ABSTRACT

Talent Management is a very important process for organizations to identify, manage, and retain talented individuals in order to achieve the company's strategic goals. In the midst of increasingly fierce competition, companies are faced with the challenge of devising effective strategies to manage their human resources. However, the main drawback in the current system still lies in the use of recommendation systems that tend to be subjective, not based on the results of ability tests, employee performance, and psychological tests. One approach that has been applied is to use machine learning methods to overcome these weaknesses. This research aims to overcome the shortcomings in the structural position recommendation process by proposing an approach based on Support Vector Machine (SVM). In this study, we collected data from a university in A to develop a prediction model using the SVM method. The data used includes information on employees' abilities, performance, and psychometric aspects. After an intensive training process, the SVM model we developed was tested and evaluated for its performance based on predefined criteria. The experimental results show that the SVM approach in talent management can deliver promising results. The resulting model is able to provide more objective and efficient job recommendations, and reduce the level of subjectivity that often arises in the recruitment and placement process. These findings highlight the great potential of machine learning methods in improving the effectiveness of talent management in various industrial sectors.

Keywords: Talent Management, Support Vector Machine, Machine Learning, Recommendation, University