Key Information

Title of Paper
Case Study: Nutritional and Lifestyle Support to Reduce Infection Incidence in an International-Standard Premier League Soccer Player

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Laurent Bannock and Scott L Robinson are both SENr High Performance Registrants. Mayur K Ranchordas is currently in the application process for SENr High Performance Registration

URL link or full paper if Open access

The Study

Why did you undertake this study?
Elite level professional football players can compete in up to 50 games per season. Coupled with an intensive training regime, this places large physiological and psychological demand on players, which which could provoke a reduction in immune function and increase susceptibility for upper-respiratory tract infection (URTI). This is undoubtedly a cause for concern, largely because illness can compromise a player’s availability for team selection, which can negatively impact team performance. It is the role of practitioners to implement strategies that encourage player well-being and minimise risk of exercise-induce immune dysfunction. Despite insightful studies that have documented the influence of nutrition on immune function and infection risk, there is a paucity of studies that demonstrate ways in which practitioners can interpret and use this information in the applied setting. Therefore, we sought to provide a case study that demonstrates how a scientific yet pragmatic nutrition strategy can be implemented to improve immune function and reduce infection incidence in an illness-prone international-standard English Premier League (EPL) soccer player.

What did you find?
Throughout the 12-week intervention there was a positive increase in serum vitamin D 25(OH) concentration and salivary immunoglobulin-A, as well as a decline in the number of URTI symptoms. Essentially, the player maintained availability for all training and matches during the course of the intervention.
What are your key messages from this research for SENr practitioners?

We demonstrate that a scientifically supported nutrition and lifestyle intervention can be suitably implemented to improve markers of immune function and reduce infection risk, which can have a significant and positive impact upon player availability.

Although we were unable to decipher the relative contribution of each strategy employed in this study to this favourable effect, we emphasise that all strategies employed were safe (i.e., the supplements [provided] were certified by Informed Sport and not on the WADA Prohibited List), scientifically supported and practically appropriate. We would highlight that these are crucial considerations in a situation when the overall contribution of each strategy is unknown.

Furthermore, we explained to the player ‘why’ were were advising the nutrition and lifestyle strategies, and ‘how’ they could benefit him. Coupled with the favourable outcomes of the study, this educational approach was a crucial element of the intervention as the player acknowledged that it encouraged him to continue improving his dietary and lifestyle behaviours after the period of study.

What is next for your research?

To ascertain whether this approach (including the educational aspect) is a viable means of reducing infection / illness incidence among other players such as a team.

Contact Details: If SENr members wish to contact you directly, which is the best way for them to do this?

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