

## **Secondary school students' directly measured physical activity in school physical education – The expectancy-value theory approach.**

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Physical activity (PA) offers significant health benefits. A large part of Finnish adolescents fail to accumulate at least 60 minutes of PA on a daily basis. Schools are an ideal setting for promoting PA, as schools can reach a full range of individuals in a population. The expectancy-related values are crucial factors in predicting adolescents' achievement outcomes, such as effort, persistence, performance, and choice in physical education (PE). Hence, exploring the associations between adolescents' expectancy-value profiles, and enjoyment, and directly measured PA in school PE lessons are of great value for promoting PA in PE, and overall PA. The specific aim of this study is to analyze the expectancy-value profiles based on the expectancy-value theory, and how these profiles are related to adolescents' PE enjoyment, and directly measured PA in PE lessons. The sample comprised 96 adolescents (58 girls and 38 boys) aged between 12- to 16-years ( $M = 15.03$ ;  $SD = .94$ ) from a secondary school located in Northeast Finland. Adolescents' beliefs about ability, expectancies for success, attainment values, intrinsic values, and utility values were measured by modified questionnaires developed by Xiang et al.(2003). To analyze PE enjoyment the Sport Enjoyment Scale was used. To analyze adolescents' directly measured PA, Polar activity monitors were used, which measured daily PA, ranging from moderate to vigorous PA. K-means clustering method identified two expectancy-value profiles. Adolescents with the "high" expectancy-value profile had high beliefs about ability, expectancies for success, intrinsic values, and utility values, but low attainment values. In contrast, adolescents with the "low" expectancy-value profile had low beliefs about ability, expectancies for success, intrinsic values, and utility values, but high attainment values. The adolescents in the first cluster enjoyed PE lessons more and were physically more active in PE lessons. The results revealed that high expectancy-values were related to high enjoyment, and directly measured PA in PE lessons.