Redefining horizons: Delving into personality trends and diverse challenges in STEM education across Malaysia

ABSTRACT

Personality is a characteristic feature of a person that is manifested in outward behavior and is influenced by the factors that make up a person's personality in life. The boom in the development of science and technology combined with the rapid progress of Industrial Revolution 4.0 (IR4.0) makes STEM education so important as a career element in the future. However, the trend of STEM students' participation in education in schools is very worrying. The purpose of this study is to evaluate the personality characteristics and trends of students' inclination towards STEM education in schools. The conceptual parts consist of an extensive search and analysis of academic articles and government publications related to personality issues and trends of STEM interest in education. A conceptual framework is proposed to identify the relationship between personality and STEM education trends based on the findings and support from previous studies. The significance of this study provides a new dimension of personality factors as a variable for the trend of interest in STEM education among students in school. This study also helps researchers and government agencies explore and evaluate the extent to which personality factors can add value in strengthening STEM education in schools.