# Socio-demographic Characteristics of Depressive Patients Attending at A Tertiary Level Hospital, Dhaka

Md. Abul Kalam Azad<sup>1\*</sup>

#### ABSTRACT

**Background:** Mental illness is an important public health problem but mostly neglected in Bangladesh. A large number of people is suffering from different types of mental illness, especially depressive disorders. If they remain undiagnosed and untreated, they may lead to quite unproductive lives and causes a health burden. So, appropriate knowledge is required to control the prevalence and its negative impact on national budget. The purpose of this study is to find out the socio-demographic characteristics of depressive patients attending at a Tertiary level hospital, Dhaka.

**Materials and methods:** This descriptive type of cross sectional study was conducted among 91 depressive patients attending at Combined Military Hospital (CMH) Dhaka during the months of March to June, 2012. The respondents were interviewed through a interviewer-administered questionnaire.

**Results:** In this study the mean age of the respondents was 37.97 ±11.357 years, all were literate. Majority (45.1%) from 30-39 years and females (56%). Most of them (96.7%) were married and (86.80%) had 1-4 children in their families and maximum (67%) were from urban area. The study revealed that young and mid-aged females and females from urban area were significantly prone to depression than male.

**Conclusion:** In this study it was found that educated young and mid aged married females from urban area are the more sufferers of depressive illness. Adequate recreational facilities, improved health and welfare resources should be developed and health education and counseling may be incorporated during treatment process to improve the patient's compliance.

Key words: Socio-demographic; Depressive patient; Mental illness; Psychiatric disorder.

#### Introduction

Good mental health is crucial to live a long and healthy life. Good mental health can enhance one's life, while poor mental health can prevent someone from living a normal life. Health as defined by the World Health Organization is "a state of complete physical, mental and social wellbeing and not merely an absence of any disease or infirmity". A man must be mentally healthy to lead a socially and economically productive life. Ginsberg simplified the definition of mental health, "the ability to hold a job, have a family, keep out of trouble with the law, and enjoy the usual opportunities for pleasure"<sup>1</sup>.

From several studies it was found that about 16.05% of adult populations of Bangladesh were suffered from mental health disorders and among them the prevalence of major depressive disorders is 4.61%. Knowledge and awareness among the population about mental illness are still in the very early stage in Bangladesh<sup>2,3</sup>.

1.	Director
	Commanding Officer
	Border Guard Hospital, Thakurgaon.

\*Correspondence: Lt Col (Dr) Md. Abul Kalam Azad Cell: +88 01769 60 81 00 Email: azad101025@yahoo.com

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Surveys suggested that major depressive disorder has the highest lifetime prevalence (Almost 17 percent) of any psychiatric disorder<sup>4,5</sup>. The mean age of onset for major depressive disorder is about 40 years, with 50% of all patients having an onset between the ages of 20 and 50 but as a whole depression is more common in older persons<sup>4,5</sup>. An almost universal observation, independent of country or culture, is that the depressive disorder is much higher in women than in men<sup>2,5-10</sup>. Some studies revealed that depression is more common in rural areas, but other studies differed, even after controlling for the effect of differences of age, sex, ethnic group, education and migrant status<sup>9, 11-13</sup>. Young adults with preponderance in males (61%) of rural (55%) area having school level education (57.35%) and married (55.33%) were significant but female widows/divorcees were double that of male counterpart<sup>13</sup>. Most previous research has argued that marriage is associated with low rates of depression because it shields the individual from exposure to stress.<sup>14</sup>. A study was carried out in the year 2007 within the age group of 10 to 55 years, results showed that most of the patients were educated. 19% completed graduation, 56.6% completed Higher Secondary Certificate (HSC) examinations and most of the patients (70.4%) were from urban background<sup>15</sup>. But a retrospective study, conducted in 2010 found male preponderance. maximum (64.67%) married, (30.88%)

illiterate, followed by secondary education (27.2%) and mostly (89.94%) resided in the rural areas<sup>16</sup>. In a study at CMH Chittagong in 2001 found maximum number of patients (42.85%) was between the age of 31-40 years and in all age groups females (60.72%) outnumbered the males<sup>17</sup>. Another study conducted at CMH Dhaka in 2004 showed, 84% had age range from 20-40 years and majority were (60%) female, (86%) urban background, Having Secondary level (64%) education and were married (92%)<sup>18</sup>.

