Psychological aspect of common people during lockdown

ABSTRACT

Background: Lockdown was implemented to restrict the transmission of COVID-19. This brought upon many unforeseen hurdles, including mental health problems. Aim: The aim of the study is to assess the impact of lockdown on mental health. Materials and Methods: A cross-sectional study was conducted using Google Form, which the participants were requested to complete online. The questionnaire included sociodemographic information and general health questionnaire (GHQ)-12, which was used to screen for mental health. Results: A total of 343 participants took part in the study in which 113 participants (32.9%) were having GHQ score of less than or equal to 12. The study showed that people aged less than 41 years were able to concentrate more during lockdown (75.6%) as compared to people aged more than 41 years (65%). Younger participants who were less than 41 years reported sleep disorders associated with late-night entertainment and TV viewing (24.5%). Many experienced stress during lockdown, but it was more in people over 60 years (63.7%). Conclusions: An appreciable proportion of the participants faced stress during lockdown. Elderly people were more affected. Sleeping disorders were associated with late-night entertainment and TV viewing in younger people.

Keywords: COVID-19, general health questionnaire, mental health
MATERIALS AND METHODS

A cross-sectional study was conducted through Google Form using social media such as WhatsApp groups. Approval of institutional ethical committee was obtained before starting the study. All participants gave written informed consent. The study was conducted over a period of 3 months. A total of 343 participants over 18 years took part in the study.

Tool
The General Health Questionnaire (GHQ12) is a 12 item scale which is widely used as a screening test for mental health status.\[12\]

Methodology
In addition to the responses to GHQ-12, sociodemographic information such as gender, age, occupation, and residence was collected. Besides, we included questions about the effects of lockdown on concentration, sleep, self-confidence, and stress during lockdown. A pilot study was done first. Based on the results of pilot study, the calculated sample size was 300. After taking informed consent from participants, all the information was collected on predesigned and pretested questionnaire through Google Forms. Data collection was done for 1-month period. Data from 343 participants were collected.

Statistical analysis
Data analysis was carried out using Epi-Info TM 7.2.3.0 statistical software (developed by Centers for Disease Control and Prevention in Atlanta, Georgia). Categorical data were presented as numbers and percentages. Quantitative data were summarized with mean and standard deviation. Mann–Whitney U-test was used to test for significant differences.

RESULTS

Age and gender distribution of the participants
Out of the 343 participants, 149 (43.4%) were males and 194 (56.56%) were females; 207 (60.34%) were between 21 and 40 years and 11 (3.20%) were above 60 years. Most were from big cities such as Pune which had 106 (30.90%) participants and Delhi which had 39 (11.37%) participants. 82 (23.90%) participants were doctors, 125 (36.44%) participants were students, and 25 (7.2%) were in government service.

Participants aged between 21 and 40 years and above 60 years were not able to concentrate on task during lockdown as compared to other age groups. The elders also experienced difficulty in falling asleep due to worries related to news of COVID-19 and its consequences. All the participants highlighted that they were capable of making decisions during lockdown, but participants over 60 years were felt less confident. Stress was experienced by all age groups during lockdown more commonly between those 21 and 40 years of age, followed by participants with age less than 21 years and those above 60 years [Table 1].

Majority were able to enjoy their daily activities and could manage problems with ease during lockdown. Few participants felt that they were “feeling less confident” and “feeling worthless” during the lockdown. Female participants were able to focus more on task during lockdown as compare to male counterpart (P = 0.0008). Sleep difficulty was seen more among women (P = 0.0094). Compared to females, more males believed that they were capable of making decisions during lockdown (P = 0.112); however, it was not statistically significant. Both genders equally felt stress due to lockdown (P = 0.84). Female participants felt that they consider themselves worthless during lockdown, whereas fewer males felt so (P = 0.28); however, the difference was not significant [Table 2].

DISCUSSION

Lockdown due to COVID-19 pandemic led to concerns regarding its impact on mental health. The widespread lockdown is expected to have a psychological impact on individuals, families, and communities.\[13\] People with age less than 21 years and participants aged between 41 and 60 years felt reduction in concentration during the lockdown period. Overall mean of this component of GHQ-12 was 1.16 which was much lesser than 2.68 which were seen in another study which took place between March and April 2020.\[14\]

Reports about anxiety, fear, frustration, loneliness, anger, depression, and stress were found commonly associated with restrictive measures, such as quarantine and lockdown.\[13\] Headline Stress Disorder was named for the psychiatric disorder caused by too many news coverage. It is a highly emotional response such as feeling of anxiety and stress, to endless reports from news media.\[15\] Another review article assessed the psychological impact of quarantine, reported insomnia, exhaustion, anxiety, and irritability as few common symptoms.\[16\] Sleep changes were observed during the COVID-19 lockdown. People went to bed later during the lockdown compared to prelockdown period. There was a significant increase in the waking hours. Other investigators have also reported insomnia and sleep disturbances during the COVID-19 pandemic.\[17\]

Msherghi et al.\[18\] reported irritability (70.8%), anger (70.1%), and fatigue (61.5%) among people under restrictive measures. These symptoms need to be addressed.\[19\] Similar
to the present study, other studies have reported mental health issues in young adults.[19,21]

While both genders faced more or less similar levels of stress, it has been reported than men underreport it due to societal expectations to be stronger mentally.[22]

Like in our study, 27% of people living in Michigan had suffered from low self-esteem during the pandemic, 22% of females in the above study felt the same, and 42% of people expressed that their self-esteem during pandemic has gone down.[23]

The findings of the study are limited to those with access to smartphones and having knowledge of the English language. This could lead to selection bias. In addition, it was an online survey, with inherent limitations. There is a need to find out the effect of repeated lockdowns on mental health by field studies.

