

THE IMPACT OF MOTOR ABILITIES AND MORPHOLOGICAL CHARACTERISTICS ON THE SUCCESSFULNESS IN FREE STYLE SWIMMING

Abstract

The aim of this research is to determine the impact of motor abilities and morphological characteristics on the successfulness in free style swimming, before and after the realization of a swimming course. The research was conducted on the sample of 90 pupils, females, age 11-12, in the fifth grade of elementary schools from the Municipality New Town, by means of 12 motor, 7 morphological variables and 1 criteria variable. By analyzing the presented results of the regressive analysis we can establish the fact that after the initial-start in measuring, among the motor variables as a whole prediction system, the most significant impact on the criteria variable OČJTEH (swimming in 25 m lap using a free technique) has to be attached to these variables: standing on the right leg horizontally on the balance bench with eyes open (MBADNU) and deep squats (MRSDCU). On the other hand, the prediction system of morphological variables has not proved to have a statistically significant impact on the criteria variable OČJTEH. After the final-ending measurement, among the motor variables as a whole prediction system, the most significant impact on the criteria variable has to be attached to these variables: deep squats (MRSDCU) and the coordination with a stick (MKOPRP). On the other hand, again, even after the final measurement, the prediction system of morphological variables has not had any significant impact on the criteria variable.

Key words: *girls, motor, morphologies, variables, influence, swimming, regression analysis*
