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#### Research

## Prevalence of Depression, Anxiety and stress among medical hostel lite girl students belong to 18 to 26 year

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Check for	Abstract
Published on: 16 Feb 2024	Students lives can be impacted by mental health issues such as depression, anxiety and stress. There have been few studies to assess depression, anxiety and stress among hostel students. This was an observational study to
Published by: DrSriram Publications	determine the factor that contribute to depression, anxiety and stress. Hostel students face a variety of environmental and social issues. This study was conducted to find out the prevalence of Depression, Anxiety and Stress among the hostelite girl students in MGM campus of Aurangabad.
2024 All rights reserved.  Creative Commons Attribution 4.0	Method: DASS-21 scale is the self-reported questionnaire to measure the severity of a range of symptoms common to both depression and anxiety. Data was collected on the google forms with Demographic data and 21 questions from 151 hostelite living students. Individual is required to indicate the presence of symptoms over the previous week. Study was included hostelite students who lives at MGM campus, Aurangabad.  Result: After receiving all the responses from participants selected for the study it showed that physical health of hostelite girls students affected. Out of 151 participants 47% of population affected by Depression, 54% of population
International License.	affected by Anxiety and 33% of population affected by Stress.  Conclusion: Overall, result from this study suggests that the mental health of hostelite students in MGM campus is affected, which may affect their personal and social life. So this study suggests that proper interventions should be structured.  Keywords: Mental health, Depression, Anxiety, Stress Hostelite Students, DASS-21 Scale, Online Survey, Physiotherapy.

#### INTRODUCTION

Health is a state of complete physical, mental, and social well-being, not merely the absence of illness. Stress is feeling overwhelmed or pressure that's unmanageable, while anxiety and depression are reactions to stress. Anxiety and depression are closely related, with anxiety often preceding depression. Root causes of

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anxiety and depression include genetic, biological, environmental, and psychological factors. They can be exacerbated by factors such as academic pressure, peer influences, and life transitions, particularly for college students. Women are more likely to be affected by mental health conditions than men. By uncovering the root causes, we can implement targeted interventions and support mechanisms to mitigate these impacts and promote holistic well-being among hostel residents. Physiotherapy approaches can help manage anxiety and depression by reducing muscle tension and improving sleep, mood, and self-esteem.

What are the root cause of anxiety? Even when there is no real threat, the flight-or-flight centre in these people's brains becomes activated for reasons that are only partially understood today. Being anxious all the time is like being stalked by an invisible predator. Anxiety is an unavoidable part of life. When there is conflict in a relationship, a problem at work, a big test looming, or a major decision looming, it is common for people to feel anxious. Anxiety disorders, on the other hand, involve ore than just temporary worry or fear. Anxiety dose not go away in people who have an anxiety disorder. It frequently worsens over time, to the point where emotions interfere with their daily functions.

What are the root causes of depression? Depression, according to current research, is caused by a combination of genetic, biological, environmental, and psychological factors. While it can happen at any age, it usually starts in adulthood. Depression in children and adolescents, like many anxiety disorders, may manifest as irritability rather than low mood. Depression manifests itself as hopelessness, despair and anger by adulthood. Individuals suffering from low energy levels are frequently overwhelmed by the day-to-day tasks and personal relationships that are essential to life.

Physiotherapy approaches have beneficial effects in various emotional states, among which anxiety disorders are highlighted (Kaur et al.,2013). Physiotherapy treatment plant's important role in management of depression anxiety stress reducing tension in muscles and improve sleep, mood and self-esteem.<sup>5,7</sup> The remarkable changes observed in patients who are doing aerobics activities, respiratory exercises, rhythmic exercise programs and who use large muscle groups, from low to moderate intensity.<sup>23</sup>

#### MATERIALS AND METHOD

#### **Materials Used**

- 1. Consent Form: A written, informed consent form from the subjects to allow the subjects to be included in the study.
- 2. Data Collection Sheet: Google form link shared on social media with students.

#### Instruments/Tools used

The DASS-21 Scale (Depression, Anxiety and Stress scale). 16

#### INCLUSION CRITERIA

- 1. Hostelite girls in college campus.
- 2. Girl students between 18 to 26 years of age.
- 3. Girl students willing to participate in this study.

#### **EXCLUSION CRITERIA**

- 1. Students living with their family.
- 2. Students having their own room flat or guardians.
- 3. Students on medication for any illness.
- 4. Students who were absent on the day of data collection.

#### Depression, Anxiety and stress (DASS-21)

Depression, Anxiety, Stress (DASS-21) is a self-reported and easy to assess. It consists of 21 items, 7 items per sub-scale: depression, anxiety and stress developed by Lovibond and Lovibond (1995). It measures the severity of a range of symptoms common to both depression and Anxiety. Accordingly, DASS allows not only a way to measure the severity of a patient's symptoms but a means by which a patients response to treatment can also be measured.

