

A Study of Anxiety Disorders in Terms of Severity and Prevalence in Patients of Major Depressive Disorder in a Tertiary Care Centre

Richa Rani¹, Neeru Bala², Parshotam Dass Garg³, Aashish Bansal⁴



¹Third year Postgraduate Student, Department of Psychiatry, GMC Amritsar

²Associate Professor, Department of Psychiatry, GMC Amritsar

³Professor and Head, Department of Psychiatry, GMC Amritsar

⁴First year Postgraduate Student, Department of Pathology, Adesh Institute of Medical Sciences & Research, Bathinda

Address for correspondence:

Dr Neeru Bala.

216 Bhullar Avenue, FGC Road, Amritsar-143001

E-mail: jpneeru15@gmail.com, drneeru15@yahoo.in.

Abstract:

Background: Depression is a disorder of major public health importance. Over the last 50 years, large number of studies have been published from India addressing various aspects of depression. The objective of the current study was to study the socio-demographic characteristics and anxiety as co-morbidity in patients with major depressive disorder. **Method:** This was a cross sectional study conducted in tertiary care hospital in which 100 patients diagnosed with major depressive disorder, according to ICD-10 were assessed for presence of anxiety disorder as psychiatric Comorbidity using MINI and severity of anxiety was assessed using HAM-A. **Results:** Current study showed major depressive disorder is more common among females 59%, married 79%, housewife 50%, 61% had first episode of depression and 27% had family history of major depressive disorder. There was 48% presence of any anxiety disorder among total major depressive disorder patients. Among which 25% had generalized anxiety disorder, 9% obsessive compulsive disorder, 5% panic disorder, 4% agoraphobia, 4% post traumatic stress disorder and 1% social anxiety disorder among total patients with major depressive disorder. The maximum number of patients 43% had mild to moderate level of anxiety, 32% had mild anxiety, 19% had moderate to severe anxiety and 6% had severe anxiety. **Conclusion:** There is a high prevalence of anxiety disorders in major depressive disorder which is often ignored because of symptom overlap between anxiety and major depression. This study is important because of increasing prevalence of psychiatric comorbidity among the patients of major depressive disorders lead to impaired functioning in patients with MDD. Therefore, monitoring of symptoms as well as functioning during the long-term management MDD could be crucial to achieve the functioning remission.

Keyword: Major depressive disorder, MDD, Co-morbidity, Anxiety.

Introduction

Major Depressive Disorder (MDD) is a global issue. According to the World Health Organization (2004), unipolar depression is currently in third place worldwide on the burden of disease list and is projected to be the second leading cause of worldwide disability in developed countries by 2020. A large-scale national survey on the comorbidity of depression was carried out in the U.S., principally by the University of Michigan. The results indicated that more than half of all patients with a DSM-III-R diagnosis of major depressive disorder were associated with a co morbid anxiety disorder.

Comorbidity can occur for various reasons. It can be a chance occurrence or can be due to the conjunction of independent risk factors; or it may develop because two disorders have shared risk

factors, or because one disorder predisposes the individual for the other, or the comorbid condition may be a multiform expression of one of the pure disorders or a third independent disorder.^[1]

In psychiatry, when distinct symptoms like anxiety and depression co-occur, whether they indicate the presence of two distinct clinical entities or whether they are two components of a single disorder is mostly a matter of speculation, as we know little about the etiology and patho-physiologic interrelationship of mental illnesses. Psychiatric comorbidity is a prevalent phenomenon and remains a challenge for the effective delivery of mental health services. Recent community surveys show that among those with a psychiatric disorder the lifetime prevalence of more than one diagnosis is about 50%.^[2]

A recent study attempted to address this issue from a prospective, longitudinal approach. They reported that 72% of individuals with generalized anxiety disorder (GAD) were diagnosed with co-morbid depression and 48% of individuals with depression also had GAD.^[3]

A recent report base on the large STAR*D population has shown a 46% prevalence of anxious depression among 1450 Major Depressive Disorder outpatients.^[4]

Aims and Objectives

1. To study the socio demographic profile of patients with major depressive disorder.
2. To study the presence of anxiety disorders in patients with major depressive disorder.
3. To evaluate the severity of anxiety disorders in patients with major depressive disorder.

