PEER REVIEW HISTORY

BMJ Open publishes all reviews undertaken for accepted manuscripts. Reviewers are asked to complete a checklist review form and are provided with free text boxes to elaborate on their assessment. These free text comments are reproduced below.

ARTICLE DETAILS

Title (Provisional)

Risk, Incidence and Predictors of Venous Thromboembolism among Patients attending the Emergency Department of Tertiary Care Hospitals in Addis Ababa City, Ethiopia: A Multicentre Prospective Study

Authors

Degefa, Worku; Woldu, Minyahil Alebachew; Mekonnen, Desalew; Berha, Alemseged Beyene

VERSION 1 - REVIEW

Reviewer	**1**
Name	**Pande, Shrikant**
Affiliation	**Changi General Hospital, Rehabilitation medicine**
Date	**23-Sep-2024**
COI	**None**

Dear colleague many thanks for asking me to review this manuscript.

I have following questions and corrections:

1. Abstract: results line 3504: it appears that patients who were active, cancer, sepsis etc seems to have less incidence of DVT/PE.

2. Patient involvement section: line 9-16 is bit confusing, please clarify.

3. Page 9, Result sectionalise 47: if possible clarify heart disease, which cardiac diseases it include?

4. Page 11: line 36-40:it appears that patients who were active, cancer, sepsis etc seems to have less incidence of DVT/PE.

5. Page 12: line 45-48:it appears that patients who were active, cancer, sepsis etc seems to have less incidence of DVT/PE.

6. Discussion: page 14: line 51-58: please clarify what do you mean by unnecessary .

7. Limitation: please correct Capital letters in the paragraphs.

8. When authors use term, patients who were on anti-coagulants prior to admission, what was the indication for them. Was there any benefit of using anti platelets?

9. When you mention Acute kidney injury: the main reasons for AKI is other causes i.e dehydrations, sepsis, drugs etc, can you Kindly comment on this.

many thanks

Reviewer **2**

Name **Meremo, Alfred**

Affiliation **University of Dodoma College of Health and Allied Sciences, Internal Medicine**

Date **04-Oct-2024**

COI **None**

Title: Consider change of tittle to Incidence, Risk factors and Predictors of Venous Thromboembolism among Patients attending the Emergency Department of Tertiary Care Hospitals in Addis Ababa City, Ethiopia: A Multicentre Prospective Study

- The risk on your title doesn't appear anywhere on the paper except on the results section

Abstract:

- Results: If you can report on the demographic and clinical characteristics of the study population and risk of VTE. Talk on predictors and not risk factors for VTE as this data wasn't done.

Results:

- Table 3 is reporting on risk factors for VTE but they didn't run a logistic regression analysis (70.6% of those who scored ≥ 4 against the rest)

- Table 4 Consider deleting the 4th column with No, though the 18 patients small to run any associations (To consult statistician).

- Kaplan Meier curves have 40 on the follow up time is it days, weeks or months knowing that the study was conducted for 3 1/2 months.

VERSION 1 - AUTHOR RESPONSE

Response to Reviewer' comments

Comment 1: Abstract: results line 3504: it appears that patients who were active, cancer, sepsis etc seems to have less incidence of VTE

Response 1: Dear reviewer, sorry for unclear explanation we mean that patients who have active cancer and acute infection (e.g., sepsis) were found to have high incidence of VTE whereas patients who were physically active, receiving prophylaxis they were found to have less incidence of VTE

Comment 2: Patient involvement section: line 9-16 is bit confusing, please clarify.

Response 2: Dear reviewer, we have made a correction as per the comments

Comment 3: if possible, clarify heart disease, which cardiac diseases it includes?

Response 3: Dear reviewer, our data identified heart disease including acute coronary syndrome and myocardial infarction

Comment 4: Page 11: line 36-40:it appears that patients who were active, cancer, sepsis etc seems to have less incidence of DVT/PE

Response 4: Dear reviewer thanks for your comment, we have made a correction as per the comment.

Comment 5: Page 12: line 45-48:it appears that patients who were active, cancer, sepsis etc seems to have less incidence of DVT/PE

Response 5: Accommodated

Comment 6: Discussion: page 14: line 51-58: please clarify what do you mean by unnecessary

Response 6: change has made on manuscript by renaming it “inappropriately”

Comment 7: Limitation: please correct Capital letters in the paragraphs.

Response 7: We have made a correction as per the comments.

Comment 8: When authors use term, patients who were on anti-coagulants prior to admission, what was the indication for them. Was there any benefit of using anti-platelets?