Although considerable information on mental illness is available from developed and some developing countries, estimates are scarce for Bangladesh. Bangladesh is a poor, the most densely populated country in the world, situated where floods, storms and other natural disasters occur and cause great sufferings which are highly associated with psychiatric morbidity. In spite of these adverse conditions, must needed data are rarely available for any future planning and true intervention. Thus this study may consider just an initiative to find out the socio demographic relationship with the prevailing depressive illness to enrich the required data which may provide some guide lines in taking preventing measures in respect to the relatively neglected, often misunderstood and helpless depressive patients and also to make further specific study.

# Materials and methods

The descriptive type of cross sectional study was conducted among 91 depressive patients irrespective of their age and sex attending for treatment at the Outpatient department and admitted in the Psychiatric ward of Combined Military Hospital, Dhaka Cantonment during the months of March to June, 2012. Mentally stable and co-operative patients were only interviewed after signing a written consent. Data were collected through face-toface interview by a semi-structured interviewer-administered questionnaire, which was planned and designed according to the objectives to get information of the different variables. Ethical consideration was strictly maintained and as such the respondents were given full assurance that under no circumstances findings of the interview would be disclosed to any unauthorized person. Depressive patients were diagnosed by the psychiatrist of Combined Military Hospital Dhaka, following the diagnostic criteria of the Diagnostic and Statistical Manual (DSM-IV) of the American Psychiatric Association and International Classification of Disease (ICD-10) of the World Health Organization. In this study age, sex, educational status, marital status, position in sibs of the patients and number of children each of the patients was having and their residences were taken into consideration. However, for age 6 months and above was taken

as a full completed year and position in the sibs was determined in ascending order and residence was categorized in urban and rural only. Data were analyzed by SPSS 19 for windows. Frequency distributions and normal distributions of all continuous variables were checked. For analysis, arithmetic mean standard deviation was used. Cross tabulation was prepared. Chisquare was done to see the association where and whenever required.

## Results

The maximum numbers of the respondents were within the 30-39 years (45.1%), majorities were female 56.04%, all were found educated. Most of them 96.70% were married and maximum were having 86.80% children within 1-4 group (Table-I). Among the respondents most of them 29.67% from 2<sup>nd</sup> and other position in their sibship and maximum 67.03% were residing in urban area (Table-I).

 
 Table I : Socio-demographic characteristics of the participants (n=91).

	Characteristics	Frequency	Percentage	
Age	<20	2	2.2	
	20-29	16	17.60	
	30-39	41	45.10	
	40-49	18	19.80	
	50	14	15.40	
	Mean 37.97 years, SD ±11.357 years,			
	Lowest age=19 an	d Highest=72.		
Sex	Male	40	44	
	Female	51	56	
	Female: Male = 1.275			
Educational Status	Primary	30	32.97	
	SSC	39	42.86	
	HSC	13	14.29	
	Graduate	7	7.69	
	Post Graduate	2	2.20	
	None of them found illiterate			
Marital Status	Unmarried	3	3.30	
	Married	88	96.70	
	All females were married but only 3 males were unmarried.			
Position in Sibs	1 <sup>st</sup>	17	18.68	
	2 <sup>nd</sup>	27	29.67	
	3 <sup>rd</sup>	20	21.98	
	4 <sup>th</sup>	27	29.67	
Number of children	0	9	9.90	
	1 to 4	79	86.80	
	5 to 8	3	3.30	
	Most of the families 29(31.9%) were having 2 children only.			
Residence	Rural	30	33	
	Urban	61	67	

 Table II : Age of the respondent by Sex of the respondent (n=91).

Age of the respondent	Sex of the respondent		Total
	Male	Female	
<19	0	0	0
19-29	0	18	18
30-39	18	23	41
≥40	22	10	32
Total	40	51	91

Lowest age=19 (None was found below of that age) and highest age=72 years.

Among 91 respondents most of the females (18+23=41) were young and mid-aged within 19-39 years. The entire male respondents were found mid-aged and above.  $\chi^2$  test ( $\chi^2$  =12.32, df=1, p< 0.001) showed age groups 19-39 and ≥40 are highly significant, that is positive association of age pattern with sex for depression.

Table III : Sex of the respondents by area of residence (n=91).

Sex of the respondent	Area of	residence	Total
	Rural	Urban	
Male	18	22	40
Female	12	39	51
Total	30	61	91

χ<sup>2</sup>=4.676, df=1, p<0.05 (0.031).

