

Original Research Article

Psychological distress in post COVID-19 patients

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ABSTRACT

Background: COVID-19 disease is highly contagious and transmission rates are very high. In any biological disaster like this, fear, uncertainty, and stigmatization are common. Even after discharge, they may suffer from varying degrees of long-term mental health problems mainly due to isolation. Physiotherapists play an important role in the rehabilitative phase of these. Therefore, the need of this study is to understand the psychological impact caused because of the COVID-19 disease and take this into consideration while treating the patients so that the rehabilitation protocol is effective maximally.

Methods: Permission was taken from the ethical committee before beginning the research. Subjects who met the inclusion criteria were selected as per voluntary enrolment. A validated self-made questionnaire was forwarded and response was obtained from 167 subjects. Descriptive data analysis was done.

Results: After suffering from COVID-19 disease, out of the 167 participants that were a part of this study 35.3% had sleeping disturbances, 29.3% had a poor appetite, 34.7% feel gloomy and hopeless for no reason, 45.5% have trouble relaxing, 43.1% can't stop worrying, 53.3% experience negative thoughts, 57.5% report decreased job efficiency, 37.1% feel afraid that something awful might happen, 32.9% feel anxious for no reason, and 26.9% complain of reduced concentration. The mean age of population of this study was 30 with a standard deviation of 12.27.

Conclusions: The study suggested the presence of psychological distress among the COVID-19 survivors. Post-illness stress and depression are highly prevalent among COVID-19 survivors.

Keywords: Anxiety, Depression, Post COVID-19, Psychological distress, Stress

INTRODUCTION

COVID-19 is a disease caused by a coronavirus called SARS-CoV-2. World Health Organization first learned about this new virus on 31 December 2019, following a report of cases of 'viral pneumonia in Wuhan, China.¹

COVID-19 is highly contagious. Since the first case, the epidemic has transmitted throughout China and many other countries and was declared a "public emergency of international concern" by the World Health Organization (WHO) emergency committee.² On 11 March 2020, the WHO officially declared that COVID-19 has reached a global pandemic level.³

Early symptoms of the disease include loss of taste or smell. Other symptoms include fever, cough, tiredness, shortness of breath or difficulty breathing, muscle aches, chills, sore throat, headache, chest pain, nausea, vomiting, and rash.¹ The signs and symptoms of coronavirus disease 2019 may appear two to 14 days after the exposure.¹

Transmission rates are very high and it can spread if there is close contact with someone who has COVID-19, or if you are coughed or sneezed on by an infected person. Other people can catch COVID-19 by touching the objects or surfaces that contain the infectious droplets and then touching their eyes, nose, or mouth.¹

In any biological disaster like this, fear, uncertainty, and stigmatization are common and may act as barriers to appropriate medical and mental health interventions.⁴ Patients with infections that are epidemic in nature experience more psychological problems during outbreaks than other patients. Even after their treatment and discharge, they may suffer from varying degrees of stress disorders, anxiety, and long-term mental health problems.²

From the early stages of this pandemic, concerns have been raised about its effect on mental health. According to the treatment guidelines, COVID-19 patients have to be treated in isolated hospitals. Due to social isolation, perceived danger, uncertainty, physical discomfort, medication side effects, fear of virus transmission to others, and negative news on social media, patients with COVID-19 may experience loneliness, anger, anxiety, depression, insomnia, and stress symptoms, which could negatively affect individuals' social and occupational functioning, and quality of life.⁵

Individuals needing admission in an intensive care unit (ICU) due to severe symptoms, are at especially high risk of developing post-traumatic stress disorder (PTSD), depression, anxiety, sleep abnormalities, and cognitive impairments.^{6,7}

Additionally, patients who have survived the COVID-19 are facing stigma and discrimination all over the world. In India, media reports revealed that COVID-19 patients were facing substantial social ostracism. They were asked to vacate their rented homes, and were even attacked while carrying out their duties and social activities. The World Health Organization also unveiled that some COVID-19 patients unfortunately experience avoidance by their family or community owing to stigma or fear. This can make an already challenging situation far more difficult than it already is.⁸ Stigma and uncertainty are therefore two of the main concerns among COVID-19 patients.⁹

While the COVID-19 pandemic has forced the world to modify its ways, we must also consider the needs that will emerge in the post-pandemic age for our patients and their families, who may face increased depression, anxiety, stress and financial difficulties.¹⁰ The objective of this study was therefore to find the presence of psychological distress in COVID-19 patients.

