

<https://doi.org/10.33472/AFJBS.6.14.2024.2607-2612>



African Journal of Biological Sciences

Journal homepage: <http://www.afjbs.com>



Research Paper

Open Access

INTERNET ADDICTION AND ITS RELATION TO PSYCHOPATHOLOGY AND SELF-ESTEEM AMONG MEDICAL STUDENTS

Ms. Shilpa¹, Dr. Niharika Arora², Dr. Parul Gairola³

¹M.Sc. Clinical Psychology (2 nd Year), Santosh Deemed to Be University, Ghaziabad Delhi NCR.

²Assistant Professor, Department. Of Clinical Psychology, Santosh Deemed to Be University, Ghaziabad Delhi NCR.

³Assistant Professor, Department. Of Clinical Psychology, Santosh Deemed to Be University, Ghaziabad Delhi NCR.

Article Info

Volume 6, Issue 14, August 2024

Received: 11 June 2024

Accepted: 14 July 2024

Published: 09 August 2024

doi: [10.33472/AFJBS.6.14.2024.2607-2612](https://doi.org/10.33472/AFJBS.6.14.2024.2607-2612)**ABSTRACT:**

This study is to assess the relationship between Internet Addiction, Psychopathological symptoms and Self-Esteem in medical students.

MATERIALS & METHODS: This research involved a sample consisting of 150 medical students, selected from Santosh Medical College and Hospital in Ghaziabad. Internet Addiction Test (IAT), Depression, Anxiety and Stress Scale (DASS-42) and Rosenberg Self Esteem Scale (RSES) were used to assess Internet Addiction and its potential influence on mental health.

RESULTS: Higher levels of Internet Addiction positively correlate with increased Depression, Anxiety and Stress. Additionally, higher Internet Addiction negatively associates with Self-Esteem.

CONCLUSION: Addressing Internet Addiction is important for public health, mainly among vulnerable groups like medical students, emphasizing the aspect of Self-Esteem in mental health. Interventions targeting Internet Addiction may reduce Depression, Anxiety and Stress, promoting psychological well-being.

Keywords: Internet Addiction, Medical Students, Psychopathology, Depression & Anxiety, Stress, Self-Esteem.

© 2024 Ms. Shilpa, This is an open access article under the CC BY license (<https://creativecommons.org/licenses/by/4.0/>), which permits unrestricted use, distribution, and reproduction in any medium, provided you give appropriate credit to the original author(s) and the source, provide a link to the Creative Commons license, and indicate if changes were made

1. INTRODUCTION

Within a vast universe with millions of computers, webpages, servers and websites, there's something connecting them all—it's called the Internet (Tracy LaQuey et. al. 1994). The world has come so close due to internet as it is helping millions of people connect with each other. It provides access to information, news, financial transactions, academic materials, entertainment and interpersonal interactions (Gnanasambandam, C, et. al. 2012). However, the pervasive use of the internet has turned it into a major concern. Excessive internet use can be seen in any age group especially in young adults, particularly medical students.

Medical students journey frequently begin with plenty of new experiences such as making new friends, connecting with faculty and completing tasks before the deadline, which keep students engaged during their training path. The nature of medical education, which has long hours, high-stakes exams and intense pressure, takes a toll on psychological well-being of medical students. The life of a medical student is characterized by rigorous academic demands, clinical rotations and the constant pursuit of excellence (Molly Cooke et. al. 2010). The immense pressure to succeed and the competitive environment may result in internet addiction contribute to making medical students particularly vulnerable to psychological

issues. Medical students find the internet exceptionally valuable due to its affordability and quick access to information from different sources (Arbabisarjou A, et. al. 2016) (Jamileh Mahdizadeh et. al. 2018). However, the internet can be a distraction with social media, online games, watching explicit stuff and other non-educational content (Gnanasambandam, C, et. al. 2012). Excessive online use may also lead to depression, anxiety, stress and low self-esteem (Ahmet Akin et. al. 2011). These psychological challenges are usual in medical students because of the rigorous nature of their academic programs. Student's psychopathological symptoms are becoming an important concern impacting their academic performance. Previous available studies suggests that medical students those are internet addict tend to experience higher levels of anxiety, lower self-esteem and increased depression in contrast to those without IA (Bengü Yücens et. al. 2018). It also indicates a high rate internet addiction (IA) among medical students, showing notable correlations with anxiety, depression, stress and diminished self-esteem (Farah Younes et al. 2016). The research conducted among medical students revealed a significant correlation between psychopathology and internet addiction underscoring the significance of preventive measures and interventions considering the effects it has on mental well-being (Sachin Gedam et. al. 2016). A research among college students revealed a robust positive correlation between the seriousness of internet addiction (IA) and psychopathology and its negative correlation with self-esteem. This suggests that if IA severity and psychopathology scores rose then self-esteem scores declined across all IA groups (Ersin Budak et. al. 2015).