Among the 91 respondents majority of the male (22) and female (39) were from urban area. $\chi^2$  test showed females from urban area were significantly prone to depression than male.

#### Discussion

In this study the mean age of the patient was 37.97 years with Standard Deviation (SD) ±11.357 years and range was 19 years to 72 years (Table-I). This age range was very well consistent with many studies like Sadock BJ and Azim  $MN^{5,13}$ . The maximum numbers of respondents were within the 30-39 years (45.1%). This result is consistent with the result of Choudhury AU and Islam  $MM^{17,18}$ . 50% of patients had an onset of depression between the ages of 20-50 years. The study is also supported by Sadock BJ and Azim  $MN^{9,13}$ .

In this study, majority of the patients were (56.04%) female and 43.96% were male (Table-I). Female: Male ratio is 1.275. So, depression found relatively more among the female than their male counterpart. The study result is consistent with the study result of Islam MM<sup>18</sup>. It is also found consistent with the study conducted by Choudhury AU and some other study results also revealed the same that depression is much higher in women than in men<sup>17,6-10</sup>. However it is not consistent with the result of Azim MN conducted on manic depressive psychosis<sup>13</sup>. Table II showed young and mid-aged females 41 (19-39 yrs) are more sufferers than males, on the contrary males of ≥40 are more (22) sufferers. These age patterns with sex are highly significant ( $\chi^2$  =13.15, df=1, p< 0.001) for association with depression.

In this study 100% of respondents were literate. As the respondents were service personnel and their dependents only, the percentage of literacy was such. This result is also supported by the study conducted by Islam MM and Fahmida A et al<sup>18,15</sup>. Among the literate group most of the respondents were from SSC (42.9%) level, then primary (33%) which is consistent with the study conducted by Islam MM<sup>18</sup>.

Though depression is common among persons without close personal relationship or in those who are divorced or separated but in this study the majority of the respondents (96.7%) were married and 3.3% were unmarried<sup>5</sup>. The high percentage of married persons was sufferer of depressive illness, this study result somehow supported by the study result of Islam  $MM^{18}$ .

Among the patients maximum (67.03%) were from urban area, which is consistent with the study conducted by Islam MM but not consistent with Azim MN<sup>18,13</sup>. In North Carolina sample of the ECA study showed that major depressive disorder was twice as common in the urban as in the rural area<sup>11</sup>.

Table III revealed that more female (39) of urban area were significantly ( $\chi^2$ =4.676, df =1, p<0.05) associated with depression than their male (22) counter-part.

In this study the maximum respondents 86.81% have children within 1-4 group, next only 3.30% have children within 5-8 group but 9.89% respondents didn't have any children at all. This study result nearly consistent with the result of Firoz AHM et al<sup>2</sup>.

Among the respondents most of them 29.67% from  $2^{nd}$  and other position in their sibship, next 21.98% from  $3^{rd}$  but 18.68% from  $1^{st}$  in order (Table-I). This result does not reflect that first-born was significantly associated with being depressed but consistent with the study conducted by Grosz HJ<sup>19-21</sup>.

This study was carried out among a small sample of depressive patients who were treated only in a hospital like Combined Military Hospital, Dhaka, so has some limitations, even though cross-sectional study design provides reliable and valid information but more studies should be carried out in other area of Bangladesh also. The findings of this study may not have the better reflection of the sociodemographic characteristics of depression as stated in the various psychiatric text books and other studies, though a very limited number of researches were carried out globally as a whole and data from national survey are really scarce and as such the study might have less comparatively discussed and might be lack of overall reflection of the country's scenario as a whole but hopefully generated some statistical information which can serve as baseline data for further in-depth study in broader perspective.

## Conclusion

Depressive illness is equally important as a psychiatric as well as any other psychiatric illness. Psychiatric illness contributes the major share of non-fatal disease burden globally and so in our country too. Among them depressive illness is highly prevalent in any type of population, which has a great impact on normal functioning of day to day life. Like any other physical illness, it is also preventable and treatable. Early diagnosis, effective treatment, follow-up and rehabilitation enable the ill patient as a productive citizen of the nation. In this study we intended to understand some important socio-demographic factors but a lot many of the other factors were missing. The case depression in Bangladesh requires a mass investigation, not only of psychological but also of biological factors. All the people should be made aware that depression is a case of psychiatric illness, needs medical attention and like any other physical illness does have necessary scientific treatment.

## Discloser

The author declared no competing interests..

