UNIVERSITI TEKNOLOGI MARA

TECHNICAL REPORT

ASSESSING THE EFFECT OF LEARNING STYLES ON STUDENTS' PERFORMANCE USING NEURO FUZZY SYSTEM (P59S19)

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ABSTRACT

In the literature on students' performance, the relative importance of students' learning styles has been subject to considerable debate. One major theoretical issue that has conquered the field for many years concerns is the ways people evaluate the students' performance that only based on students' academic results. The objectives of this research are to predict students' performance based on their learning styles using neuro fuzzy system and to determine the combination of learning style for the excellent student. The accuracy of the prediction is obtained at 87.3% with the corresponding mean absolute percentage error (MAPE) of 12.7%. This study has found that generally, neuro fuzzy system with ANFIS approach is a good tool for assessing the effect of learning styles on students' performance.

Keywords: Student performance, Learning styles, Neuro fuzzy system, VARK, ANFIS