METHODS

This study was a cross sectional observational study conducted between April 2021 to March 2022. The samples were collected from Sancheti Hospital, Kamla Nehru hospital and from the home quarantined people.

Those who had suffered from COVID-19 disease were included and the ones with a previous history of psychological disorder before Covid-19 were excluded.

Permission was taken from the ethical committee before beginning the research project.

As per convenience sampling, subjects who met the inclusion and exclusion criteria were selected and added to the study as per voluntary enrolment. Permission was obtained from the subjects via a consent form.

They were given a prior description of the study and were thoroughly explained about the research being carried out, the aims of the study, the importance of the study, its relevance, and future implications. A validated self-made questionnaire was given to them and descriptive data analysis was done.

RESULTS

Results were calculated using descriptive data analysis. After suffering from Covid-19, 53.3% of the 167 participants experience negative thoughts (Figure 1), 43.1% can't stop worrying (Figure 2), 57.5% report decreased job efficiency (Figure 3), 45.5% have trouble relaxing (Figure 4), 35.3% tend to sleep too much (Figure 5), 34.7% are uninterested or unsatisfied with their work (Figure 6), 37% are afraid something awful might happen to them (Figure 7), 26.9% have concentration issues (Figure 8), 33% feel anxious without any reason (Figure 9), 29.3% suffered from insomnia (Figure 10), 29.3% have a poor appetite, and 34.7% feel gloomy and hopeless for no reason, all of which imply stress, anxiety, and depressed symptoms indicating psychological distress.

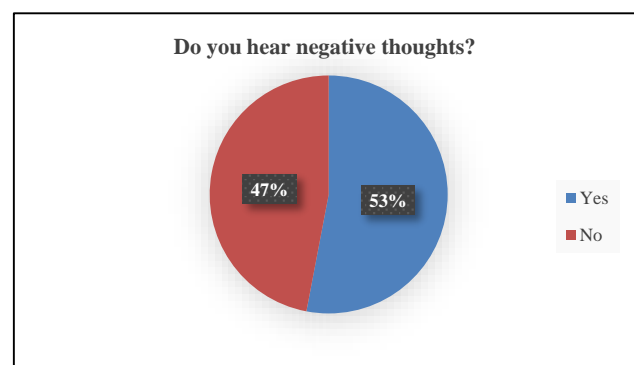


Figure 1: Negative thoughts.

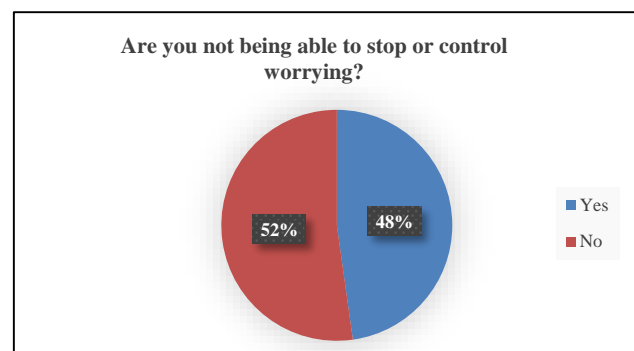


Figure 2: Stress and anxiety.

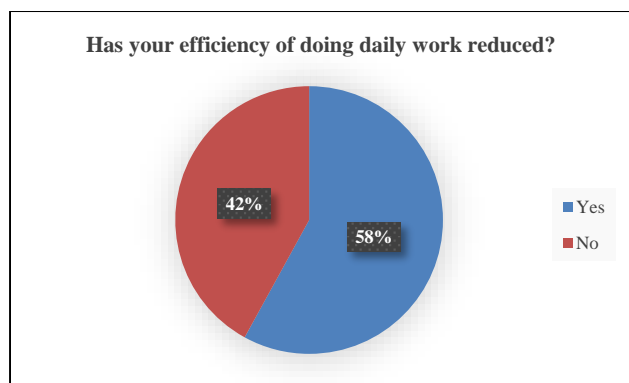


Figure 3: Efficiency of daily activities.

