

# AB105. SOH21AS259. An audit of routine pre-participation medical evaluation in athletes attending for laboratory-based exercise testing and a profile of endurance athletes in Ireland

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**Background:** The pre-participation medical evaluation (PPE) of athletes prior to undergoing graded exercise testing is routine practice in the Trinity College Dublin human performance laboratory. The aim of this study was to compare data collected in 2017/18 with that of 2012/13, since the introduction of an updated PPE process and to build a profile of endurance athletes.

**Methods:** This study was a retrospective, anonymised, clinical audit. A twelve-month period in 2012/13 and 2017/18 was reviewed. Data was cleaned, coded and inputted into an Excel spreadsheet. The level of significance was assessed using a 3x2 Fisher's exact test, run on Stata Version 16. A 2x2 Chi-Square test was then used to evaluate the level of significance for categorical data.

**Results:** Athletes [n=211; age 34±11 years; 159 (75%) male, body mass 76.7±14.1 kg, height 1.79±0.01 m; 52 (25%) female, body mass 61.2±7.1 kg, height 1.68±0.01 m] completed the PPE process; 138 (65.4%) maximal tests were performed. There were 45 (21.3%) sub-maximal tests performed due to age restriction (>35 years) and no exclusions from testing. The largest group tested was runners at 81 (39%). Of 208 previous injuries reported,

54% (n=113) affected the lower limb, most commonly, the knee.

**Conclusions:** The results suggest that a pre-test information leaflet minimised exclusion from testing. Review of the PPE form indicated a high number of recent musculoskeletal injuries in the athletes' history, suggesting the need for a physiotherapy pathway to be created for these athletes.

**Keywords:** Runners; musculoskeletal injuries; exercise testing

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## Footnote

*Conflicts of Interest:* The authors have no conflicts of interest to declare.

*Ethical Statement:* The authors are accountable for all aspects of the work in ensuring that questions related to the accuracy or integrity of any part of the work are appropriately investigated and resolved.

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