



## A Study on Demographic Variables in Patients with Somatoform Disorders Conducted at a Tertiary Care Hospital in Psychosomatic Clinic, Vidarbha

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### Abstract

**Introduction:** Somatoform disorders cause significant emotional distress for patients and are a challenge to physicians. Somatization disorder appears to be more common in women than men. They have been reported to be more prevalent in rural areas and among the less educated people.

**Material and Methods:** 270 patients with a diagnosis of any of the sub types of somatoform disorders were inducted from those attending the out-patient and in-patient services of deptt. Of Psychiatry affiliated to AVBRH, a tertiary care hospital, Vidarbha. It was a cross-sectional study carried out from October 2010 to July 2012.

**Results:** Study showed maximum number of patients of age group of 60 to 80 years (48.88%) followed by 40 to 60 years (27.77%) with mild female preponderance (56.67%). The females had comparatively longer duration of somatoform disorder (4.48 years vs. 3.97 years). In our study, majority of patients with somatization disorder were married (88.9%) followed by widow/widower (7.4%); single (4.1%) and separated (1.9%). Also, majority of patients in our study were Illiterate (20.0%); followed by primary educated (10.0%); secondary educated (40 %) and 30% patients were graduates.

**Conclusion:** Females of middle age are more commonly affected with somatoform disorders and suffer with significantly longer time period.

**Keywords:** Demographic variables, education status, somatoform disorders.

### Introduction

Somatoform disorders are a group of psychiatric disorders in which patients present with clinically significant but unexplained physical symptoms. The disorders include somatization disorder, undifferentiated somatoform disorder, hypochondriasis, conversion disorder, pain disorder, body dysmorphic disorder, and somatoform disorder

not otherwise specified.<sup>1</sup> These disorders often cause significant emotional distress for patients and are a challenge to physicians.

Somatization disorder appears to be more common in women than men, with a lifetime prevalence of 0.2 to 2 % in women compared with less than 0.2 % in men. Familial patterns exist, with a 10 to 20 % incidence in first-degree female

relatives.<sup>1</sup> No definitive cause has been identified for somatization disorder, although the familial patterns suggest genetic or environmental contributions. Also somatization disorder has been reported to be more prevalent in rural areas and among the less educated people.

Most commonly affected age group among patients of somatoform disorders is middle age, as they may have undergone an average of 10 operations and acquired several volumes of medical records.<sup>2</sup>

### Material and Methods

270 patients with a diagnosis of any of the sub types of somatoform disorders were inducted from those attending the out-patient and in-patient services of Department of Psychiatry affiliated to AVBRH a tertiary care hospital, Sawangi, (Meghe), D.M.I.M.S University. It was a cross-sectional study carried out from October 2010 to July 2012.

Socio demographic data was collected using a structured format to record variables regarding age, marital status, occupation, educational status, income, family type, religion, and locality of the patient.

Clinical semi-structured profile was recorded which included the clinical variables.viz. chief complaints, onset, duration, course, type of illness, food habits, treatment history, inclusive and exclusive criteria's of the study, general physical examination, systemic examination and mental status examination. Statistical assessment using descriptive and analytical methods was done appropriately after the collection of data. Our study was approved by institutional ethical committee.

