A Correlational Study Between the On-Screen Time and Social Anxiety of College Students

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Abstract: The time spent on-screen has become a global concern in the past decade especially Post COVID 19 pandemic. The exposure of young adults to screens, technological gadgets and internet has particularly become a major concern to the educational and psychological fraternity. This over use of technological gadgets like mobiles and laptops is breaking the connection of youth with reality and thereby poses a grave threat to their mental well - being and relationships. The present study aims to explore the relationship between the on-screen time and social anxiety among college students. A sample of 110 students aged 18-25 from accredited higher education institutions were taken using convenience sampling. The Social Avoidance and Distress Scale, a 28-item questionnaire was used to measure the level of social anxiety of the sample. The results indicated a significant difference in social anxiety of males and females, with females experiencing a much higher levels of social anxiety. However, ETA correlation indicated no relationship between on-screen time and social anxiety of the college students. Percentage analysis revealed that over half of the sample (54.55%) had an On-Screen timing of 10 hours or more. Males had longer on-screen time duration whereas females exhibited higher social anxiety.

*Keywords***:** Social anxiety, On-screen time, college students, Mental Well- being

I.INTRODUCTION

Mental health professionals have been trying to explore and unfold the understanding of how screens influence us. With accurate information and strategies, we can teach and train young minds to not only understand the consequences of increased screen-time but also acquire the ability to regulate it to their benefit and not their loss. Educating young people about excessive screen time and effective regulation is crucial. Screens, once supporters, now potentially harm us, shaping perceptions and beliefs. Understanding and mitigating these effects are important. Studies show excessive screen time links to negative mental health outcomes. However, the impact depends on usage. The COVID-19 pandemic significantly increased screen usage as people relied on technology for work, education, and socializing. Unfortunately, excessive screen use has led to dependence, negatively affecting social interactions. Individuals often prioritize screens over face-to-face communication, even during social gatherings, which raises concerns about diminished interpersonal connections.

Spending time on screens, especially social media, can cause depression and anxiety issues. Comparing one's daily life to the highlights of others on social media can lead to feelings of inferiority and have a negative impact on mental health. Screens can be as addictive as drugs or alcohol, leading to isolation, depression, and extreme anxiety, as per the Hazelden Betty Ford Foundation. Smart-phones are widely used by most people, especially young adults, for a significant portion of the day. Studies indicate that university students spend around five hours daily on their phones (Ata & Elik, 2019). Anxiety symptoms affect a significant proportion of the population, and it is believed to be one of the most common mental disorders.

Researches, conducted in the past have found that increased screen time, specifically on social media, streaming video, video games, and regular phone use, correlated positively with social anxiety levels. Reducing screen time may improve overall well-being and alleviate anxiety and poor sleep patterns. (Turner, 2023) Further, surveys also indicate that undergraduate students during the COVID-19 pandemic had a positive correlation between altered screen time and anxiety and depression symptoms. Therefore, it's clearly evident that efficient intervention strategies are needed to address the mental health challenges faced by college students. (Gupta et al., 2022). Researchers have also revealed that increased screen time during the pandemic led to higher anxiety levels. Poorer sleep quality, resulting from excessive screen usage, further contributed to anxiety. Maintaining a healthy sleep schedule and reducing screen time can help mitigate anxiety.

D'Souza and Rodriguez (2022) discovered a positive relationship between screen time, sleep quality, and anxiety in high school students, particularly when exposed to video games. The interplay among screen time, anxiety, and sleep quality emphasizes the importance of understanding these factors in teenagers. However, down the line across few years of exploration done in this area, it has also been observed that where screen time has a substantial impact on the well-being of young adults yet it doesn't always show signs of depression or related symptoms (Tang et al. ,2021) yet most past researches have given us an understanding that excessive use of screens has a far reaching detrimental impact on the physical, psychological and social functioning of an individual. (Gao et al., 2021) It has also been found that excessive screen usage results in a risk for depression or anxiety disorder as well the general social skills of children. (Kim et al., 2020) Mougharbel and Goldfield (2020) found that increased screen usage among children and adolescents was associated with worsening depressive symptoms, low psychological well-being, body dissatisfaction (especially among women), and gender-specific relationships with anxiety. Neophytou et al. (2019) conducted a scoping

