURE REVIEW
Absorption capacity
ACAP is "an ability to recognize the value of new information, to assimilate it, and apply it to commercial ends" [8, p. 128]. ACAP is very important in generating new knowledge or to solve critical problems [1, 12, 24]. Some of the researchers [e.g. 8, 32] think that absorption capacity has four steps to deal with external knowledge i.e. i) identifying ii) processing iii) combining and iv) applying. A reasonable number of studies considered absorption capacity as a single construct [e.g. 8, 7, 14, 28]. Similarly, meta-analysis conducted by van Wijk, Jansen & Lyles [30] also considered ACAP as a single construct. Keeping in view the past studies this research will also consider ACAP as a single construct with the clear understanding that it is sharing of knowledge and giving space to new knowledge to become part of the existing repository.

The role of individuals in detecting a valuable and important knowledge from external environment and adopting it for potential usage is linked with their absorption capacity [31]. Some of the researchers [e.g. 33, 31] emphasised on conducting researches to understand the role of individuals in absorption of new knowledge. For instance, a study conducted by Li, et al. [19] role of personality traits is of great importance to decide and understand about the nature of job, performance expectation and specific behaviours at work place. These studies provide sufficient ground to study the possible relationship between different personality traits and absorption capacity of individuals.

Five factors model of personality
Extraversion people are those who obtain high scores on extraversion scale and are found to be self-confident, energetic, enthusiastic, expressive, unreserved, talkative, self-confident and social [34, 35]. Such types of people are tend to be gregarious, assertive and careful. Whereas, people with low score on extraversion scale are reserved, shy, passive and silent [34]. According to Westerman and Simmons [36] the characteristics or dimensions related to extraversion type of personality leads to establish understanding that employees with such type of personality can perform well. According to Robie, Brown and Bly [37] from FFM of personalities extraversion is a significant and important predictor of job performance. Thus the following hypothesis has been drawn.

H1: All this led to poise the first hypothesis that extraversion type of personality trait has positive and significant relationship with absorption capacity of the employees.
Neuroticism means a personality which tends to anxious, emotionally volatile, lack of psychological adjustment, mistrust and self-pity [17]. Neurotics people are less social and avoid to take a leading role [18]. This personality trait has negative relationship with performance [2], and complexity of job [16, 27]. Neurotic people are more prone towards violation and do not have any intention to be cognitive [26] which required absorption capacity. Based on past literature it can be concluded that neurotics do not fit to the jobs which require social relationships, long term orientation, innovation and non-economic which lead them toward breaching, do not has nay covet for new information/knowledge. Thus following hypothesis will be poised.

H2: Neuroticism will have negative relationship with absorption capacity.

Agreeableness type of personality trait can be characterised as a personality having higher level of positive attitude while living in a social or communal relationship [15]. According to John and Srivastava [15] such personality traits include the characteristics like unselfishness, tender-mindedness, faith and modesty. Agreeableness types of personalities are expected to be cooperative and forgiving [23]. The agreeableness as a personality is characterised as compromising, compassionate, accommodating, considerate, generous, supportive and tolerant [2, 9]. People with such types of personalities are more compliant and rule abiding and are less likely to engage in organization deviance. Resultantly, the third hypothesis will be poised as

H3: Agreeableness has positive and significant relationship with absorption capacity of employees.

Conscientiousness type of personality can be characterised as organized, methodical, disciplined, purposeful, achievement striving and diligent [5]. Dunn, Mount, Barrick, and Ones [10] referred conscientiousness as a highly demanding personality for hiring a candidate by different professions and organizations. Conscientiousness type of personalities have capacity to control impulse derived from external environment [15]. Conscientiousness type personalities are more interested in learning than in just performing on the job and also extremely good at maintaining performance in the face of negative feedback. But extremely Conscientiousness people typically do not perform better than those are simply above average. Based on the literature following hypothesis has been derived;

H4. Conscientiousness has positive and significant relationship with absorption capacity of the employees.

Openness to experience type of people are considered to be artistic, creative, cultured, original, open-minded, intelligent, and imaginative [22]. People with such type of personality are inclined toward transition and changes at their workplace [29] and are always open to new alternatives just because of their creative thinking new and dynamic ideas come in their mind [4]. Openness is a personality dimension that characterizes someone in terms of imagination, sensitivity and curiosity. Open people are more likely to be effective leaders and more comfortable with ambiguity and change. Openness leads to creativity [13]. According to Bing and Lounsbury [6] openness type of personality performs differently depending upon organizational factors e.g. environment, structure and culture etc. They also found that such type of personality performs well, if organizations have to deal with dynamic knowledge and experience to perform. According to Elanain [11] organizations covet people with openness types of personalities because of their capacity to perform under the vibrant situations which is associated with adaptation of new behaviour and ideas. Accordingly, this study hypothesized that;

H 5: Openness type of personality would be positively and significantly connected to absorption capacity.
METHODS

The studied population for this research paper was the employees working in WAPDA. All those employees who were not on the pay roll of WAPDA or are working with power distribution agencies e.g. Lahore Electric Supply Company (LESCO), Islamabad Electric Supply Company (IESCO) etc. were not the part of this study. Both, technical and non-technical, employees were the part of this study. Whereas non-gazetted employees were excluded from the study. The simple random sampling which is one of the probability sampling technique was used to collect data and a sample of 400 employees was selected. The sample size was kept more than the sample size calculated by using Green’s [38] formula.

Instrument

The study was conducted by developing a questionnaire based different scales developed and used by different authors. For instance, absorption capacity of the employees was measure by using 9 items scale developed by Cadiz, Sawyer, and Griffith [39] and personality traits were measured by using a 44 items scale used and developed by John, Donahue and Kentle [40]. The responses were measured on five points Likert scale.