### Results

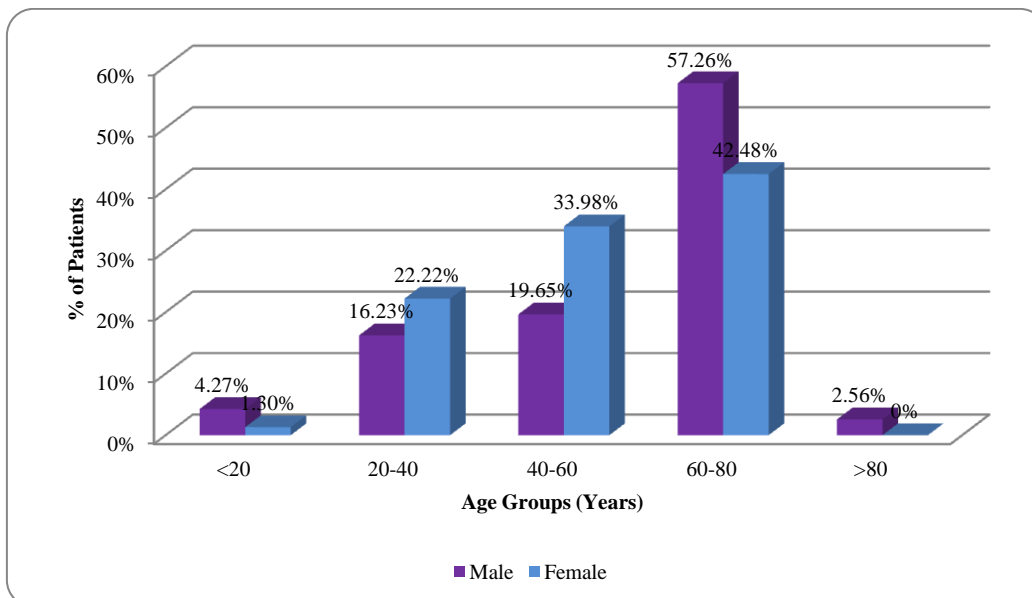
The socio demographic profile of patients with somatoform disorders is depicted in table I to III.

Most of our patients belong to the age group of 60 to 80 years (n = 132, 48.88%), followed by 40 to 60 years with a frequency of (n =75, 27.77%). Only (n=7, 2.59%) were less than 20 years old and (n=3, 1.1%) were more than 80 years old. As far as the gender ratio is concerned, there were more women (n=153, 56.66%) compared to males. The significantly high number of patients were females (F: M=1.3:1) (p <0.05).

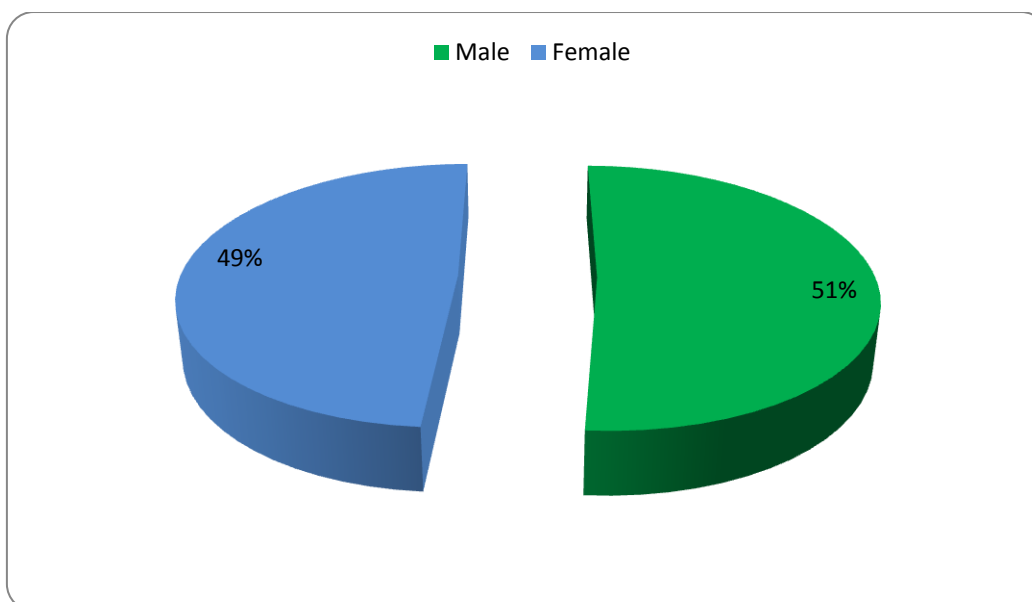
**Table I:** Distribution of Age and sex

Age	Male	Female	Total	P value
<20	5(4.27%)	2(1.30%)	7(2.59%)	0.256839
20-40	19(16.23%)	34(22.22%)	53(19.62%)	0.03936
40-60	23(19.65%)	52(33.98%)	75(27.77%)	0.000812
60-80	67(57.26%)	65(42.48%)	132(48.88%)	0.861804
>80	3(2.56%)	0(0%)	3(1.11%)	0.220671
Total	117/270 (43.33%)	153/270(56.33%)	270 (100%)	0.028
Mean Age	57.44	54.73	55.90	0.153
SD	16.64	14.36	15.42	NS,p>0.05

*Chi-Square test* is applied. P value is significant if < 0.05.