examination that identified negative correlations between excessive screen time and proper brain development, as well as adverse effects on emotional, physical, and behavioral well-being in adolescents and young adults. Research has revealed that there is a direct relationship between social anxiety, social skills, problematic smart-phone use, somatic symptoms, and academic achievement even in primary school students. In a study conducted by Przepiorka et al. (2021) they found gender differences in screen time usage and its influence on social skills and academic performance.

II. NEED OF THE STUDY

Neophytou et al. (2019) conducted a scoping examination that identified negative correlations between excessive screen time and proper brain development, as well as adverse effects on emotional, physical, and behavioral well-being in adolescents and young adults.

Social media has taken over at such a huge scale that from what trends are considered popular to how perceptions are formed everything is somewhere guided by media influence on our minds. Where on one hand, technology has helped us in enhancing our systems of connectivity to those sitting miles away from us it also has pushed us away from those who are sitting right next to us. Spending too much time on their phones and other screens intentionally weakens their current bonds and friendships, leaving them anxious, depressed, and deprived of social interactions. It's imperative that situation must be given proper attention before it's too late to reverse its consequences on the one of the most important segment of our population, our youth!

III. RESEARCH METHODOLOGY

3.1 Objectives

To explore the correlation between the on-screen time and social anxiety in college students
To compare the On-screen time of males and females (including, mobile phones and computers)
To compare the level of social anxiety between males and females

3.2 Hypotheses

H1: There will be a positive correlation between the on-screen time and social anxiety of college students.
H2: There will be a significant difference in the level of social anxiety in males and females.
H3: There will be no significant difference in the time spent on-screen among males and females.

3.3 Population and Sample

Sample Size: 110 college students between the age group of 18-25 years
Sampling Technique: Simple Random Sampling
Inclusion Criteria:

- Students currently enrolled in accredited higher educational institutions.
- Age range: 18-25 years.
- Only those students were asked to respond who were currently using a smart-phone or a laptop.
- Those who could read and understand basic English language.
- Only those students were included who identified them as one these two genders, male or female.

3.4 Data and Sources of Data

Each participant was told that their identities and responses will be confidential and the data would be used strictly for research purposes only. Data was collected and analyzed using co-relational research design. A study investigated the relationship between on-screen time and social anxiety in college students. The researchers used the Social Avoidance and Distress Scale (SADS), which consists of 28 statements with TRUE or FALSE responses, to assess social anxiety levels. Data was collected through printed scales and a Google form. The study involved 110 college students aged 18-25, who received instructions and assistance throughout the process. Participants' feedback was collected, and their participation was appreciated.

3.5 Theoretical framework

The study includes dependent and independent variables and seeks to explore the correlation between excessive On-Screen time and Social Anxiety among a population sample of 110 college students. The study also seeks to examine the gender differences in media consumption and the repercussions of excessive screen usage.

3.6 Measure

Social Avoidance and Distress Scale (SADS)

The Social Avoidance and Distress Scale (SADS) consists of 28 TRUE or FALSE statements that assess social anxiety, including distress, discomfort, fear, and avoidance. Participants are instructed to choose the option that reflects their initial instinctual response, even if it's difficult, and to avoid spending excessive time on each item. They can select the option that slightly best applies to their feelings if needed.

IV. RESULTS AND DISCUSSION

The results were analyzed using t-tests, ANOVA, and correlation analysis.

TABLE IV.1To demonstrate the difference between the level of social anxiety in males and females.