#### **METHODOLOGY**

The purpose of the study was explained to the subjects/participants. A written consent was obtained from all the participants. The participants were screened based on the inclusion and exclusion criteria prior to their enrolment into the study. The data collection sheet with the DASS 21 scale questionnaire in the form of online google link was distributed among the participants. Participants was asked to fill the data collection sheet and DASS 21 questionnaire google form and was asked to be fairly quick while answering. Filled data

collection sheet and DASS 21 scale was collected on the same day and items was analysed with the help of DASS 21 score.

151 Volunteers participated in the present research. They all are living in hostel having mean age of 23 years. The following data from participant using a standardized from: name, age, address, email address, contact, consent form. The participant was included on the basis of inclusive criteria and exclusive criteria. Student who failed to fulfil all inclusive criteria were excluded from the study. Convenience sampling was employed. Questionnaires were distributed through google form format to MGM hostel of MGM campus of Aurangabad. Participants were asked to complete all three set of questionnaires including all 21 items questions (DASS21) for screening of depression, anxiety, stress symptoms, that 7- items for each symptom.

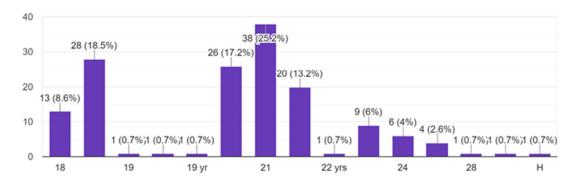
The DASS 21 is a self-report questionnaire consisting of 21 items. In that 7 items per sub-scale Depression, anxiety, stress. Students were asked to score every item on scale from o (did not apply to me at all) to 3 (applied to me very much, or most of the time). Sum score are computed by adding up the scores on the items per (sub)scale and multiplying them by a factor 2. Sum scores for the total DASS total scale thus range 0 and 120 and those for each of the sub-scale may range between 0 to 42. Cut off score of 60 and 21 are used for the total DASS score and for the depression sub-scale respectively. These cut off scores are derived from a set of severity raring, proposed by Lovibond and Lovibond.<sup>20</sup> score≥60 (for DASS total) and ≥21 (for the depression sub-scale) is labelled as "high" or "severe".

During intake, patients scored procedure as part of the standard intake procedure. After distributing the google forms, students were asked to participate in the study and sign a written informed consent. This consent included permission to use data from the DASS 21 at intake, as well as socio-demographic data from the students. Filled questionnaire and scales were collected in google form responses and items were analysed for DASS 21scoring.

#### RESULTS

The total number of 151 students have participated in the study. The study was conducted by using DASS-21 questionnaire. The obtained data was entered in Microsoft excel. The number and percentage of achieved cases were calculated according to demographic variables.





Among all the results from 151 students, the data was collected according to the DASS-21 scale, there are three components calculated as below.

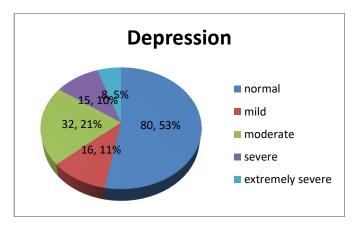


Fig 1: Depression in percentage

Out of 151 students, 53% (80) students had normal depression, 11% (16) students had mild depression, 21% (32) students had moderate depression, 10% (15) students had severe depression, 5% (8) students had extremely severe depression.

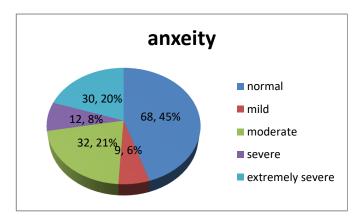


Fig 2: Anxiety in percentage

Out of 151 students, 45% (68) students had normal anxiety, 6% (9) students had mild anxiety, 21% (32) students had moderate anxiety, 8% (12) students had severe anxiety, 20% 30) students had extremely severe anxiety.

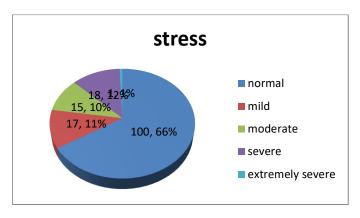


Fig 3: Stress in percentage

Out of 151 students, 66% (100) students had normal stress, 11% (17) students had mild stress, 10% (15) students had moderate stress, 12% (18) students had severe stress, 1% (1) students had extremely severe stress.

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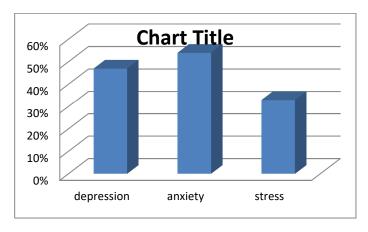


Fig 4: Depression, Anxiety and Stress

Results shows that out of 151 participants 47% of population affected by Depression, 54% of population affected by Anxiety and 33% of population affected by Stress.

