

Current issue

Archival Issues

Volume 27, 2010
Volume 26, 2009
Volume 25, 2008
Volume 24, 2007
Volume 23, 2006
Volume 22, 2005
Volume 21, 2004
Volume 20, 2003

Search

Newsletter

Authors Pathway

Information for Authors



» Journal Abstract

Key components of acrobatic jump

J Sadowski, V Boloban, W Wiśniowski, A Mastalerz, T Niżnikowski

Biol Sport 2005; 22 (4):

ICID: 891463

Article type: Original article

IC™ Value: 10.26

Abstract provided by Publisher



The purpose of the study was to conduct biomechanical analysis of basic acrobatic jump – tuck back salto after round-off and to determine the key elements of sport technique in phase structure of tuck back salto which allow the athlete to execute acrobatic jump without technical errors and to demonstrate the high mastery. One 60 Hz (JVC GR-DVL 9800 NTSC) camera and APAS 2000 (Ariel Dynamics) cinematographic analysis systems were used to analyze acrobatic jump. 7 highly skilled acrobats-jumpers (body mass 66.57 ± 1.95 kg, height 170.25 ± 2.04 cm, age 18.42 ± 1.2 years) attended to this project. Three key components were indicated in tucked back salto: lurching posture of body, “tuck” posture and its multiplication, and final posture. Then they were subsequently included in training process. All body positions were characterized by joint angles and velocities (vertical, horizontal and resultant). An important information about key elements of tuck back salto has been obtained during analysis of the velocities. The establishment of the key components of acrobatic jump, in their biomechanical analysis and in utilization of obtained results during training and educational process is the reason for further increase of exercise complexity and improvement of acrobats mastery.

ICID 891463

FULL TEXT 789 KB

Related articles

- in IndexCopernicus™
 - € Tuck back salto [0 related records]
 - ⊖ tumbling [1 related records]
 - ⊖ Technique [13 related records]

Search

Back