Variable	Gender	N	Mean	Standard Deviation	t
Social Anxiety	Male	46	13.87	5.273	2.468**
	Female	64	16.30	4.820	

Significant difference at 0.01 level of significance

Table IV.1 compared the level of social anxiety between males and females. The mean level of social anxiety was 13.87 (SD = 5.273) for males and 16.30 (SD = 4.820) for females. A significant difference was found, with females experiencing higher social anxiety than males (t = 2.468, p < 0.01**). This finding is consistent with previous research, suggesting gender norms and cultural expectations may contribute to this difference.

TABLE IV.2 Demonstrates the Correlation between the on-screen time and the level of social anxiety in college students.

Social Avoidance and distress Scale score dependent	0.220

There is no relationship between the on-screen time and level of social anxiety in college students.

Table IV.2. Used ETA correlation to explore the correlation between on-screen time and social anxiety. The correlation coefficient was 0.220, indicating no significant relationship between the two variables. This finding can be due to several factors such as, the higher-level adaptability that the young population demonstrates which allows them to be good communicators both on and off screen as well as increased exposure and development opportunities provided by educational institutions to the upcoming students. However, it should be noted that a much larger sample and more robust statistical measures are required to explore these variables in much greater detail.

This study also used percentage – analysis to throw more light on the relationship between on-screen time and social anxiety in college students.
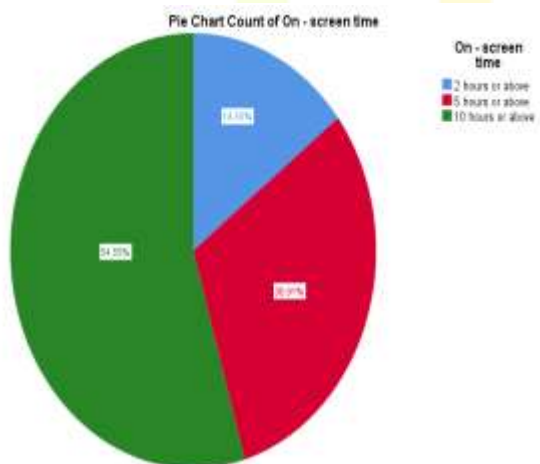

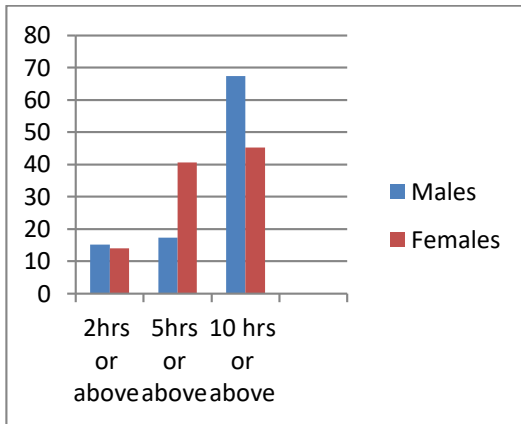**Fig 1. Count of On Screen time of the total sample**

Fig 2. Percentage Comparison of time spent on screen between females and males

Figure 1 and 2 depicted the time spent on screens by college students. More than half of the sample population (54.55%) spent 10hours or more on screens every day, potentially impacting their well-being. Males tended to have higher screen time than females.
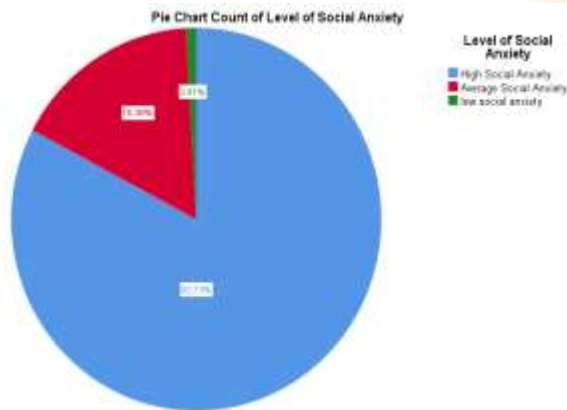