#### **DISCUSSIONS**

The primary purpose of this study to find out the depression, anxiety and stress among hostelite females. The main objective of this study is to become aware the symptoms of perceived depression, anxiety and stress by the female hostel students and the relationship between the above-mentioned factors.

In present study 151 students were participated, which were appropriate to the inclusive and exclusive criteria and those who willing to participated in this study, who responded to a questionnaire which was based on depression, anxiety and stress that they perceived. As mentioned above in results the questionnaire used in this study was DASS-21. The questionnaire contains 7 items of each depression, anxiety and stress components.

According to the result current study provided, 47% of population were affected by depression, 54% of population were affected by anxiety and 33% of population were affected by stress.

In our study, 47% of population affected by depression. The reason attributed to depression can be as follows- they were having no feeling at all, difficult to work up initiative to do thing, they had nothing to look forward to, they felt down, hearted and blue, unable to become enthusiastic about anything, wasn't worth much as a person and felt that life was meaningless. One article says that reasons of depression could be based on their age, university students are at a higher risk of severe psychological distress and mental health issues. It has been linked to future negative outcomes and a variety of problems among graduates, including poor academic study performance and an increase in the prevalence of depression.<sup>26</sup> A study done on prevalence of depression, anxiety, and stress among UG students of Sahiwal medical college, found that the students underwent in depression were 48.30%.<sup>34</sup> So this study is in parallel to the current study.

Anxiety is the poor psychological wellness among students which has been a reason for concern globally. In this study ,54% of female hostilities were underwent in anxiety. The anxiety can be arising in hostelite girls due to dryness of mouth, difficulty in breathing, experienced trembling, worried about situation, the situations where they panic, they felt-they were close to panic, they were aware of the action of heart in the absence of physical exertion, they felt scared without any good reason. The study of Shendarkar on stressors in the medical college students (hostelites) in northern Maharashtra reported the anxiety was associated with feeling of loneliness, peer competition, long hours and loss of social time. <sup>24</sup> A study done on depression, anxiety, stress among UG students found that 55.5% anxiety present in UG students, which is in accordance with the findings of current study. <sup>29</sup>

Stress can be defined as a degree to which you feel overwhelmed or pressure that are unmanageable. In this study, 33% of hostelite students perceived stress. Stress in hostelite students occur due to the lack of sleep which in turn caused due to use of electronic media, more intake of coffee, unscheduled eating time, overthinking on academic performance, etc. This led to difficult to relax, getting agitated, intolerant of anything, they tend to overreact to situation. A study done on prevalence of depression, anxiety, and stress among UG students at Sahiwal medical college, found that stress present in their population was 44.40%, <sup>34</sup> which is higher than the current study.

As this study was conducted during Jan 2021 to May 2021 which was the period of covid-19 pandemic (second wave) during which most of the students attended their academics for university examination, Interns were posted in hospital in COVID duty. So, the contributing factor for DASS-21 Scale may have precipitated because student was facing pandemic situation which is going on all over the world. The pressure of not to lose

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academic year, loss of studies, to adapt to new online learning strategies may be the reason of increased level of Depression, Anxiety and Stress. So along with the hostel life many factors contribute to this study such as covid-19 pandemic, physical inactivity, change in year of academics, online exams, mental state of students, parental pressure, loneliness, etc. this somewhat influence the result of the current study. One of the reasons of hostelite females perceived depression, anxiety and stress can be they live alone, they have less direct contact with close family members and friends, receive less social support, and have a weaker integration in student social networks. Female students (the minority group in the student populations) appeared to be at a higher risk of experiencing negative mental health consequences. When different levels of social integration and COVID-19-related stressors were controlled for, female students appeared to have worse mental health trajectories.<sup>36</sup>

During the lockdown, women and children fared worse in terms of mental health. In order to reduce health inequities, it is critical to develop strategies for public health emergencies that include mental health and its determinants while taking a gender-based approach.<sup>37</sup>

This study thus is an effort to assess, focus and emphasize on making young hostelite female population aware about the Depression, Anxiety and stress, to reduce the depression, anxiety and stress proper intervention should be structured.

#### **CONCLUSION**

Data analysis from first-year students to those in their internship revealed that a significant number of students experience heightened levels of anxiety and depression, while stress levels were comparatively lower. To alleviate psychological symptoms among academic students, regular exercise, building self-confidence, focusing on academic performance with satisfaction, and maintaining a positive outlook towards the future are recommended. Additionally, adopting healthy lifestyle habits such as adequate sleep, balanced nutrition, practicing yoga and pranayama, engaging in aerobic exercises, and surrounding oneself with a supportive peer group can play crucial roles in enhancing psychological well-being.

This study has few limitations. One of the limitations is that this study did not focus on other causes for depression and anxiety such as the inherent personality, demographic information, and family conditions or status. As well as data collected on the online based google forms, so we could not reach the individuals who were facing problems related to internet or electronic gadgets. Due to the online survey the response that may not be the actual emotional answers of the participants.

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