http://jmscr.igmpublication.org/home/
ISSN (e)-2347-176x ISSN (p) 2455-0450
crossref DOI: https://dx.doi.org/10.18535/jmscr/v8i11.02

IGM Publication
Journal Of Medical Science And Clinical Research
An Official Publication Of IGM Publication

Demographic Correlation with Varicose Veins - A Prospective Study

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Abstract
Background: *The study was conducted to analyse the age, sex and occupational incidence in varicose veins.*
Materials and Methods: *This study was conducted in 52 patients diagnosed with varicose veins who were admitted in the department of General Surgery, Rajah Muthiah Medical College from October 2018 to September 2020.*
Results: *Males were most affected, 4 times higher than females. The patients within the age group of 41-50 years had the highest incidence. Agriculture worker 32.7%, tea shop worker 26.9% and Hotel worker 15.4% are the highest percentage of worker having chronic venous disease.*
Conclusion: *Highest incidence of varicose veins have been observerd in middle age group range between 31-50 years. Males had predominance over females. This study also proves that occupation demanding long time of standing is the leading cause for varicose veins. So, middle aged men with varicose veins doing long standing jobs are advised to change their jobs.*
Keywords: *Varicose veins, incidence, middle age.*

Introduction

The term varicose is derived from latin word varix meaning 'bent'. Varicose limb which has lost its valvular efficiency and as a product of the resultant venous hypertension in standing position becomes dilated, tortuous, elongated and thickened. Varicose vein are known from antiquity since Hippocrates and treatment in its length and associated with varicose ulcer.

Varicose veins of the lower limb are the most common vascular disorder affecting the human beings.It's almost certainly the price we pay for the erect posture. Nowadays we have various options are available for treating varicose veins. Our renewed interest in the incidence and management of varicose veins has prompted a reappraisal of its basic components and how they are individually affected by biological, mechanical and physical forces. The ultimate goal of varicose veins management is safe and easy manipulation of the healing process we are closer to that goal than ever before.

Materials and Methods

The study was conducted in the Department of General Surgery, Rajah Muthiah Medical College and Hospital diagnosed with varicose veins. The period of study is from October 2018 to September 2020 (2 years). The sample size is 52.In this study, patients admitted with diagnosis of secondary varicose vein other than deep vein thrombosis and patients with recurrent varicose veins have been excluded.

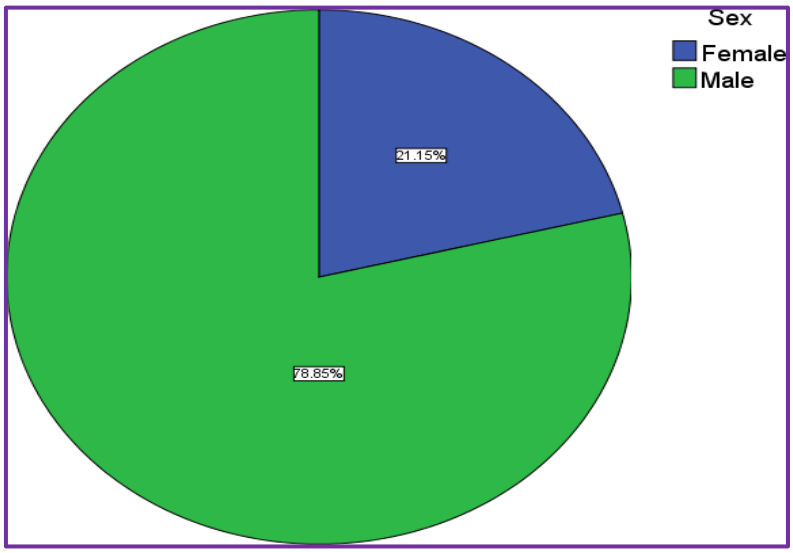
Results

SEX: In our study, males were mostly affected than females, the ratio of male: female being 4:1.

Table 1: Sex

Sex	Frequency	Percent
Female	11	21.2
Male	41	78.8

Graph-1: Sex



AGE: The mean age was 45.4 years [table 2].

Table 2: Age

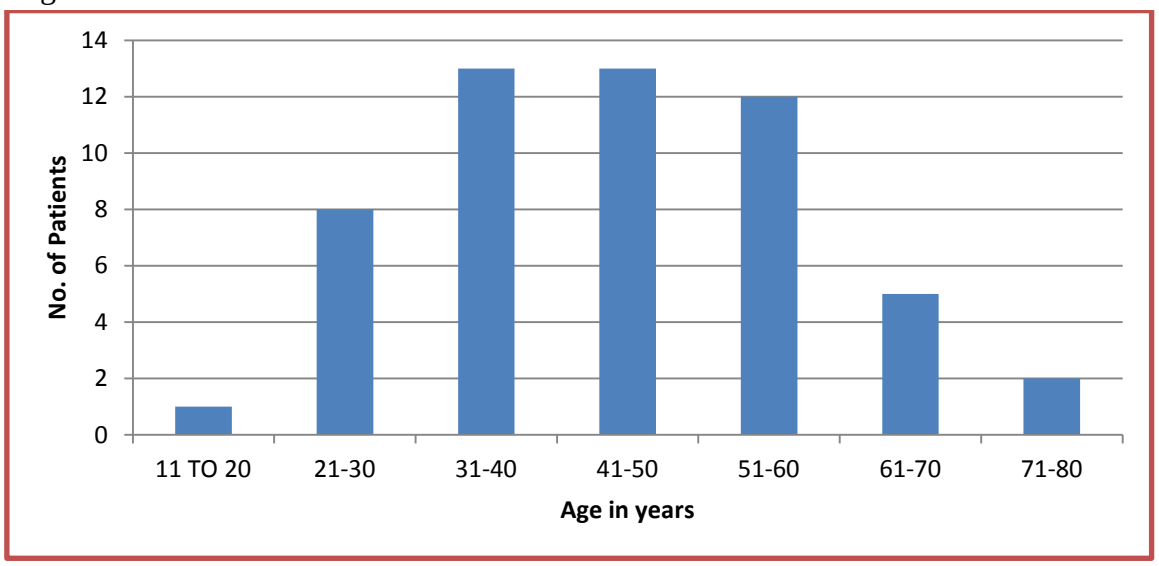
	Mean
Age (Years)	45.4

Age Distribution: The table 3 and figure 1 below shows that varicose veins is more common in the middle age group ranging between 31-50 years which account for nearly 50% of the total population in the study.

