ARTICLE FIVE

Hip joint biomechanics at different horse paces as a method for joint function testing

M. Rukhadze, T. Nareklishvili, K. Moistsrapishvili, Medical Sport and Sport Medicine, Post graduate Medical Education and Continuing Professional Development, Tbilisi State Medical University, Georgia

Corresponding Author:
Dr Manana Rukhadze
Tbilisi State Medical University of Post graduated education and continuous Professional Developing Institute, in the direction of Medical Sport and Sport medicine.
29.I. Chavchavadze ave.0179 Tbilisi (office); Nutsubidze pl. Micro district III , Bloc 1, Bldg.7, Fl.42.
Phone: (+99532) 294289 (office), Email: mananarukhadze@yahoo.com

ABSTRACT

Biomechanical research of the hip joint is a method for testing the integral function of the joint. To assess hip joint movement amplitude and character, we developed a biomechanical research method to assess healthy people and patients with I and II degree hip joint arthrosis while riding a horse at different paces. The study found that the curve obtained in patients at trot differed significantly from that of healthy people. A difference in the angle magnitude and amplitude range of hip joint movement and in biomechanical curve height and width was also found. Inclusion of biomechanical curve as a criterion for hip joint function assessment is therefore proposed.