

COMMENTS

Dear,

research is interesting, data analysis, and interpretation of the results are appropriate.

All comments that are technical in nature are given as follows:

The text needs proofreading. Abstract is poor: different terms „power“ (L38) and „ressistance“ (L41) for the lower limb testing could be cofusing and hard to follow for readers.

The same goes for „40m sprint“ that should be „maximal running speed“.

(Chapter 1. Introduction)

The sentence/classification in line 97 "...c) girls in middle adolescence (13 years old and above)..." is not consistent with sentence/classification presented in line 112 "...and 2) middle adolescence (15–19 years old)...". Authors should choose one classification only.

(Chapter 2. Material and Methods)

Note within the Table 1 is false.

Sub-chapter 2.1.9. should be „Maximal running speed“ and not „Maximal running velocity“.

The sentence in L198-199 „The test of 40 meters sprint time for the evaluation of the running speed of 40m max-198 imal velocity was“ is not logic (not finished).

In addition, both terms „speed“ and „velocity“ are used, representing scalar and vector, respectively, that can lead to confusion in readers.

Hence, the term „maxmal running speed“ should be used through all the text.

„3. Statistical Analysis“ in L207 should be „2.2 Statistical Analysis“.

(Chapter 3. Results)

Sub-chapter 2.1.8. Horizontal jump is introduced with new term: Horizontal jump.

What happend with the term „lower limb power“?

Authors should be consistent, otherwise confusion in readers could occur.

New term „lower limb resistance“ is introduced in line 240.

Authors should be consistent and use term „lower limb power“, as indicated earlier in the text in L38 (within the abstract).

Title of Figure 5 „limb power, cm, and centimeters“ is confusing.

(Chapter 4. Discussion)

New term related to maximal running speed is introduced in sentence „...40 meters sprint time...“ (L504). It could be complicated for readers to connect meanings of different expressions for the maximal running speed.

(Chapter 5. Conclusions)

This chapter should give answers to hypotheses presented in Introduction chapter:

We hypothesized that: a) 95 girls would show higher rates of obesity than boys; b) girls would present worse physical 96 fitness than boys; and c) girls in middle adolescence (13 years old and above) would present higher rates of obesity than younger girls, and boys from all age groups also.

But, it is not a case.

Another remark: Authors used term „hypothesis“ both for the main research hypotheses presented in L95-98, and for data processing (L215 and L220), which can be confusing for readers.

I suggest to separate them by expression „assumption“ in L215 and L220.