

Main Outcome Measurements Fatigue expressed as the percentage of jump-loss (10%) was the dependent binary variable. A stepwise logistic regression analysis was used to analyze the relationship between fatigue, covariates, and factors.

Results Previous soreness and the number of jumps performed in practice or competition were the only factors found to be related to a significant level of fatigue experienced by the athletes ($p < 0.001$).

Conclusions Although monitoring processes in team sports are today frequent, not all the load markers seem to have the same importance explaining the level of fatigue experienced by the athletes. Pre-practice level of muscle soreness and the number of jumps performed during the activity, a specific expression of external load in volleyball, reveal as the key elements to be controlled by coaches and practitioners to promote an optimal load adaptation.

116 ABSTRACT WITHDRAWN

117 PERCEPTIONS OF TRAINING LOAD AND WELLNESS MONITORING OF STELLENBOSCH UNIVERSITY HIGH PERFORMANCE STUDENT-ATHLETES

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Background The effective monitoring of athletes can assist in optimising their performance. This monitoring is particularly important in university student-athletes who have academic stressors additional to their training. The Stellenbosch University High Performance programme manages the top student-athletes and have implemented a training load and wellness monitoring system to assist with this.

Objective The aim of this study was to investigate the student-athletes' perceptions of this monitoring system and identify potential barriers to their adherence to the programme.

Design Cross-sectional survey.

Setting Students (young adults) who were part of the Stellenbosch University High Performance programme in 2019.

Patients (or Participants) All 156 High Performance athletes across six sporting codes received the survey, of which 146 (96%) submitted a complete survey.

Interventions (or Assessment of Risk Factors) A six-question survey was distributed via the programme manager to the student-athletes ($n=156$).

Main Outcome Measurements Four of this survey's questions were based upon a study conducted in nine elite U.K. athletes and two additional questions were specific to the Stellenbosch High Performance context. Results were presented as frequencies on the original studies Likert scale.

Results Half (50%, $n=74$) of all athletes agreed that they received sufficient feedback from the data that they entered. Almost half (46%, $n=69$) agreed that sufficient action was taken by their Strength and Conditioning trainers when they indicated a meaningful change in their monitoring scores. Almost all (97%, $n=144$) athletes agreed that they responded

honestly to training monitoring questions. About two-thirds (67%, $n=100$) of athletes agreed that training monitoring and feedback helped to optimise their training performances.

Conclusions The Stellenbosch High Performance student-athletes were substantially more positive about training monitoring than the elite UK athletes. This positivity bodes well for the Stellenbosch High Performance programme, but also highlights the importance of regular feedback to these student-athletes.

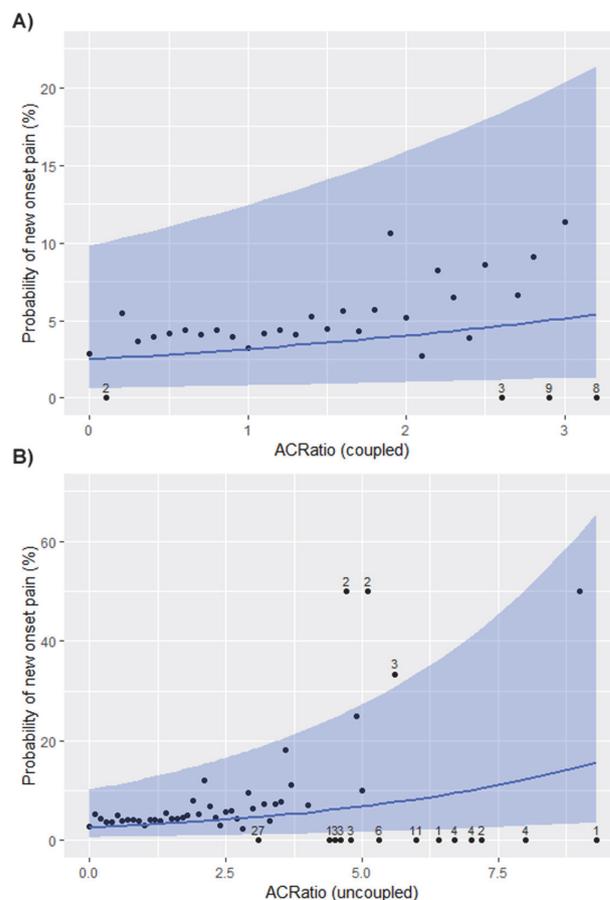
118 APPLICATION OF THE ACUTE:CHRONIC WORKLOAD RATIO IN CHILDREN

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Background The IOC recommends using the acute:chronic workload ratio (ACRatio) to quantify changes in relative activity. The ACRatio has been used in adult and youth but not in children.

Objective Determine the relationship between the ACRatio and new onset pain in children.



Abstract 118 Figure 1 Probability of new onset pain at different A) coupled and B) uncoupled ACRatios. Logistic regression curves with 95% CIs were fitted. The number of observations are shown for outliers