### References

**1.** Rashid KM, Rahman M, Hyder S. Rashid, Khabir, Hyder's Test book of community medicine and public health. 4t<sup>h</sup> ed. Dhaka, Bangladesh.RHM publisher. 2004;416-424.

**2.** Firoz AHM, Karim E, Faruq A, Mustafiz AHM, Zaman MM. Community based multi-centric service orientated research on mental illness with focus on awareness, prevalence, care, acceptance and follow up. Bang J Psych. 2006;20(1):7,24.

**3.** Seda AHepa Ozden. Community Based Meatal Health Services in the eye of community mental health professionals. Journal of Psychiatric Nursing. 2018;9(3):186-194.

**4.** Vasila Chirita, Ilnca Untu. Kaplan and Sadock's Synopsis of Psychiatry : Behavioural Science/Clinical Psychiatry. Bulletin of Integrative Psychiatry. 2016;22(1):119.

**5.** Sadock BJ, Sadock VA. Kaplan & Sadock's Synopsis of Psychiatry. Behavioral Sciences/Clinical Psychiatry, 10th ed. Lippincott Williams & Wilkins. 2007;527-545.

**6.** Kendell R E, Zealley A K, Companion to psychiatric study. 5t<sup>h e</sup>d. Churchill Livingstone, UK.1993; 435.

**7.** Brooks HL, Rushton K, Lovell K etal. The Power of Support from Companion Animals for People Living with Mental Health Problems : A Systemic Review and Narrative Synthesis of the Evidence. BMC Psychiatry. 2018;18:31.

**8.** Murry R, Hill P, Guffin P M, The essential of postgraduate psychatry, 3r<sup>d e</sup>d. Cambridge University Press, UK. 1997; 320-321. **9.** Gelder M, Harrison P, Cowen P, Shorter Oxford Textbook of Psychiatry. 5t<sup>he</sup>d. Oxford University Press, New York, USA. 2006; 286.

**10.** Kaplan H I, Sadock B J, Comprehensive Textbook of Psychiatry. vol-1, 6t<sup>h e</sup>d. Lippincott Williams and Wilkins, Philadelphia. USA. 1995; 1081-1082.

**11.** Blazer D, George L K, Landerman R, Pennybacker M, Melvile ML, Woodbury M et al. Psychiatric disorders: A rural/urban comparison. Arch Gen Psych. 1985; 42(7):651-656.

**12.** John H. Krystal, Mathew W. State. Psychiatric disorders : Diagnosis to Therapy. A Cell Press Journal. 2014;157(1):201.

DOI. org/10.1016/j cell.2014.02.042

**13.** Azim MN, Islam MA and Ahmed RM. Demographic attributes of manic depressive psychosis: A retrospective study. Ann Med Practitioners.1993;4(2):11-19.

**14.** Kessler RC, Essex M. Marital Status and Depression: The Importance of Coping Resources. Oxford J. Social Forces. 1982; 61(2): 484-507.

Available from: http://sf.oxfordjournals.org/ content/61/2/484.short.

**15.** Fahmida A, Wahab MA, Rahman MM. Pattern of psychiatric morbidity among the patients admitted in a private psychiatric clinic. Bang J Med Science. 2009; 8(1-2): 23-28.

**16.** Al-Farooq SA, Ray NC. Psychiatric Morbidity: Diagnoses of the Patients attending Psychiatry Outpatient Department of a Hospital. Bang Developmental Studies. 2011.

Available from: http://studiesbangladesh.blogspot. com/2011/09/diagnosis-of-patients-attending.html

**17.** Choudhury AU, Rahman MH. Evaluation of somatic symptoms in depression and perception regarding treatment. Bang Armed Forces Med J. 2004; 33(1):53-55.

**18.** Islam MM. Somatic complaints in depressive disorder. [Dessertation]. Armed Forces Medical Institute, Dhaka. 2004;35-37.

**19.** Ndetei DM & Vadher A. A study of some psychological factors in depressed and non-depressed subjects in a Kenyan setting. BJ Med Psychology. 1982; 55(3):235-239.

**20.** Grosz, H.J. The depression-prone and the depression-resistant sibling: A study of 650 three sibling-families. BJ Psych. 1968;114:1555-1558.

**21.** Gates L, Lineberger MR, Crockett J, Hubbard J. Birth order and its relationship to depression, anxiety, and self-concept test scores in children. Journal of Genetic Psychology. 1988;149 (1):29-34.