A REVIEW OF THE PHYSIOLOGICAL AND ANTHROPOMETRICAL CHARACTERISTICS OF RUGBY LEAGUE PLAYERS

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ABSTRACT

To determine the anthropometric and physiologic characteristics of rugby league players based on a review of literature. Searches of PUBMED, CINHAL, OVID MEDLINE, SCOPUS, and SPORTDISCUS databases were performed for studies published in English from 1948 to May 2008. Terms utilized for the search of relevant research studies included anthropometric, physiologic, rugby league. Qualifying studies were mainly uncontrolled descriptive trials. Outcomes were body mass, sum of skinfolds, muscular power, speed, agility and estimated maximal aerobic power of rugby league players. Excess body fat has a detrimental effect on players’ sporting performance. Forwards have a higher body mass than backs in most, but not in all published studies. Amateur forwards had a higher estimated body fat percentage (19.9%), lower body mass (90.8 kg), lower vertical jump height (38.1 cm) and lower estimated VO\textsubscript{2MAX} (38.1 ml kg\textsuperscript{-1} min\textsuperscript{-1}) than semi-professional and professional players. Anthropometric and physiologic capacities of rugby league players and the physiologic demands of rugby league participation generally increase as the participation levels increase. However, there is evidence that player physiologic capacities may deteriorate as the season progresses. This has been shown to occur with increases in skin fold thickness and some decrement in players’ maximal aerobic power and muscular power over a season.

Keywords: Rugby league; Anthropometric; Physiologic.