**Graph I:** Distribution of Age groups

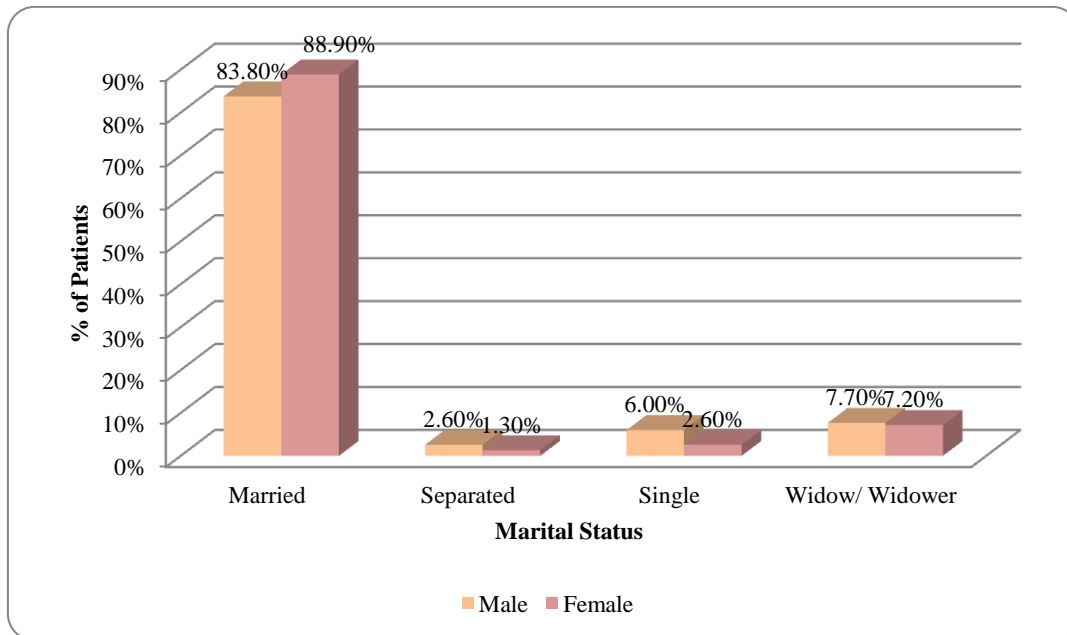


**Graph II:** Distribution of sex

**Table II :** Marital status of the patients.

Marital	Sex		Total N (%)	P value
	Male N (%)	Female N (%)		
Married	98 (83.8%)	136 (88.9%)	234 (86.7%)	0.30, NS, p>0.05
Separated	3 (2.6%)	2 (1.3%)	5 (1.9%)	0.31, NS, p>0.05
Single	7 (6.0%)	4 (2.6%)	11 (4.1%)	0.30, NS, p>0.05
Widow/ Widower	9 (7.7%)	11 (7.2%)	20 (7.4%)	0.78, NS, p>0.05

