Reviewer's report

Title: Limited Ankle Dorsiflexion Increases the Risk for Achilles Tendinopathy in Infantry Recruits - A Prospective Cohort Study

Version: 1 Date: 22 September 2014

Reviewer: Anna V Lorimer

Reviewer's report:

Major Compulsory Revisions

In the introduction line 66 it is discussed that the knee is usually bent to about 40 degrees during running and that the knee is even straighter when walking. However, the methodology has assessed ankle dorsiflexion ROM non-weight bearing at 90 degrees. I think this needs to be addressed in the discussion or limitations as to why 90 degrees knee flexion was chosen and how it relates to running and/or development of AT.

Sentence starting at line 74 going to line 79. This sentence is too long and confusing.

Sentence starting line 313 to 317. This sentence is too long. Needs to be split up.

Sentence 297-299. Describes how the experimenter used their body weight to facilitate the range of motion. This needs to be included in the methods section as it is an important part of reproducing the results.

Sentence 328-331. This addresses something not previously mentioned. Either Prevention strategies should be addressed in the discussion or this sentence removed.

The results table (Table 2) shows that left leg WB DF was also significant different between injured and non-injured to the same level as the right NWB DF. This needs to be discussed (if using p values to determine whether there is an effect or not).

Minor Essential Revisions

As the analysis was only carried out in army male recruits you cannot make inferences to other individuals who do intense physical activity. (lines 47-48 and 328) There are many differences in training and equipment between athletes and army personnel and I suggest keeping the conclusions to army recruits.

Line 38-39 ....period for the development of AT. Adjust wording for example "participants were followed for a 6-month period of army basic training with recording of AT development".

Specify in the introduction that looking exclusively at mid-portion tendinopathy.
Discretionary Revisions

Given the results which show the same level of statistical significance for right leg NWB and Left leg WB DF I would consider analysing the data using effect sizes, confidence intervals and magnitude based inferences as outlined in [Hopkins, W. G., et al. (2009). "Progressive statistics for studies in sports medicine and exercise science." Medicine and Science in Sports and Exercise 41(1): 3-13.] for further information you can also visit sportsci.org.

Level of interest: An article of importance in its field

Quality of written English: Acceptable

Statistical review: No, the manuscript does not need to be seen by a statistician.

Declaration of competing interests:

I have no competing interests.