ABSTRACT

AMELIA FAUZIA ANGGRAENA. 2025. Contribution of Arm Muscle Power, Leg Muscle Power, and Hip Flexibility to 50 Meter Freestyle Swimming Speed. Department of Physical Education, Faculty of Teacher Training and Education, Siliwangi University, Tasikmalaya.

This study aims to determine the contribution of arm muscle power, leg muscle power, and hip flexibility to 50 meter freestyle swimming speed in swimming athletes. The background of this study is the contribution of physical condition components that support speed, especially sports that require speed such as freestyle swimming. The method used in this study is a descriptive method with field study techniques through tests and measurements. The population in this study were 10 members of the Swimer Swim Academy Center in Tasikmalaya City and the sample used was 10 people. The sampling technique used in this study was total sampling. The test instruments used in this study were the Forward Overhead Medicine Ball Throw test, Standing Broad Jump, Sit And Reach Test and the 50 meter freestyle swimming test was used. The results of the analysis show that there is a significant contribution of arm muscle power, leg muscle power, and hip flexibility to the speed of 50-meter freestyle swimming, namely that the F count value (12.7) > F table (4.76), this is strengthened by the coefficient of determination of 86.49%. This shows that 86.49% of the speed of 50-meter freestyle swimming can be explained by the variables of arm muscle power, leg muscle power, and hip flexibility. The conclusion of this study is that arm muscle power, leg muscle power, and hip flexibility have a significant contribution to the speed of 50-meter freestyle swimming.

Keywords: hip flexibility, 50-meter freestyle swimming speed, arm muscle power, leg muscle power, swimming