ABSTRACT

Title: The pressure distribution on the soles of feet in the medium parallel turn in the alpine and the telemark technique of downhill skiing

Objectives: The aim of this thesis is to compare the pressure distribution on the soles of feet in the medium parallel turn in the alpine and the telemark technique of downhill skiing.

Methods: For the analysis of pressure distribution on the soles of feet in downhill skiing was used the pressure measurement system Pedar-X, which works for monitoring of plantar pressure (kPa) moreover. The pressure distribution measuring on the soles of feet was taking place in prepared track of the ski slope in two ways. The first one was the telemark technique and the second one was the alpine technique. For the evaluating and the processing of the results was selected in the right and in the left turn of each testing person in approximately the same part of the track.

Results: The results of pressure distribution in the alpine and the telemark position turn have shown the significantly important difference in the intraindividual comparison in every technique. The significantly important difference was detected also in the interindividual comparison in both techniques each other.

Keywords: downhill skiing, telemark, Pedar-X, pressure distribution