The present study was conducted in the department of Psychiatry, Government Medical College, Amritsar. Patients with major depressive disorder coming into psychiatry department of Guru Nanak Dev Hospital, Amritsar were taken in the study. The diagnosis was confirmed by a senior consultant in the department of psychiatry, GMC Amritsar. A total sample of 100 patients who met the inclusion criteria and gave informed consent were included in the study.

Sample Size: A size of total 100 diagnosed cases was taken for the study.

Study Design: Present study was a cross sectional descriptive, tertiary care-hospital based study.

Duration of the Study: The data collection lasted from 1st January 2017 to 31st December 2017.

Statistical Analysis: The data were analyzed using SPSS software version 21.

Tools and Procedure:

1. An informed consent form for the study, including the methodology and need to study.
2. Proforma for identification, socio demographic details, present history, past history and family history of the patient.
3. Mini international neuropsychiatric interview (M.I.N.I.).
4. HAM-A (Hamilton Anxiety rating Scale).

Results:

The present study was carried out in the Department of Psychiatry, Government Medical College and Hospital Amritsar. It was conducted to study the prevalence of co-morbid psychiatric disorders, and the socio-demographic profile of the patients with major depressive disorder.

Table 01

Socio-demographic Profile	No. of Patients	Percentage
Sex		
Female	59	59%
Male	41	41%
Religion		
Sikh	72	72%

Hindu	27	27%
Christian	01	01%
Age (in Years)		
<30	19	19%
31-45	40	40%
46-60	32	32%
≥60	9	9%
Education		
Illiterate	8	8%
Primary	9	9%
Middle	15	15%
Matric	24	24%
Senior Secondary	21	21%
Graduate	15	15%
Post Graduate	8	8%
Marital Status		
Married	79	79%
Unmarried	7	7%
Remarried	3	3%
Separated	1	1%
Divorced	5	5%
Widowed	5	5%
Employment status		
House Wife	50	50%
Unemployed	13	13%
Farmer	05	05%
Student	01	01%
Professional	14	14%
Semi Professional	04	04%
Unskilled	05	05%
Skilled	03	03%
Shopkeeper	02	02%
Retired	03	03%
Area of residence		
Urban	53	53%
Rural	46	46%
Suburban	1	1%
Duration of illness in months		
0-3 months	65	65%
3-6 months	17	17%
6-12 months	13	13%
>12 months	05	05%
Family Type		
Joint	55	55%
Nuclear	39	39%
Alone	6	6%
Past history of MDD		
Positive	39	39%
Negative	61	61%
Family history of psychiatric illness		
Positive	27	27%
Negative	73	73%

In our study, most of the patients were females 59 (59%) and males were 41 (41%). Which is similar to another study which shows women have 1.5 times greater prevalence than men for Major Depressive Disorder by Kongsuk T, et al (2010)^[16] and according to Munoli RN, et al (2014)^[11] 54% were females.

In our study mean age \pm S.D. was 40.57 ± 11.66 in patients with MDD. Buturak SV, et al (2011),^[7] mean age of the sample under study was 49.9 ± 12.8 . Gili M et al (2013)^[9] the mean age was 47.76.

Most of the patient was studied upto matric (24%) followed by higher secondary (21%); the findings of previous studies were 28% had 9-12 years of education. Cancino A, et al (2018),^[10] did the study of factors associated with Psychiatric comorbidity in depressed patients in Primary Healthcare in Chile, where most of the (41.6%) patients were high school educated.

In the present study, 50% were housewives, 8% were illiterate and most of the patient were studied upto matric (24%) followed by higher secondary (21%).similar to Munoli RN, et al (2014)^[11] in which 40% were homemakers.

In the present study, maximum number of patients with Major Depressive Disorder were married 79 (79%) similar results were seen in studies by Munoli RN, et al (2014)^[11] showed 76% were married, Zimmerman M, et al (2000),^[5] showed 44.5% were married. Papan Thaipisuttikal PI, et al (2014),^[6] 53% were married. Gili M et al (2013)^[9] showed 58.3% were married.

In the present study most of the patients were from urban area 53 (53%) which is also evidenced by Gili M, et al (2013),^[9] where 73.4% were from urban area and Reddy MV and Chandrashekhar CR (1998)^[12] in which prevalence of depression was more in urban than rural.