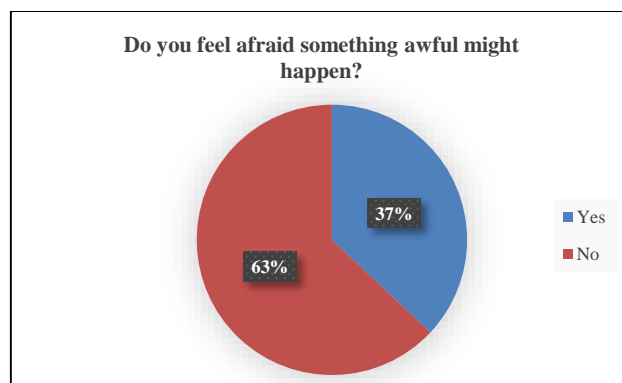


Figure 7: Fear and anxiety.



Figure 4: Difficulty relaxing.

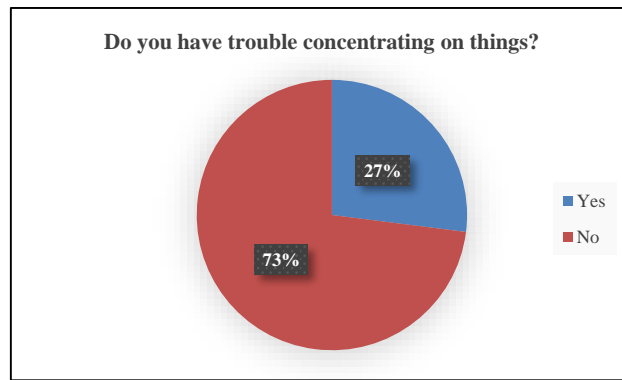


Figure 8: Concentration issues.

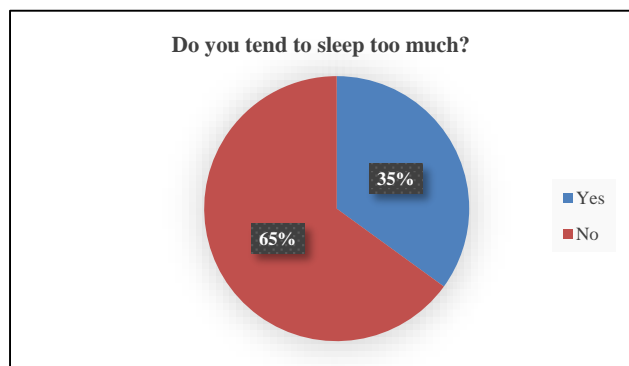


Figure 5: Sleeping disturbance.

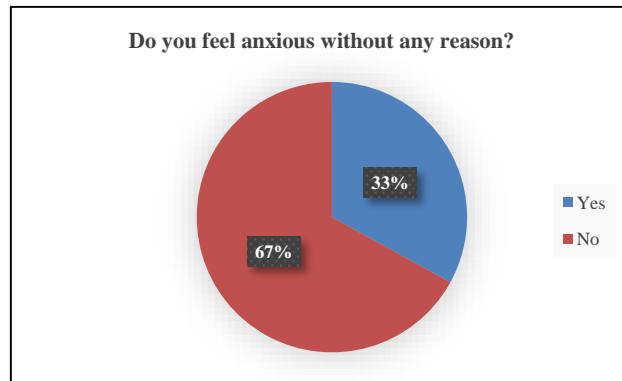


Figure 9: Anxiety.