2. MATERIALS AND METHODS

Medical students are vulnerable to internet addiction thus it is crucial to determine their frequency of internet usage. Therefore, the purpose is to recognise internet addiction and assess the relation between internet addiction, psychopathological symptoms and self-esteem in medical students. For this 150 medical students aged 18-25 years from Santosh Medical College and Hospital in Ghaziabad, Uttar Pradesh were selected. The study included participants from a medical background who provided informed consent. Data were taken by using 3 standardized measures, including Internet Addiction Test (IAT) by Kimberly Young, Depression Anxiety Stress Scale (DASS-42) by Lovibond and Lovibond. And Rosenberg Self-Esteem Scale (RSES). Descriptive statistics, such as mean, standard deviations and Karl Pearson's correlation coefficient were calculated to analyse the relationships between Internet addiction, psychopathological symptoms and self-esteem levels among medical students.

Statistical Analysis

The study used SPSS to analyse data. Descriptive statistics such as mean, standard deviation and Pearson's correlation coefficient are used to examine the relationships between Internet addiction, psychopathological symptoms and self-esteem among medical students.

3. RESULTS AND DISCUSSION

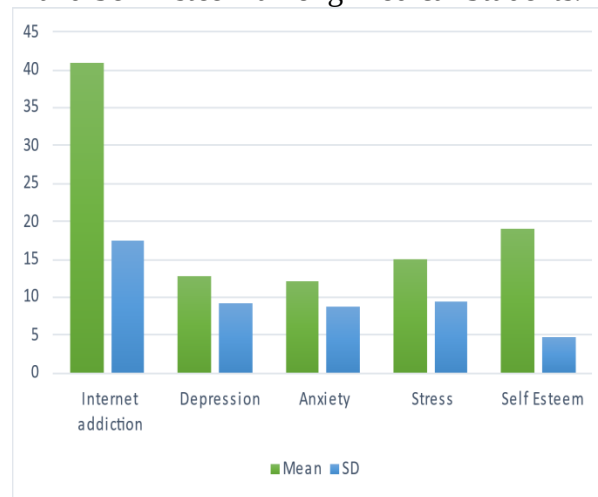
The key findings show correlations between internet addiction, psychopathological symptoms and self-esteem among medical students. To determine the correlation the statistical analyses used were Mean, SD and Pearson Correlation.

Table 1 Mean and Standard Deviation of Internet Addiction, Depression, Anxiety, Stress, and Self-Esteem among Medical Students.

Variables	N	Mean	SD
Internet Addiction	150	40.8	±17.404

Depression	150	12.82	± 9.175
Anxiety	150	12.03	± 8.848
Stress	150	14.93	± 9.327
Self-Esteem	150	18.96	± 4.834

Figure 1 Mean and Standard Deviation of Internet Addiction, Depression, Anxiety, Stress, and Self-Esteem among Medical Students.



As depicted in Table 1 and figure 1, the findings suggests moderate level of internet addiction among medical students. Depression, anxiety and stress are found to be in moderate range. Notably, the self-esteem of medical students falls under high range.

Table 2: Correlation between Internet Addiction, Depression, Anxiety, Stress and Self-Esteem in Medical Students.

Pearson Correlation Variables	Internet Addiction	Depression	Anxiety	Stress	Self – Esteem
InternetAddiction	1	.542	.453**	.539**	-.238**
Depression	.542	1	.876**	.848**	-.317**
Anxiety	.453**	.876**	1	.799**	-.271**
Stress	.539**	.848**	.799**	1	-.321**
Self-Esteem	.238**	-.317**	.271**	.321**	1

****Significant At 0.01 Level.**

In table 2 the findings unveiled noteworthy positive correlations in internet addiction and depression in medical students. These findings are supported by studies, who found that high internet addiction were correlated with elevated depression symptoms in medical students (Ahmed K. Ibrahim et. al. 2022). The results also indicated a notable positive correlation in internet addiction and anxiety among medical students. This aligns with a study in a sample of medical undergraduates, it was discovered that higher internet addiction scores were linked to increased anxiety symptoms(Mounika Mandla et. al. 2023).A positive correlation was seen between internet addiction and stress among medical students. Greater levels of internet addiction were found with increased mental health issues particularly elevated stress. The

study underscores the detrimental effect of problematic internet usage on stress and well-being (Nitin Anand et. al. 2018). There was a notable negative correlation between internet addiction and self-esteem, indicating elevated levels of internet addiction are correlated with lower self-esteem. Similar negative correlation among university students were seen. Potential mechanisms include individuals with low self-esteem excessively utilizing the internet for validation or escape perpetuating addiction and diminished self-worth (Bahrainian et. al. 2014).

