

## **Abstract**

**Title:** Occurrence of ankle sprain injury among basketball players in relation to selected factors

**Objectives:** The main objective of the master degree thesis is to evaluate the relationship between selected risk factors and the occurrence of ankle sprain injury among basketball players aged 15-40 who actively participated in league competitions from the regional championship to the highest league in the Czech Republic in the 2019/2020 season.

**Methods:** The theoretical part is processed by a domestic and foreign literature research. The practical part uses the method of quantitative research in the form of descriptive analysis. The data were obtained through an anonymous non-standardized questionnaire, which was distributed among basketball players who actively participated in various league competitions in the 2019/2020 season, from the regional championship to the highest league in the Czech Republic. Analysis involved data about various risk factors for ankle sprain injury. Data from completed questionnaires were processed using descriptive statistics in Microsoft Excel. The logistic regression model (logit) was used to determine the influence of individual variables on the occurrence of ankle sprain injuries. The logistic regression model was estimated for each hypothesis using Gretl statistical software.

**Results:** The results showed that the occurrence of ankle sprain injury is influenced primarily by 4 risk factors, including: gender, player position, the presence of air cells in the heel of basketball shoes, and ankle joint distortion in players' medical history. The most effective tool for preventing ankle sprain injury was a solid tap together with an ankle brace.

**Keywords:** basketball, ankle joint, ankle sprain injury, risk factors