An Improved TOPSIS/EFQM Methodology for Evaluating the Performance of Organizations.

ABSTRACT

Studies showed that the scoring system of the EFQM has got some problems that can cause a deviation from the correct assess performance of organization. One of the reasons of this deviation could be due to the scoring approach of EFQM questionnaire. This study is to investigate relationship of each question of the questionnaire with TQM criteria and give a practical way to overcome the existing problem. In this study, with 50 questions of the EFQM and criteria of TQM, a questionnaire has been created. Then, opinions of 175 assessors dealing with EFQM are gathered about the relationship between the questions of EFQM with any of TQM criteria. The data have been processed using SPSS software and the nearest point of a fuzzy number and Topsis model. The results revealed that amount of relationship between each EFQM's question with TQM criteria isn't same therefore the weight of each question in EFQM's questionnaire is not equal to the rest of questions and TOM criteria. Also assigning equal scores to all questions of EFQM's traditional questionnaire is nonrealistic and consequently, the simplicity additive calculation of assessing performance of organization is also nonrealistic and this is created a deviation to assess properly performance of organization. According to the findings of this study, one should consider the EFQM assessors' point of view regarding the relationship between criteria of the two models in order to improve organization performance assessments. Finally, considering the level of priority in Topsis method, a relevant scoring system should be created. This can overcome the problem of deviation in assessing the organization's performance.

Keyword: EFQM, TQM, MCDM, TOPSIS, Organizational Performance assessment.