

Abstract

Title: Compensatory exercises for swimmers and their use in dryland workout

Objectives: The main goal of this work is to create a suitable compensation program for swimmers, which will focus mainly on the shoulder girdle and deep stabilization system.

Methods: The research form is qualitative research. It included 4 respondents from the swimming club Slávia VŠ Plzeň. More precisely, 2 boys and 2 girls in the age range of 16-19 years. The research began with an observation of the usual fitness training of swimmers. Based on the observed movement stereotypes, a compensation program was created, including 3 exercises. We focused mainly on the deep stabilization system and shoulder girdles, which are the most problematic for swimmers. Before the start of the compensation program, an orientation questionnaire survey and an initial examination with a history were taken. The examination included aspect, muscle palpation and clinical testing focused on the shoulder girdle, goniometry and examination of hypermobility. The examination also included clinical trials for a deep stabilization system according to the DNS methodology. The subsequent intervention of the compensation program was twice a week, once under the guidance of a fitness trainer and once under my guidance. The total scope of the compensation program was 10 weeks. After 10 weeks, a follow-up examination followed, which again included clinical testing of the shoulder girdle and deep stabilization system. These examinations were subsequently evaluated. At the end of the work, this compensation program was applied to the implementation of the usual exercises from fitness training as an example of use in practice.

Results: Both research questions emerged from our work as positive. Two of the three exercises improved due to the compensation program. Specifically, we saw the greatest progress in the design in the position of the 3rd month lying on its back and in the modified position of the 5th month with the involvement of the arms in movement. Thus, the third exercise, the position of the 6th or 7th month, remained without significant progress, but even so, minor improvements were visible, especially in the support of the upper limbs.

Keywords: Muscle imbalance, swimming, shoulder girdle, deep stabilizing system