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Comment on "The Great British Medalists Project: A Review of Current Knowledge on the Development of the World's Best Sporting Talent"

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This letter concerns the review titled "The Great British Medalists Project: A Review of Current Knowledge on the Development of the World's Best Sporting Talent" [1]. The aim of the review was to identify "what is known and what is thought likely to be true in relation to understanding the development of the world's best sporting talent" (p.1042). The review was described by the authors as "authoritative, balanced, [and] comprehensive" (p.1041). However, in at least one regard, I believe the authors have fallen short of their aim and description.

Among the topics covered in the review is the role of personality traits and perfectionism, in particular, in the development of talent in sport. On this matter, the authors conclude that "Super-elite athletes are conscientious, optimistic, hopeful, and perfectionist" (p.1049) [1]. In regards to the specific evidence on which the conclusions about perfectionism were based, the authors state that "There is…evidence at non-elite, elite, and super-elite level that athletes display *adaptive* perfectionism – a tendency to maintain perspective on performances while striving to achieve exceptional standards" (p.1046). This was juxtaposed with maladaptive perfectionism which was described as having "…many negative outcomes (e.g., burnout, preoccupation with mistakes and self-doubts)" (p.1046) for athletes. I have three main concerns regarding the conclusions of the review. These concerns are outlined below.

Firstly, while it is pleasing to see that the authors of the review [1] are mindful of distinguishing between different dimensions of perfectionism, few researchers use the terms "adaptive" and "maladaptive" perfectionism (unless testing a specific model of perfectionism, the tripartite model [2]). Indeed, many researchers who contribute to research examining perfectionism in sport discourage the use of these terms. This is because it is considered poor practice and overly simplistic to label a personality characteristic in a

manner that presumes its consequences. Few personality characteristics are adaptive or maladaptive for everyone, all of the time. This practice also leads to tautological arguments (e.g., adaptive perfectionism is adaptive because it contributes to adaptive things) [3].

Secondly, only one citation [4] in the review [1] accompanies the conclusion that super-elite level athletes display adaptive perfectionism. In the cited study super-elite athletes were interviewed and adaptive perfectionism was identified by the authors as a personality disposition that characterised the accounts of the interviewees [4]. To me, neither this study nor the other perfectionism research studies cited in the review that address tangential issues (e.g. performance and burnout in non-elite athletes [5-7]) are reasonable grounds on which to base the conclusions offered. To my knowledge, there are only three studies that have examined whether levels of perfectionism differ depending on athlete status [8-10]. These studies have produced mixed findings and none are cited in the review.

Thirdly, the broader context in which the conclusions are offered makes them particularly precarious and worrisome [1]. I refer specifically to the results of three recent meta-analyses that evaluated perfectionism [11-13]. These analyses found perfectionism to be positively correlated to general psychopathology, depression and suicide ideation. In some instances, this includes dimensions of perfectionism that have been described as "adaptive." Super elite athletes participating in research (or, indeed, any athletes included in research on the basis of their success and ability to navigate the trials and tribulations of sport) may misrepresent the actual influence of characteristics such as perfectionism in regard to psychological difficulties. We might describe this as a "super"-healthy participant problem and it is a problem that is likely to be pervasive in research that seeks to identify the characteristics of high performers. Therefore, there is a danger that even with the best intentions, by promoting

any dimensions or forms of perfectionism, researchers, practitioners and policy makers may inadvertently compromise the welfare and development of athletes.

In actuality, what is known and what is thought likely regarding perfectionism is complex. For what is currently known, I encourage researchers, practitioners, and policy makers to read reviews of research dedicated to perfectionism. Some reviews are available that provide short and accessible accounts of existing research, e.g., Hill and Madigan [14]. When the requirement of researchers, practitioners, and policy makers stretches beyond current empirical research, the reflections of those leading research in this area should be consulted, e.g., Flett and Hewitt [15]. It is noteworthy that the accounts of some of these individuals directly oppose the notion that perfectionism is likely to provide the basis for long-term talent development, performance, and wellbeing of athletes.

Compliance with Ethical Standards

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Conflicts of Interest

Andrew Hill declares he has no conflicts of interest relevant to the content of this letter.

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