Acta Scientific Neurology (ISSN: 2582-1121)

Volume 4 Issue 4 April 2021

Research Article

COVID-19 Pandemic: Mental Health of Doctors in Bangladesh

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Received: February 11, 2021

Published: March 20, 2021

Abstract

Background: The COVID-19 pandemic has affected everyone's life in all aspects. It presents an unprecedented challenge to public health. Doctors and other healthcare providers are battling the virus on the frontline.

Objective: This study is to see the mental health conditions of doctors in Bangladesh during the COVID-19 pandemic as well as to identify the percentage of doctors who are at high mental health risk and thus, need clinical intervention.

Method: We have assessed the mental health of 358 Dhaka-based doctors applying 'General Health Questionnaire-12' in an online survey.

Results: The study shows that a significant number of doctors (78.5%) are at risk of mental health conditions. They score high in psychological distress, which means that their psychological wellbeing in the ongoing COVID-19 pandemic is lower than usual. Gender-wise, it is also found that psychological wellbeing of female doctors is lower than their male counterparts.

Conclusion: The results of this study support the other similar studies conducted in different countries during the COVID-19 pandemic which indicate that doctors and health care professionals are at high risk of mental health. The results also highlight the importance of ensuring psychological support and mental health care to Bangladeshi doctors during crisis periods.

Keywords: COVID-19 Pandemic; Doctors; Mental Health; Bangladesh

Introduction

Uncertainty, lockdown and economic crisis resulting from COVID-19 pandemic could increase the risk of mental health issues and worsen the health inequalities [1]. COVID-19 places additional pressure on the entire healthcare system including doctors, who experience high levels of work stress even in normal circumstances, and research shows that such additional pressure puts doctors

at greater risk of psychological distress [2]. Researchers found high prevalence of stress, anxiety and psychological distress especially among female doctors, young health care workers and those who provided services to COVID-19 patients or suspected COVID-19 patients [3]. In a survey, out of the 906 healthcare workers 48 (5.3%) were screened positive for moderate to very-severe depression, 79 (8.7%) for moderate to extremely-severe anxiety, 20 (2.2%) for moderate to extremely-severe stress, and 34 (3.8%) for moderate to severe levels of psychological distress [4]. It is also found that depressive and anxiety symptoms are more common among the healthcare professionals who are less psychologically prepared, lacking perceived self-efficacy, lacking family support, and those with poor sleep quality [5,6]. Similarly, researchers also warn of increasing rates of social problems such as domestic violence, suicide and substance abuse during the pandemic [7,8]. Despite the resilience of healthcare professionals, a large number of them has experienced and will experience some sort of physical and psychological difficulties [9,10].

The impact of COVID-19 pandemic in Bangladesh is similar to other countries of the world. The government's disease monitoring agency, IEDCR, identified the first three cases on the 8th March 2020. Like other countries, doctors in Bangladesh are the frontline fighters in COVID-19 crisis. Thus, their mental health, emotional safety and wellbeing matter. Moreover, in crisis period like COVID-19 pandemic, doctors are crucial part of overall health care system and their service is utterly dependent on their mental health and wellbeing. Different types of unprocessed and difficult emotions such as stress, anger, sadness, grief can make them more vulnerable. Researchers found that these emotions can compromise doctors' personal wellbeing, since suppressed or unprocessed emotions may lead to burnout, moral distress, compassion fatigue, and poor clinical decisions which adversely affect patient care [11-13]. Therefore, at least a primary mental health assessment was needed to understand the mental health risk of Bangladeshi doctors during the COVID-19 pandemic for creating awareness, and taking measures such as ensuring mental health care, treatment and policy support.

Aim of the Study

This research aimed to investigate the psychological impact of COVID-19 pandemic on Dhaka based doctors and to identify the percentage of doctors who are at high risk of mental health which can be considered as clinical cases, and thus, require clinical attention.

Materials and Methods

The cross-sectional survey design was followed for this study. We started the survey in August 2020 and finished data collection in November 2020. The research was approved by the research ethics committee of Department of Educational and Counselling Psychology, University of Dhaka.

Participants

Initially 416 doctors of Dhaka city participated in this study; 358 doctors' responses were included and the rest 58 incomplete responses were excluded. Among the 358 participants, 63.1% were male and 36.9% were female. Doctors from all age groups participated in this study, for example, 24.3% doctors were from the age group 20 - 30, 50.3% were from 31 - 40, 19% were from 41 - 50 and 6.4% were from 51 - 65. In terms of marital status, 79.6% doctors were married, 18.4% were unmarried, and 2% were divorced or separated from their spouses. Doctors from different type of medical setting attended in this study such as 30.7% doctors were from covid dedicated hospital, 16.5% of them were from non-covid hospital, 47.2% were from mixed type hospital (both covid and non-covid) and 5.6% doctors were from others type of workplace. The duration of the survey was 3 months (from August 2020 to November 2020) and in this timeline 28.8% doctors reported that they have already recovered from COVID-19.

Measures

Demographic information: We collected information about the doctors' gender, age, marital status, type of workplace during COVID-19 pandemic and the information whether they have been affected by COVID-19 or not.

