

A Latent profile analysis of the Science teacher-trainees' self-regulated learning strategies

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Abstract

In the present study, we conducted a latent profile analysis to identify three clusters of Science teacher-trainees based on their self-regulated learning strategies. The sample comprised of 527 undergraduate teacher-trainees (Mean age = 22 years; SD = 2.20) randomly selected from seven universities in Uganda. Data was collected using the modified Motivated Strategies for Learning Questionnaire (MSLQ). These profiles including the (a) competent/expert self-regulated learners (259 students; 49.2%), (b) average self-regulated learners (193 students; 36.6%), and (c) novice self-regulated learners (75 students; 14.2%) differed significantly with respect to their motivational beliefs and academic performance, with the expert and average self-regulated learning profiles having better grade point average (GPA) scores and higher motivation compared to students in the novice self regulated learning profile. All profiles were similar with respect to age, gender and year of study. Additionally, task value and self-efficacy (but not demographic characteristics) significantly predicted latent profile membership. It is therefore important to understand such individual differences among science teacher-trainees in order to improve on their self regulated learning skills. Further implications are discussed in the paper.