Abstract

Mobile Applications for the Sport and Exercise Nutritionist

Since the 2000s, advances in mobile technology have moved tools once reliant on specialised facilities into the pockets of practitioners and students, increasing accessibility and portability of measurement. In sport, mobile applications (Apps) could now log activities, collect physical data such as vertical jump height and heart rate, and share information. Often free of charge, but with untested claims. Critics raised concerns around reliability and validity, and some of our early work conducted simple comparison studies to test the claims made. Fast forward to the present day and such technology is ubiquitous, but the same critical thinking should be applied even though the technology has progressed. Survey data from 2021 shows that sport and exercise practitioners are using apps to collect data, and many choose tools without published evidence of validity, so popularity is an unreliable guide to quality.

In nutrition there is an abundance of Apps that can, or at least claim to, log and track dietary intake, measure body composition, and support nutrition education and counselling. In 2022 we published a narrative review of the evidence for mobile Apps in sport and exercise nutrition, and part of this talk will summarise that evidence and provide updates with work published since. Key points include variation of under reporting of dietary intake between individuals, repeatable body composition measurements with varied agreement against accepted standards, and the contribution of the digital component to education trials.

We will weigh up the pros and cons of such technology for sport and exercise nutrition, explore what this could mean for professional practice when working with individuals or groups, and consider the future of this technology in light of growing public access to artificial intelligence (AI). AI is an integral part of many off–the–shelf apps. With such advances, will we soon all be able to make our own app in minutes?