Table 3: Age Distribution

Age (years)	Count	Percent
11 to 20	1	1.9
21 to 30	8	15.4
31 to 40	13	25
41 to 50	13	25
51 to 60	9	17.3
61 to 70	5	9.6
71 to 80	2	3.8

Graph-2: Age in Years



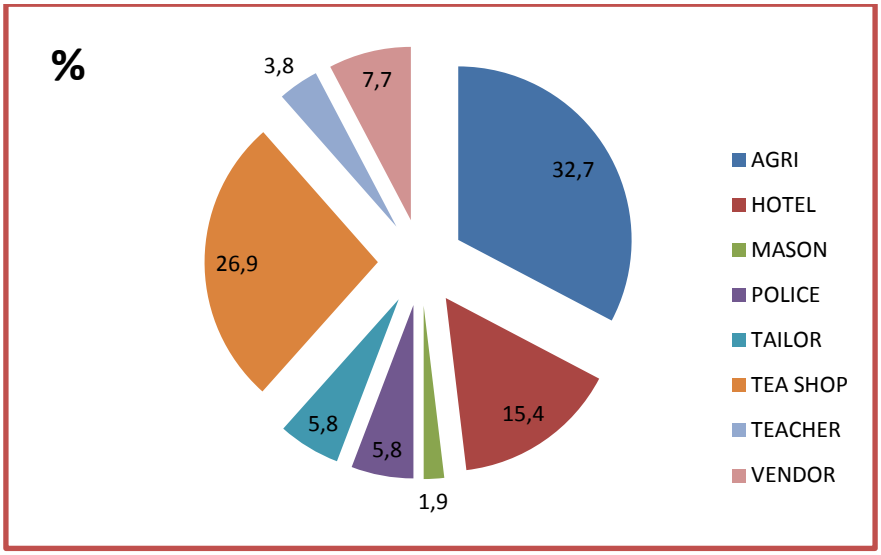
Occupation

The below table shows the incidence of varicose veins in different occupational worker, who are predominantly standing for a long duration in their working period. Hence proving that occupation demanding long time of standing is the leading cause for varicose veins.

Table 4: Occupation

Occupation	Frequency	Percent
Agriculture worker	17	32.7
Hotel worker	8	15.4
Mason	1	1.9
Police	3	5.8
Tailor	3	5.8
Tea shop worker	14	26.9
Teacher	2	3.8
Vendor	4	7.7

Graph-3: Occupation



Discussion

Analysis of Sex Incidence: Even though male: female ratio is 1:2 according to standard textbooks, in this study of 52 patients only 11 were female patients. 41 patients were male patients. This may be due to the fact that females may not be engaged frequently in occupation demanding long periods of erect posture.

Analysis of Age Incidence: In this study it was found that the incidence of varicose veins and its complications are increasing steadily with age upto 40-50years.1 patient was found in the age group 11-20 years.8 patients were found in the age group 21-30 years. 11 Patients were found in the age group 31-40. 13 patients were found in the age group 41-50 years. 12 patients were found in the age group 51-60 years. 5 patients were found in the age group 61- 70 years.2 patients were found in the age group 71-80 years. Youngest patient in the study was 18 years old and eldest patient was 80 years. It was found that the age group of 41-50 years had the maximum number of patients.

Analysis of Occupation: Agriculture worker 32.7%, tea shop worker 26.9% and Hotel worker 15.4% are the highest percentage of worker having chronic venous disease. Hence proving that occupation demanding long time of standing is the leading cause for varicose veins. So patients with varicose veins doing long standing jobs are advised to change their jobs.

Conclusion

Varicose veins are more common in middle aged males who are working in a standing position for a prolonged period of their work. Varicose veins have varied etiology and primary varicose vein was mainly taken under our study. The affected persons who are working in long standing jobs are advised to modify their work or change their jobs.

Declaration of Conflict of Interest: There is no conflict of interest.

Funding: This research received no specific grant from any funding agency in public, commercial, or not-for-profit sectors.

References

1. Bailey and Love short practice of surgery. 27th Edition.
2. Sabiston Text book of surgery 1st South Asia edition.
3. Rutherford's vascular surgery and Endovascular therapy
4. Nhyhus mastery of surgery.
5. Farquhaursons text book of operative surgery.
6. MC. Gregor. Applied anatomy.
7. Textbook of anatomy by Skandalakis.
8. Russell RCG, Williams NS, Bulstrode CJK, "Venous disorders" in Bailey and Love's Short practice of surgery,Ch.24; 24th Edn; Arnold publications; 2004: 954-973.
9. Bradbury et al. What are the symptoms of varicose veins? Edinburgh vein study cross sectional population survey. BMJ 1999; 318:353-356.
10. Callum M.J., "Epidemiology of Varicose veins". British Journal of Surgery. 1994:81:167-163.