### CONCLUSIONS

Mental health of both young and old was affected in varying degrees by the lockdown. Some of the issues were

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**Table 1: Age distributions of responses**

| Components                                                                 | Mean (SD) | Age groups (years) (n) | Total All age (343) |
|---------------------------------------------------------------------------|-----------|------------------------|---------------------|
| You have been able to concentrate on whatever you are doing during lockdown | 1.16 (0.87) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 1.16 (0.83) |
| You are experiencing difficulty in falling asleep due to worries related to news of COVID-19 and its consequences | 1.16 (0.91) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 1.05 (0.90) |
| You feel like you are playing a useful part in things (household work) during the lockdown | 0.80 (0.61) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 0.75 (0.64) |
| You feel that you are capable of making decisions about things during this lockdown | 1.04 (0.70) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 0.98 (0.68) |
| You are experiencing constant strain (mental pressure) during lockdown due to pandemic | 1.48 (0.91) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 1.43 (0.92) |
| You feel like you could not overcome your difficulty during lockdown | 1.38 (0.85) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 1.28 (0.83) |
| You feel like you are enjoying your normal day-to-day activities during lockdown | 1.49 (0.88) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 1.32 (0.87) |
| You have been able to face up your problems during the lockdown | 1.49 (0.88) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 1.03 (0.68) |
| You have been feeling unhappy and depressed during long stay in home | 1.38 (0.94) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 1.36 (0.96) |
| You are feeling less confident in yourself during this phase of lockdown | 1.14 (0.86) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 1.14 (0.85) |
| You think yourself as a worthless person during the period of lockdown | 0.84 (0.81) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 0.89 (0.87) |
| You have been feeling reasonably happy during this phase of lockdown | 1.28 (0.75) | 18-20 (53) | 21-40 (207) | 41-60 (72) | 60 plus (11) | 1.29 (0.77) |

SD – Standard deviation; COVID 19 – Coronavirus disease 2019

The data reject normality and therefore Mann-Whitney test (independent samples) was applied.

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**Table 2: Gender distributions of responses**

| Components                                                                 | Gender (n) | P       |
|---------------------------------------------------------------------------|------------|---------|
| You have been able to concentrate on whatever you are doing during lockdown | Male (149) | 0.99 (0.79) | 1 | 1.30 (0.83) | 1 | 0.0008 |
| You are experiencing difficulty in falling asleep due to worries related to news of COVID-19 and its consequences | Male (149) | 0.91 (0.88) | 1 | 1.16 (0.90) | 1 | 0.0094 |
| You feel like you are playing a useful part in things (household work) during the lockdown | Male (149) | 0.72 (0.68) | 1 | 0.75 (0.60) | 1 | 0.4408 |
| You feel that you are capable of making decisions about things during this lockdown | Male (149) | 1.05 (0.72) | 1 | 0.92 (0.64) | 1 | 0.1120 |
| You are experiencing constant strain (mental pressure) during lockdown due to pandemic | Male (149) | 1.44 (0.87) | 1 | 1.41 (0.92) | 1 | 0.8493 |
| You feel like you could not overcome your difficulty during lockdown | Male (149) | 1.32 (0.80) | 1 | 1.26 (0.85) | 1 | 0.5372 |
| You feel like you are enjoying your normal day-to-day activities during lockdown | Male (149) | 1.27 (0.87) | 1 | 1.34 (0.86) | 1 | 0.5014 |
| You have been able to face up your problems during the lockdown | Male (149) | 1.08 (0.70) | 1 | 1.10 (0.65) | 1 | 0.7487 |
| You have been feeling unhappy and depressed during long | Male (149) | 1.35 (0.96) | 1 | 1.36 (0.97) | 1 | 0.9986 |
| You are feeling less confident in yourself during this phase of lockdown | Male (149) | 1.13 (0.85) | 1 | 1.10 (0.85) | 1 | 0.6779 |
| You think yourself as a worthless person during the period of lockdown | Male (149) | 0.81 (0.76) | 1 | 0.96 (0.94) | 1 | 0.2864 |
| You have been feeling reasonably happy during this phase of lockdown | Male (149) | 1.26 (0.73) | 1 | 1.31 (0.81) | 1 | 0.5272 |

The findings of the study are limited to those with access to smartphones and having knowledge of the English language. This could lead to selection bias. In addition, it was an online survey, with inherent limitations. There is a need to find out the effect of repeated lockdowns on mental health by field studies.
stress, not able to overcome difficulties, feeling unhappy and depressed, and lack of confidence. Long periods of lockdown can have adverse effects on mental health.

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Conflicts of interest
There are no conflicts of interest.

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