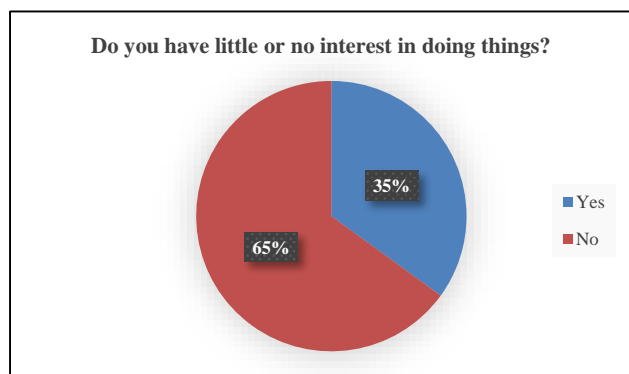


Figure 6: Interest in activities.

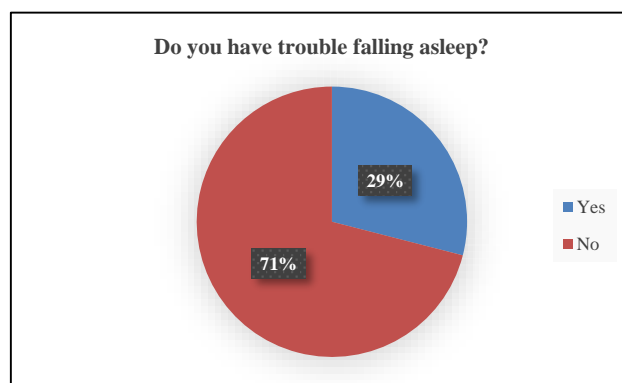


Figure 10: Sleeping disturbances

Therefore, there is the presence of psychological distress in the participants. The mean age of the population of this study was 30 with standard deviation of 12.27.

DISCUSSION

The current study provides findings regarding the psychological distress caused post COVID-19 disease in its survivors. The overall presence of stress, anxiety, and depression, all of which are the symptoms of psychological distress, amongst the participants of this study, are high. After suffering from COVID-19, 35.3% of the 167 participants tend to sleep too much while 29.3% suffered from insomnia indicating sleeping disturbances, 29.3% have a poor appetite, 34.7% are uninterested or unsatisfied with their work, 34.7% feel gloomy and hopeless for no reason, 45.5% have trouble relaxing, 43.1% can't stop worrying and 26.9% have concentration issues. Apart from that, 53.3% experience negative thoughts, and 57.5% report decreased job efficiency. All of the following imply stress, anxiety, and depression symptoms indicating the presence of psychological distress in the survivors' post-COVID.

There are many causes that can lead to the following symptoms in the survivors of COVID-19 disease. In any biological disaster like this, fear, uncertainty, and stigmatization are common and may act as barriers to appropriate medical and mental health interventions.¹¹ Patients with infections that are epidemic in nature experience more psychological problems during outbreaks than other patients. Even after treatment and discharge, they may suffer from varying degrees of stress disorders, anxiety, and long-term mental health problems.¹²

Firstly, social isolation is a major factor contributing to psychological distress. The whole recovery process of an individual is away from their loved ones. Isolation, scarcity of resources, and the lack of social contacts produce a negative impact on people's emotions.⁷ Apart from that, isolation develops fear, negative mood, loneliness, and an increase in stress, leading to anxiety and depression.^{3,7}

Secondly, the use of the internet has also played a major role in inculcating stress amongst patients. The internet provides access to all the unfiltered and false information and therefore is a huge contributor to the distress. Circulation and access to fake information, misinterpretations regarding the situation, and the news regarding plenty of deaths due to COVID-19 tend to overwhelm the patient. It inculcates negative thoughts, depression, and an increase in anxiety.¹³

They also have psychological uncertainty as to whether they will survive or not leading to anxiousness, confusion, and fear of death.¹⁴

A study was done in Iran in 2020 to assess the psychological disturbances in the survivors of COVID-19 disease. The study suggests the presence of post-traumatic stress, anxiety, and depression in its subjects post COVID due to social isolation, stigmatization, confusion regarding the correct information, and due to the fear of death.¹⁵