Response 8: Patients who were on anticoagulant prior to admission in this context are those receiving long term treatments for any type of established VTE. However, we did not exclude those patients using antiplatelet for any potential benefit, as the ACCP guideline recommend the use of antiplatelet for VTE prophylaxis.

Comment 9: When you mention Acute kidney injury: the main reasons for AKI are other causes i.e dehydrations, sepsis, drugs etc, can you Kindly comment on this.

Response 9: Dear reviewer, our intention was not to identify the causes of AKI. While we did mention AKI and other emergency admission diagnosis in our data, our goal was simply to describe what the clinical characteristics of emergency patients look like rather than associating them with VTE incidence.

Responses for Reviewer 2 comments

Comment 1: Consider change of tittle to Incidence, Risk factors and Predictors of Venous Thromboembolism among Patients attending the Emergency Department of Tertiary Care Hospitals in Addis Ababa City, Ethiopia: A Multicentre Prospective Study

- The risk on your title doesn't appear anywhere on the paper except on the results section

Response 1: Dear reviewer, thank you for your recommendation. In this study we did not intend to determine the risk factors for VTE. The risk factors for VTE in medically ill patients in EDs have already been identified in the Padua risk assessment model as stated in Table 3.Using this model, our aim was to determine the level of the risk(high or low risk)and predictors for the occurrence of VTE incidence (which is the outcome of interest) . Therefore, the title "Venous Thromboembolism Risk" implies the level of risk based on the Padua risk assessment tool calculation.

Comment 2: If you can report on the demographic and clinical characteristics of the study population and risk of VTE. Talk on predictors and not risk factors for VTE as this data wasn't done.

Response 2: Dear reviewer, please consider and take note of our research intention based on our response number 1.

Comment 3: Table 3 is reporting on risk factors for VTE but they didn't run a logistic regression analysis (70.6% of those who scored ≥ 4 against the rest)

Response3: Dear reviewer, this was to determine the level of VTE as 70.6% of those who scored ≥ 4 said to be high risk of developing VTE

Comment 4: Table 4 Consider deleting the 4th column with No, though the 18 patients small to run any associations (To consult statistician).

Response 4: Dear reviewer thanks for your comments and concern. The choice of an adequate sample size for a Cox regression analysis is generally based on the rule of thumb derived from simulation studies of a minimum of 10 events per variable (EPV). From this, sample size 18 can be used and relaxed to run a candidate predictor.

Comment 5: Kaplan Meier curves have 40 on the follow up time is it days, weeks or months knowing that the study was conducted for 3 1/2 months.

Response 5: - Dear reviewers, thank you for your comment, the "40" on the follow up time indicated the number of days. #

VERSION 2 - REVIEW

Reviewer	**2**
Name	**Meremo, Alfred**

Affiliation **University of Dodoma College of Health and Allied Sciences, Internal Medicine**

Date **05-Nov-2024**

COI

ABSTRACT:

Results: If you can add results for the demographic and clinical characteristics of the your study population.

Also, The incidence is missing on abstract [A total of 18 patients (4.3 %.) had a VTE diagnosis during their emergency stay].

RESULTS:

Table 4: 18 patients is a small number to run any associations (To consult statistician). Should consider reporting on risk factors associated with VTE (70.6% of those who scored ≥ 4 against the rest with less than 4)

DISCUSSON:

Consider discussing your study findings comparing with what has been done elsewhere and not writing a literature review on the topic.

An incidence of 4.3 is not high???

REFERENCES:

Consider using current references (from 2018 upwards)

VERSION 2 - AUTHOR RESPONSE

Response for reviewers

Comment 1: If you can add results for the demographic and clinical characteristics of the study population in the result of abstract section and the incidence is missing on abstract [A total of 18 patients (4.3 %.) had a VTE diagnosis during their emergency stay].

Response 1: Thanks Dear Review , Changes have been made**.**

Comment 2: under RESULTS:

Table 4: 18 patients are a small number to run any associations (To consult statistician). Should consider reporting on risk factors associated with VTE (70.6% of those who scored ≥ 4 against the rest with less than 4)

Response 2: Dear reviewer thanks a lot for your recommendation, we agreed with your consideration. However, we explained as limitation.

Comment 3: under DISCUSSON:

Consider discussing your study findings comparing with what has been done elsewhere and not writing a literature review on the topic.4.3% incidence is not high?

Response 3: Dear Reviewer, when we say as our finding showed high incidence, we mean that it is relatively high as compared to the results reported elsewhere from Nigeria (3.1%), India (3.2%),Italy (2.4%),and Netherland (3.6%).

Comments 4: -
REFERENCES:
Consider using current references (from 2018 upwards)

Response 4: - Dear Reviewer, thanks for your comment. We have done our best to utilize the updated references primarily from online free open access journal.