In the present study; 39 (39%) had a past history of depressive illness and 61% had a first episode of depression, similar to a previous study of Munoli RN, et al (2014)^[11] in which 60 (60%) had a first episode of depression.

Table 02

Score (HAM-A)	Variable	No. of Patients (n=100)	Percentage (%)
<17	Mild Anxiety	32	32%
18-24	Mild to Moderate Anxiety	43	43%
25-30	Moderate to Severe Anxiety	19	19%
>30	Severe Anxiety	06	06%
Total		100	100%

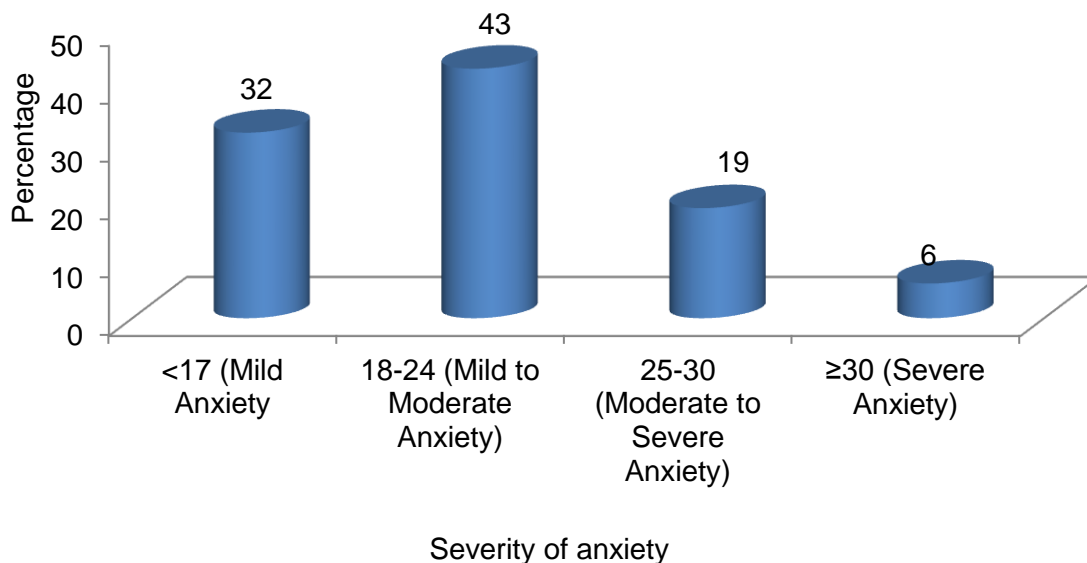
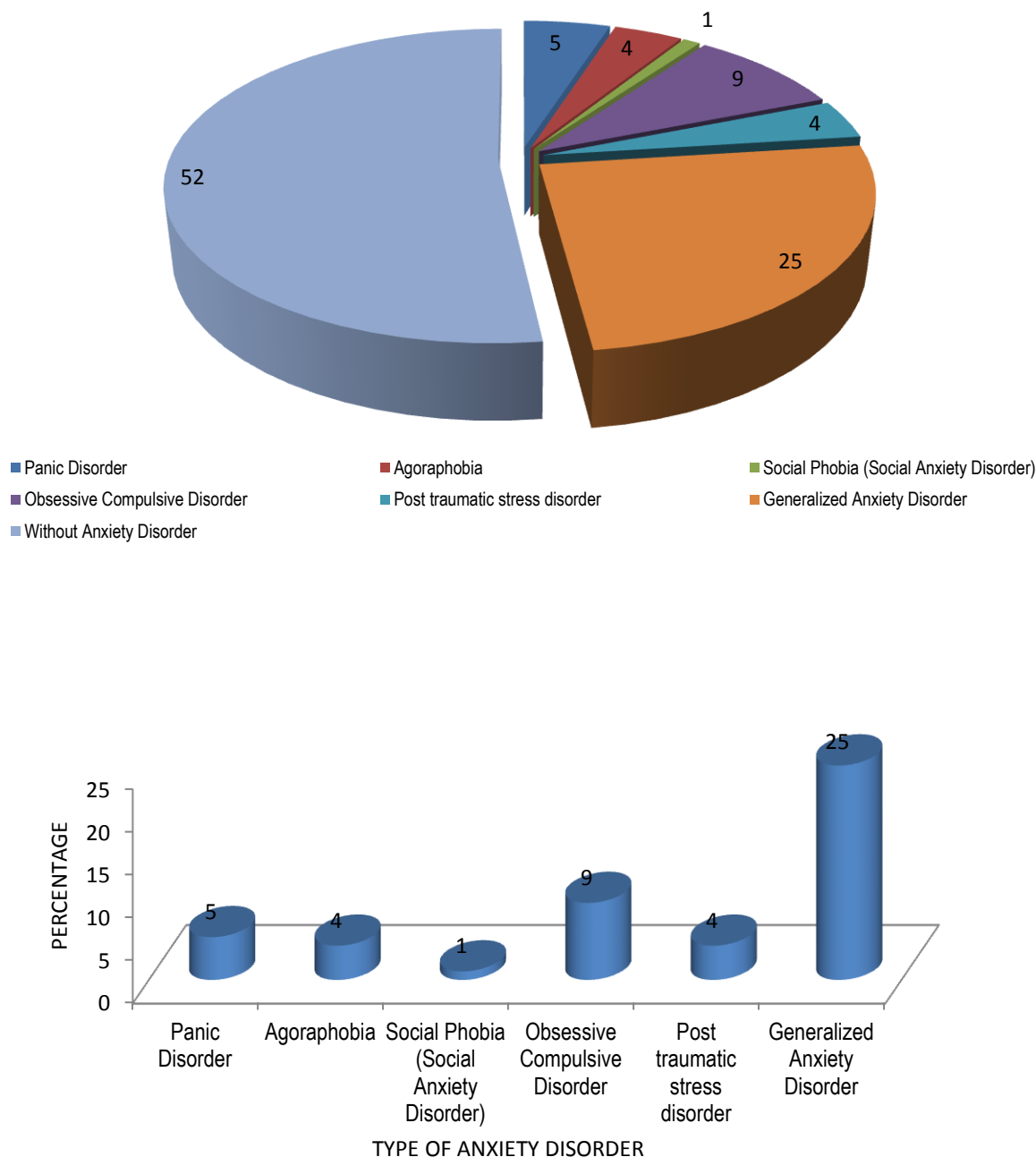