Chi-Square test is applied. P value is significant if < 0.05

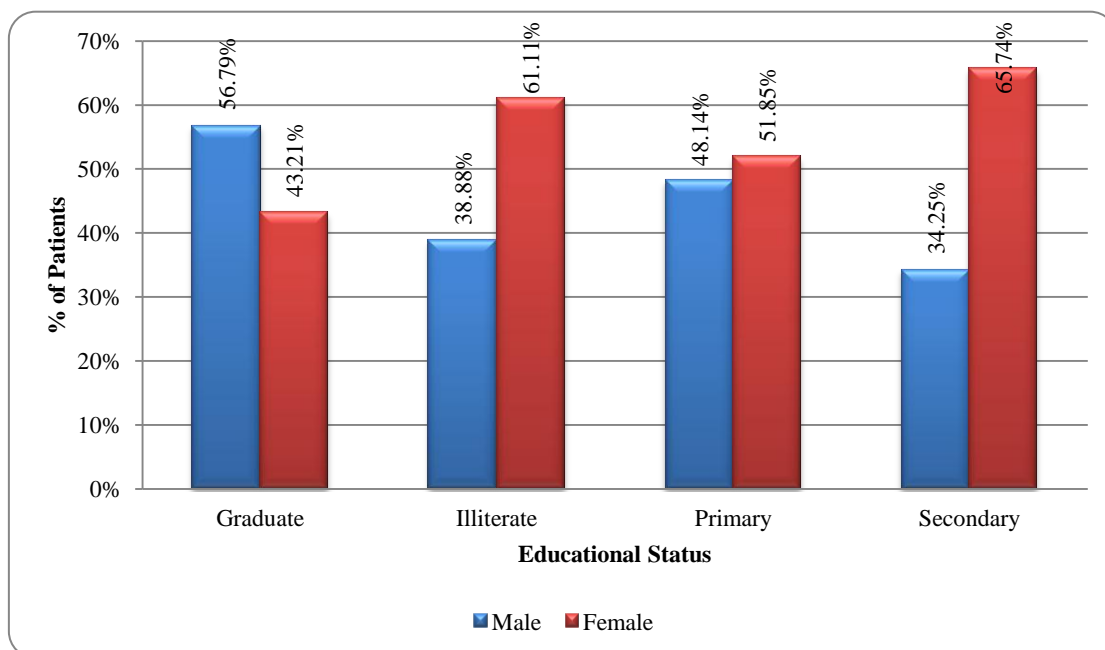


**Graph III**

Most of the subjects (n=234, 86.7%) were married, but strikingly 7.4% (n=20) were either widow or widower and 1.9% (n=5) were separated.

**Table III:** Education Status of the Patient in Relation With Gender

Education	Sex		Total N (%)	P value
	Male N (%)	Female N (%)		
Graduate	46 (56.79%)	35 (43.21%)	81(30%)	0.08, NS,p>0.05
Illiterate	21 (38.88%)	33 (61.11%)	54 (20%)	0.03,S,p<0.05
Primary	13 (48.14%)	14(51.85%)	27(10%)	0.750.08, NS,p>0.05
Secondary	37 (34.25%)	71 (65.74%)	108 (40%)	0.03,S,p<0.05
Total	117(43.33%)	153(56.66%)	270(100%)	



**Graph III:** Distribution of subjects on basis of education status and gender

As far as the education status was concerned, a large majority (n=216, 80%) of our patients were literate and only (n=81, 30%) were graduates. We divided them into two groups; 80 % of our cases were literate to certain extent, and only 20 % were illiterate. The latter group of illiteracy have showed a modest mean scores on BSI in almost all the subtypes of somatoform disorder(s) (range= 43.74 to 46.56) as the level of education ascends from primary to graduation, the mean scores on BSI have also followed the decrescendo pattern.

## Discussion

### Socio demographic characteristics

#### A. Gender

In our study, out of 270 patients, females were predominant (M:F is 3:1). Our finding was in the line with published literature, which suggests that somatization disorder appears to be more common in women than men. Familial patterns exist, with a 10 to 20 % incidence in first-degree female relatives.<sup>1</sup>

Previous research (Kroenke and Spitzer, 1998)<sup>3</sup> showed that women consistently reported more somatic symptoms than men (Kroenke and Spitzer, 1998; Gijsbers van Wijk and Kolk, 1997; Nakao et al., 2001; Hiller et al., 2006)<sup>3,4,5</sup> and there was a possible influence of the marital status in some cases (Nakao et al., 2001)<sup>5</sup>.

#### B. Age of onset and duration

The first peak of this disorder begins in the teenage and young adulthood years (third to fourth decade), and the other is in elderly group specifically for persistent somatoform pain disorder.<sup>6</sup> However, in our study, average age of onset was 51.94 years; slightly earlier in case of females than in males (50.71 years Vs 53.53 years).

We tried to search for the comparison of severity, and duration of specific somatoform disorders of the previously published studies, we could not come across on the emphasis of specified duration and therefore it is difficult to have the comparisons with the previously published studies as far as the duration of somatoform disorder is

concerned. Average duration of somatoform disorder in our study was 4.26 years. Duration was longer in case of females (4.48 years vs. 3.97 years).