General health questionnaire-12 (GHQ-12): As an investigation tool the Bangla translated version of the 12-item General Health Questionnaire (GHQ-12) was used. This questionnaire was originally developed as a 60-item questionnaire. GHQ-12 consists of 12 items which is related to mental health such as recent feelings, behavior, mood rather than physical health [15,16]. The items of the questionnaire phrased in both positive and negative directions. The answers were organized in four-point Likert scales. However, the response options are phrased in terms of 'less than usual', 'not

Characteristics	n (%)
Gender	
Male	63.1
Female	36.9
Age range	
20 - 30	24.3
31 - 40	50.3
41 - 50	19
51 - 65	6.4
Marital status	
Married	79.6
Unmarried	18.4
Divorced/ widowed/separated	2
Type of workplace	
Covid dedicated hospital	30.7
Non-covid hospital	16.5
Mixed type (covid, non-covid both)	47.2
Other type of workplace	5.6
Corona virus infection	
Already infected	28.8
Not infected	72.2

Table 1: Demographic characteristics of the participants.

more than usual', 'rather more than usual', or 'much more than usual'. These are already arranged, so no reverse scoring is needed. GHQ-12 is a self-administered questionnaire focuses on two major areas - appearance of new and distressing phenomena and inability to carry out normal functions. For this study GHQ-12 was used as this is recognized as an ideal and widely used screening device for identifying non-psychotic and minor psychiatric disorders to help inform further intervention. The default scoring of GHQ-12 ranges from 0-3, with a maximum score of 36, and higher scores reflect higher distress or psychiatric illness. As an indication of 'caseness' or clinical attention the suggested default threshold for GHQ-12 is 11/12 (maximum score 36) in liker form.

Procedure

We utilized the data of an ongoing study for this research. It was an online survey and each participant was provided with a google form via email, whatsapp, viber, and messenger. The google form was consists of three parts such as the written consent paper along with the instruction for the participants, the demographic information of the participants and the mental health related questionnaire (GHQ12) respectively. The participants were instructed to complete and submit the google form online. Each participant required 10 - 15 minutes approximately to fill up the form. As GHQ-12 is an easily understandable self-report measure, the participants did not report any issues or concerns while filling up the google form. They were provided with the contact number and email address of one of the investigators and requested to communicate if needed. The participants were also requested to inform if they feel discomfort or become emotionally vulnerable during or after the data collection. Mental health first aid service was ready and available for them.

Results

The participants' obtaining GHQ-12 scores showed that 78.5% doctors' psychological distress during COVID-19 pandemic is more or much more than usual and they scored above the suggested GHQ-12 threshold. In table 2 we can see that only 21% doctors experienced usual or less than usual psychological distress, whereas 58.9% doctors experienced more than usual and 19.6% doctors experienced much more than usual psychological distress.

The results also indicate that psychological distress of female doctors is higher than the male doctors. Table 3 shows that the mean score of female doctors is 19.23 and male doctors is 17.67. Thus, female doctors scored higher in GHQ-12 than the male doctors and the difference was considered statistically significant ($t = 2.011$, $p = .045$). It is also shown that the mean GHQ-12 score of both male and female doctors are above the suggested threshold which indicate possible psychological distress or disturbance.

Discussion

The objective of this study was to see the prevalence of psychological distress among Bangladeshi doctors during the Covid-19 pandemic. Our findings indicate that the psychological wellbeing of majority of doctors (78.5%) was poor as they crossed the threshold level of the GHQ-12 score. Therefore, a large number of doctors experienced concerning level of psychological distress or disturbances during Covid-19 pandemic which can be considered as clinical cases, and thus, need mental health care or clinical intervention.

GHQ-12 score	Number of doctors	% of the doctors	% of above threshold GHQ-12 score of the participants
0 - 11	77	21.5	
12 - 24	211	58.9	58.9
25-36	70	19.6	19.6
	n = 358		Total = 78.5%

Table 2: Prevalence of psychological distress.

*The suggested threshold score of GHQ-12 is 11/12. Equal or above this score indicate possible psychological distress and needs clinical intervention.

*GHQ-12 score 0-11 indicates usual or less than usual psychological distress.

*GHQ-12 score 11-24 indicates more than usual psychological distress.

*GHQ-12 score 25-36 indicates much more than usual psychological distress.

Variable		Females (n = 44)	Males (n = 31)	t-value	prob
GHQ Score (psychological distress)	M SD	19.23 (7.200)	17.67 (6.974)	2.011	.045

Table 3: Comparison of psychological wellbeing by gender.

The findings also showed that female doctors are more vulnerable than their male counterparts in terms of mental health and well-being, though both groups scored high in psychological distress. We utilized the data of an ongoing study named social support and psychological wellbeing of Bangladeshi doctors during COVID-19 pandemic, thus, we are on the way of exploring and addressing the factors contributing this concerning level of psychological distress among Bangladeshi doctors. A plenty of research evidence showed that excessive work pressure, inadequate self-care, lack of professional help seeking behavior, sense of insecurity and inadequate PPE, lack of social support, physical distancing from family members during pandemic make doctors and health professional more vulnerable [17-20].

However, from risk management perspective, it's crucial to manage work stress, ensure social as well as professional support from individual and organizational level. Similarly, it is evident that professionals' motivation and morale are significantly improved when they perceive that their efforts are recognized and reciprocated by employers and authorities [21,22].

Further studies are needed to explore the factors of high mental health risk of Bangladeshi doctors during the pandemic and to devise policy from risk management perspective. Convenient sampling technique was used and self-report assessment tool was applied to collect data for this study. Thus, randomization and clinical interview are recommended for further studies.

Conclusion

The study suggests that doctors are at high risk of mental health during the Covid-19 pandemic.

This is consistent to other similar studies conducted in different countries during the ongoing pandemic. The results highlight the importance of ensuring psychological support and mental health care to Bangladeshi doctors during the crisis periods. Otherwise, healthcare services can be disrupted.

Acknowledgements

Gratitude to the participants who took time during this difficult period to fill up the form.

Conflict of Interest

There is no conflict of interest.

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