Table 03

Type of anxiety disorder comorbidity in major depressive disorder	No. of Patients (n)	Percentage (%)
Panic Disorder	05	05%
Agoraphobia	04	04%
Social Phobia (Social Anxiety Disorder)	01	01%
Obsessive Compulsive Disorder	09	09%
Post traumatic stress disorder	04	04%
Generalized Anxiety Disorder	25	25%
TOTAL	48	48%



In the present study, it was found that nearly half (43%) of the patients had mild to moderate anxiety, less than half (32%) were having mild anxiety, 19% had moderate to severe anxiety and only 6% had severe anxiety. This was nearly similar to findings of case control study of Sinha M, Sanyal D (2012).^[14]

Sahoo S and Khesr CR (2010)^[15] found that a majority of the patients had moderate anxiety and very few patients were having severe anxiety.

In the present study most common comorbidity is the presence of anxiety disorder 48 (48%) of the total patients with MDD. Which included 5 (5%) panic disorder 4 (4%) Agoraphobia 1 (1%) social anxiety disorder, 9 (9%) obsessive compulsive disorder, 4 (4%) post traumatic stress disorder and 25 (25%) Generalized anxiety disorder. In a similar study by Munoli RN, et al (2014)^[11] showed that the most common psychiatric comorbidity in depressive

patients was 46% anxiety disorder. Also similar results of 46% were seen in STAR*D study Howland RH, et al (2009).^[13]

Small DM, (2008)^[17] showed 27.4% prevalence of anxiety disorders in total 439 patients with MDD. In another study by King-Kallimanis B, et al (2009)^[13] has shown that 12 month prevalence of comorbid anxiety disorder in patients with MDD was 60.6% in 18-64 years age group.

Conclusions

As Major Depressive Disorder is very common in Primary Health Care Services patient with psychiatric co-morbidity like anxiety overlapping with depressive disorder tend to be less responsive to treatment so there is a higher extent of loss in mental abilities and the disease become chronic. So there is a great need for further research in the field of co-morbidity.

Limitation

The sample under study was of small size cross sectional study. Moreover, our study had relied upon the hospital population and not the community sample and some of the population like divorced, widow, retired persons were under represented in the study.

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