A similar study was done in Shenzhen, China in 2020, and this study aimed at finding psychological distress and its correlates among COVID-19 Survivors during early convalescence across age groups. The results showed that the occurrence rate of psychological distress among COVID-19 survivors in early convalescence is dramatically high.¹⁶

COVID-19 has various other symptoms of its own. Some of these include breathlessness or difficulty in breathing, fatigue, body and muscle aches, nausea and vomiting, generalized body weakness, fever, and chills. In severe cases of COVID-19, symptoms like high-grade dyspnea, oxygen saturation drop, mild to severe chest pain, and sometimes even respiratory distress or failure may be present. All these symptoms make the patient physically and mentally exhausted. They make the patient functionally inefficient causing dependency, irritation, and stress. These factors are also a contribution to the distress of the patient.

Apart from the following causes, COVID-19 survivors suffer from the burden of being a carrier of the disease for family members and the surrounding people. The constant fear of being a transmitter of the disease to others causes stress and anxiety.² The fear of being a victim of stigmatization and being treated differently in society, the workplace, and even in the domestic environment due to the same is also a huge add-on to the distress. In India, due to unawareness regarding the disease and its effects and lack of education, stigmatization post-COVID-19 disease was widespread. COVID-19 patients faced substantial social ostracism. Patients were reportedly abandoned by their families, people were told to vacate their homes, and a few of the patients were stalked and harassed by the media.^{8,9} This can make an already challenging situation far more difficult.

Not only that, the lockdown has caused various businesses to shut down or decelerate. Coronavirus has largely impacted the growth of almost every country and is responsible for the slump in gross domestic product worldwide. Isolation also breaks the continuity of doing a job. This epidemic has affected the employment and incomes of most families causing financial instability which adds to the psychological distress.²

Similar studies were also done during the (severe acute respiratory syndrome) SARS epidemic outbreak in 2004. A study was done in Hong Kong to find out about psychological distress in SARS survivors. These studies

aimed at finding out the prevalence of psychological distress post a biological disaster that was epidemic in nature and the results showed the presence of stress, anxiety, depression, and post-traumatic stress in its survivors due to the same reasons.¹⁷

Another study was done in China in the year 2009, to find out the long-term psychiatric effects of severe acute respiratory syndrome in its survivors and this study also proved the presence of psychological distress in them due to the reasons stated.¹⁶

In India, psychological health is always neglected the most. The lack of education and awareness regarding the condition causes ignorance and negligence of mental health. Recovery, only in terms of physical aspects of a being is paid attention to. Early diagnosis and assessment of the same should be done and appropriate medical and mental health intervention should be taken. Physiotherapists play a very important role in the rehabilitative phase of people who have suffered from this disease. Constant reassurance, providing appropriate information regarding their condition, clearing any silliest doubts regarding the disease, referring them to a mental health professional, preventing false information to take over the patient's mind, and providing a means for the patient to communicate with their loved ones can help the patient to cope better. Therefore, all COVID-19 survivors should be screened for stress, depression, and anxiety regularly to identify those with psychological distress for timely intervention and for the rehabilitation protocol to be effective maximally both in terms of physical and mental aspects.⁵

This study has some limitations. As the questionnaire was circulated online, the population who did not have access to the internet or technology couldn't be a part of this study. Online questionnaire surveys screened out those survivors who did not know how to use smartphones, failing to get psychological data from those with low levels of education or very old individuals and who were inaccessible to online information. The psychological impact on a survivor who was quarantined at home versus the one who was isolated in a hospital set up also differ, therefore the present findings may not be readily generalized to all COVID-19 survivors.

CONCLUSION

According to the findings of this study, COVID-19 survivors are experiencing psychological distress. Apart from the physical effects of the disease, COVID-19 survivors suffer from post-traumatic stress disorder (PTSD), depression, anxiety, and stress.

As a result, we recommend that all COVID-19 survivors be evaluated for stress disorder, anxiety, and depression on a regular basis to identify individuals who are experiencing psychological distress and to provide an efficient and successful rehabilitation regimen so that the

protocol is effective maximally both in terms of physical and mental aspects.

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