4. CONCLUSION

The objective of this research was to evaluate internet addiction & its correlation with psychopathological symptoms and self-esteem among medical students. To fulfil this assessment used were Internet Addiction Test (IAT) and Depression Anxiety Stress Scale (DASS-42) and Rosenberg Self-Esteem Scale. The overall studies shows that medical students addicted to the internet tend to experience elevated levels of depression, anxiety, and stress. Additionally, it was seen that participants with higher levels of internet addiction tend to exhibit lower self-esteem. Thus comprehensive interventions targeting internet addiction, mental health issues and self-esteem challenges are crucial for supporting medical students' well-being. Medical institutions should prioritize accessible mental health services, psycho education and policies promoting balanced technology use. Addressing Internet addiction and its psychological impacts is vital for individual students and the future of the medical profession.

5. REFERENCES

1. Akin, A., & Iskender, M. (2011). Internet addiction and depression, anxiety and stress. *International online journal of educational sciences*, 3(1), 138-148.
2. Anand, N., Thomas, C., Jain, P. A., Bhat, A., Thomas, C., Prathyusha, P. V., & Cherian, A.V. (2018). Internet use behaviors, internet addiction and psychological distress among medical college students: A multi-centre study from South India. *Asian journal of psychiatry*, 37, 71-77.
3. Arbabisarjou, A., Gorgich, E. A. C., Barfroshan, S., & Ghoreishinia, G. (2016). The association of internet addiction with academic achievement, emotional intelligence and strategies to prevention of them from student's perspectives. *INTERNATIONAL JOURNAL*, 3(1).
4. Bahrainian, S. A., Alizadeh, K. H., Raeisoon, M. R., Gorji, O. H., & Khazaei, A. (2014). Relationship of Internet addiction with self-esteem and depression in university students. *Journal of preventive medicine and hygiene*, 55(3), 86
5. Budak, E., Taymur, I., Askin, R., GUNGOR, B., Demirci, H., AKGUL, A., & Sahin, Z. A. (2015). Relationship between internet addiction, psychopathology and self-esteem among university students. *The European Research Journal*, 1(3), 128-135.
6. Cooke, M., Irby, D. M., & O'Brien, B. C. (2010). *Educating physicians: a call for reform of medical school and residency* (Vol. 16). John Wiley & Sons.
7. Gedam, S., Mishra, A., & Shivkumar, V. (2016). Internet addiction and its association with psychopathology in Indian medical students: A cross-sectional study. *Industrial Psychiatry Journal*, 25(2), 158-162.
8. Gnanasambandam, C., Madgavkar, A., Kaka, N., Manyika, J., Chui, M., Bughin, J., & Gomes, M. (2012). *Online and upcoming: The Internet's impact on India*. Bangalore: McKinsey & Company.

9. Ibrahim, A. K., Fouad, I., Kelly, S. J., El Fawal, B., & Ahmed, G. K. (2022). Prevalence and determinants of internet addiction among medical students and its association with depression. *Journal of Affective Disorders*, 314, 94-102.
10. LaQuey, T., & Ryer, J. (1994). *The internet companion* (pp. 32-34). Addison-Wesley.
11. Mahdizadeh, J., Valinejadi, A., Pooyesh, B., Jafari, F., & Kahouei, M. (2018). Students' attitudes towards impact of the health department website on their health literacy in Semnan University of medical sciences. *Electronic Physician*, 10(1), 6164.
12. Mandla, M., Garugu, B., Vunnam, S., & Gottumukkula, V. (2023, January 15). Internet addiction and its association with anxiety in medical undergraduates: A cross-sectional study.
13. Younes, F., Halawi, G., Jabbour, H., El Osta, N., Karam, L., Hajj, A., & Rabbaa Khabbaz, L. (2016). Internet addiction and relationships with insomnia, anxiety, depression, stress and self-esteem in university students: a cross-sectional designed study. *PloS one*, 11(9), e0161126.
14. Yücens, B., & Üzer, A. (2018). The relationship between internet addiction, social anxiety, impulsivity, self-esteem, and depression in a sample of Turkish undergraduate medical students. *Psychiatry research*, 267, 313-318.