Reviewer's report

Title: Varicose Veins in Hairdressers and Associated Risk Factors: A Cross-sectional Study

Version: 6 Date: 24 March 2014

Reviewer: Hristina D Vlajinac

Reviewer's report:

This study examines risk factors for developing varicose veins among hairdressers in Taiwan, with a focus on long-term standing at work. The study addresses important questions, but there are also several major and minor issues that should be addressed by the authors.

Major Compulsory Revisions:

The main problem concerns analysis of data.

1. Since participants with and without VV significantly differed by age, all other comparisons between these two groups should be age adjusted (variables presented in Tables 1 and 2) and after that, variables significantly associated with VV at a level of p # 0.1, should be included in the multivariate analysis.

2. Taking into account relatively small number of participants, especially when they are divided into two age subgroups, and consequently imprecise estimate of OR (broad confidence interval), it would be better to perform one multivariate analysis with all participants. Age should be included in the multivariate model.

3. In line with the above proposed changes in data analysis, Table 3 should be deleted and Tables 4 and 5 should be replaced by a single one presenting the results for the whole study group.

Minor Essential Revisions

Some of the following corrections might not be relevant after changes that you should make in the whole text because of the new analysis of data.

Abstract

1. In the Background section, line 4, from the beginning of the sentence “We conducted a study is to identify...” the word “is” should be deleted.

2. In the Conclusion section, line 1, “...is a major risk factor of developing...” should read “...is a major risk factor for developing...”

Introduction

3. The second sentence of the first paragraph should be corrected. Age has been considered not only as “an aggravating factor”, but also as a risk factor for VV.
4. In the first paragraph, line 6, the first part of the sentence “Prolonged standing at work had been suspected as an aggravating...” should read “Prolonged standing at work has been suspected as a risk factor or an aggravating....” At the end of this sentence additional references should be added.

Method

Data collection
5. At the end of the second sentence ”Data on demographic....were collected from each participants.” add “by the use of self-administered questionnaire”.

Results
6. In the second sentence of the first paragraph “The average age was 45.8 years old...” the words “years old” should be deleted.

7. At the end of the second paragraph, text in bracket “(all with p< 0.05)” should read “(all with p> 0.05).”

Discussion

Family history of Varicose Veins
8. Please, do not repeat the results in detail in the Discussion section.

9. On page 9, lines 4-6, the sentence “Some other studies also showed that a family history of VV was a major risk factor [8-11], and a study demonstrated that the risk increased dramatically in relation to the number of morbid parents [12].” should read

“Some other studies also showed that a family history of VV was a major risk factor [8-11], and a study conducted by Cornu -Thenard et al. demonstrated that the risk increased dramatically in relation to the number of parents with VV [12].”

Methodological Considerations
10. In this section relatively small number of participants should be mentioned as a study limitation.

Conclusion
11. In the first line “...a major risk factor of developing...” should be replaced by “...a major risk factor for developing.

Tables
12. When presenting the results of multivariate analysis, OR and 95% confidence interval are sufficient. Do not present numbers of participants.

**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 declare that I have no competing interest.