#### Marital Status

In our study, majority of patients with somatization disorder were married (86.7%) followed by widow/widower (7.4%); single (4.1%) and separated (1.9%). The previous research showed that there is a possible influence of the marital status in some cases (Nakao et al., 2001).<sup>5</sup> Nakao et al showed that in general, “married patients are less likely to report physical and psychological distress”, than in singles, but this is in sharp contrast to what we observed as 86.7% were married in our study. (Nakao et al., 2001).<sup>5</sup> Similarly, another study reported that being single, separated, divorced or widowed women, compared to married women is associated with a significantly increased likelihood of any mental disorders, except for somatoform disorder (s) (Klose and Jacobi, 2004).<sup>7</sup> In present study, somatoform disorder in widower and separated was having clear severity over its counterparts and therefore our study bridged the untouched area in this realm as well.

Interestingly, *Kismayer et al*<sup>8</sup> found a lower risk of somatoform disorder in unmarried than in married subjects; this is in parallel with our observations of the present study, wherein those who were widow/widower have shown the highest suffering tendency as far as mean BSI scores for somatoform disorders were concerned (range= 44.74 to 46.62).

#### C. Education status

Previous published papers reported that, somatization disorder seemed to be more common in less educated and lower socioeconomic groups.<sup>9</sup> Duddu V, Chaturvedi SK., Isaac MK., from Bangalore in 2003 showed that the clustering of attributes of somatoform disorders were different than from somatoform disorder(s) and were influenced by their educational status, due to their attributional styles.<sup>10</sup> Our study also showed maximum illiterate patients. In another interesting

study by Jaypal et al., from pediatric population, found polysymptomatic conversion disorder (52%) in children upto 18 years; 78% of whom were educated up to secondary school, reflecting that education perhaps helps in negating the severe forms of somatoform disorders.

### Conclusions

The sample mainly consisted of 60 to 80 years of patients (48.88%) followed by 40 to 60 years (27.77%) with mild female preponderance (56.67%). The mean age of onset of illness in males was 57.44 years and the onset was slightly earlier in females. The females had comparatively and significantly longer duration of somatoform disorder, compared to males (13-15 years). Illiterates (61.1%) and married subjects (88.90%) were in majority having somatoform disorder.

### Bibliography

1. American Psychiatric Association. Diagnostic and Statistical Manual of Mental Disorders. 4th ed. rev. Washington, D.C. American Psychiatric Association, 2000.
2. Escobar J.I., Waitzkin H.N., and Silver R.C., "Abridged somatization: a study in primary care" *Psychosom Med.* (1998) 60, 466-72.
3. Kroenke K., Spitzer R.L., "Gender differences in the reporting of physical and somatoform symptoms. *Psychosom Med*" (1998) 60, 150-55.
4. Gijsbers van Wijk C.M.T., Kolk A.M., "Sex differences in physical symptoms: the contribution of symptoms perception theory" *Soc Sci Med* (1997) 45, 231-46.
5. Nakao M., Fricchione G., Zuttermeister M.A., Myers P., Barsky A.J., Benson H., et al, "Effects of gender and marital status on somatic symptoms of patients attending a mind/body medicine clinic" *Behav Med* (2001) 26, 159-68.
6. Kroenke K., Spitzer R.L., Williams J.B.W., "The PHQ-15: validity of a new measure for evaluating the severity of somatic symptoms" *Psychosom Med* (2002) 64, 258-66.
7. Klose M., Jacobi F., "Can gender differences in the prevalence of mental disorders be explained by sociodemographic factors? " *Arch Womens Ment Health* (2004) 7,133-48.
8. Kismayer L.J., Robbins J.M. *Current Concepts of Somatization: Research and Clinical Perspectives.* Washington: American Psychiatric Press, 1991.
9. Fink P., Sorensen L., Engberg M., Holm M., Munk-Jorgensen P., "Somatization in primary care. Prevalence, health care utilization, and general practitioner recognition" *Psychosomatics* (1999) 40, 330-38.
10. Bishit J., Sankhyan N., Kaushal R.K., Sharma R.C., Grover N., "Clinical profile of Pediatric Somatoform Disorders" *Indian Pediatrics* (2008) 45, 111-15.