Data collection

The data of 337 employees was collected by using paper and pencil type technique for which print out of the questionnaire was provided to the respondents. Questionnaires were served by researcher and two representatives. The representatives were well informed and trained, about the niche and notch of the research, before sending them to collect the data. There were total 63 employees who did not return or partially filled the questionnaires. Thus, the response rate was approximately 84 percent.

DATA ANALYSIS AND RESULTS

SPSS software was used for data analysis and reliability was tested by calculating Cronbach’s alpha and items which were causing lowering the alpha value were deleted. A comprehensive table representing the alpha value and items deleted for each of the variable are given in table 1. According to Nunnally [41] the scale will be reliable if Cronbach’s α ≥ 0.7 and as per this criterion the data collected for this study was found reliable.

<table>
<thead>
<tr>
<th>Variable</th>
<th>No of Items</th>
<th>Alpha Value</th>
<th>Items Deleted</th>
<th>Alpha Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Absorption Capacity</td>
<td>9</td>
<td>.79</td>
<td>FF26</td>
<td>.79</td>
</tr>
<tr>
<td>Extraversion</td>
<td>8</td>
<td>.65</td>
<td>RFFM41, FFM 20, FFM40</td>
<td>.70</td>
</tr>
<tr>
<td>Openness</td>
<td>10</td>
<td>.07</td>
<td>FF26</td>
<td>.70</td>
</tr>
<tr>
<td>Neuroticism</td>
<td>8</td>
<td>.29</td>
<td>FF26, RFFM34</td>
<td>.70</td>
</tr>
<tr>
<td>Conscientiousness</td>
<td>9</td>
<td>.41</td>
<td>RFFM8</td>
<td>.69</td>
</tr>
<tr>
<td>Agreeableness</td>
<td>9</td>
<td>.169</td>
<td>FF21, RFFM27</td>
<td>.70</td>
</tr>
</tbody>
</table>

The table 2 shows that variation inflation factor (VIF) is less than 10 which means there is no multicollinearity and multiple regression analysis can be run to estimate the dependent variable. This is in line with the findings of the study conducted by O'Brien [42]. It is also concluded that hypotheses 1, 2, 3 and 5 have been accepted at p < 0.05. Whereas, hypothesis 4 is rejected at p > 0.05.
Table 2: Regression Analysis of Hypotheses (N = 337)

<table>
<thead>
<tr>
<th></th>
<th>Unstandardized Coefficients</th>
<th>Standardized Coefficients</th>
<th>t</th>
<th>Sig.</th>
<th>Collinearity Statistics</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>B</td>
<td>Std. Error</td>
<td>Beta</td>
<td></td>
<td>Tolerance</td>
</tr>
<tr>
<td>(Constant)</td>
<td>1.243</td>
<td>.662</td>
<td>1.877</td>
<td>.061</td>
<td></td>
</tr>
<tr>
<td>EXT</td>
<td>.226</td>
<td>.056</td>
<td>.165</td>
<td>4.034</td>
<td>.000</td>
</tr>
<tr>
<td>AGR</td>
<td>.308</td>
<td>.083</td>
<td>.182</td>
<td>3.717</td>
<td>.000</td>
</tr>
<tr>
<td>CON</td>
<td>.150</td>
<td>.115</td>
<td>.059</td>
<td>1.301</td>
<td>.194</td>
</tr>
<tr>
<td>OPE</td>
<td>1.183</td>
<td>.078</td>
<td>.740</td>
<td>15.147</td>
<td>.000</td>
</tr>
<tr>
<td>NEU</td>
<td>.333</td>
<td>.069</td>
<td>.207</td>
<td>4.808</td>
<td>.000</td>
</tr>
</tbody>
</table>

a. dependent variable: ACAP

Table 3 provides information related to model testing which shows that model is significant at p < 0.05 and 52.6% change in absorption capacity is caused by independent variables i.e. openness, extraversion, conscientiousness, neuroticism and agreeableness.

Table 3: Model Summary

<table>
<thead>
<tr>
<th>R Square</th>
<th>Adjusted R Square</th>
<th>Change Statistics</th>
<th>Durbin-Watson</th>
</tr>
</thead>
<tbody>
<tr>
<td>.730°</td>
<td>.533</td>
<td>.526</td>
<td></td>
</tr>
</tbody>
</table>

DISCUSSION

From data analysis, it is found that extraversion, agreeableness, openness and neuroticism types of personalities have positive and significant relationship with absorption capacity of the employees of WAPDA. This study is in line with the studies conducted by different scholars [e.g. 44, 35] especially Robie et al. [37] who found a positive relationship between these personalities and organizational performance. Although past literature [i.e. 4, 10] shows that conscientiousness types of personalities may have significant relationship with ACAP but based on our data analysis, the relationship was found insignificant. Based on this study managers and decision makers of WAPDA can improve the organizational learning by hiring employees with personality traits of extraversion, agreeableness, openness and neuroticism. Hence same can be happened by avoiding hiring of conscientious types of personalities.

LIMITATIONS AND SUGGESTIONS

The study was conducted based on data collected from employees working at Lahore i.e. second largest city of Pakistan. A study based on data collected from employees of WAPDA working all over the country will be an effort to test the generalizability of the results. The study was a cross sectional in nature and longitudinal study will be an effort to deeply understanding the relationship. The use of IT, socialization, social network applications and other methods to improve communication among employees and other stack holders may have significant relationship with ACAP.
REFERENCES