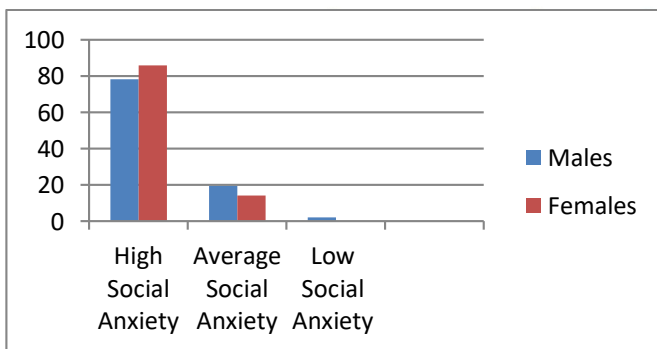**Figure3. Level of Social Anxiety of the total sample**

Figure 4. Percentage Comparison of level of Social Anxiety between males and females.

Figure 3 and 4 illustrated the level of social anxiety in college students as a whole. Over 82.73% of college students experienced high levels of social anxiety, with females exhibiting higher levels than males (85.94%). This may be attributed to gender norms and societal restrictions faced by females.

The purpose of this study was to explore the correlation between the on-screen time and the level of social anxiety experienced by college students. Increased screen time is a major issue especially post the pandemic when students were forced to adapt themselves to using screens both for connecting to loved ones as well as for fulfilling their educational requirements. This spike in the time spent on screens both for leisure as well as work has made life easier but also proved to be detrimental to both physical as well as mental well-being of individuals. Obesity, blood pressure, increased risk of heart disease as well as stress, burn –out and isolation, many such problems one faces due to the excessive use of screens.

Looking at the results of this study it can be said that where on one hand excessive on-screen time does affect the overall well-being of an individual yet there is no significant relationship between time spent on screen and the level of social anxiety experienced by an individual. It can therefore be concluded that excessive use of screens is a contributor to the level of social anxiety experienced by college students but not the main reason behind it. It must also be noted that the results are applicable to only college students and cannot be generalized to other age groups who might have a positive correlation between the two variables as reflected by previous researches. Therefore, this study helped to explore these variables in a sample population which was not studied much, before.

Previous research indicates that females are often seen experiencing higher social anxiety when compared to males due to various socio-cultural factors such as, gender norms and societal expectations to be a certain way, with the increase in screen-time females are seen experiencing even higher anxiety as social media imposes even more pressure on them, specially to meet the prevalent beauty standards.

More than half of those aged 18-25 spend over 10 hours on screens every day, leading to detrimental effects like eye strain, diminished creativity, cognitive haze, low self-esteem, and heightened risks of obesity and hypertension. This worrisome screen time warrants urgent intervention. Despite higher social anxiety in females, males surpass them in screen usage, often due to work and stress relief through web series. Excessive screen time's harmful consequences underscore the need to master its control for a balanced, fulfilling life.

Reducing screen time among young college students poses challenges due to the growing reliance on technology in higher education. However, effective strategies exist to establish a healthier equilibrium between academics and personal life. Firstly, prioritizing and structuring daily routines aids in managing time. Developing a timetable that designates time intervals for studying, leisure, and responsibilities helps students sidestep excessive screen exposure while enhancing time management. Secondly, embracing analog alternatives like physical textbooks and handwritten notes minimizes digital device dependency. Opting for printed materials, jotting notes by hand, and utilizing paper planners, curbs screen engagement. Moreover, regulating social media interaction and refraining from phone browsing during breaks curtails unnecessary screen interaction. Thirdly, involvement in screen-free physical endeavors and hobbies diversifies activities. Engaging in sports teams, fitness classes, or creative pursuits such as painting fosters a balanced lifestyle. Lastly, inserting breaks from electronic gadgets throughout the day, like strolls, mindfulness exercises, or simply stepping outside, lessens screen reliance while nurturing mental well-being. In essence, curbing screen time for college students necessitates deliberate actions and mindful choices. By arranging priorities, constraining exposure, embracing alternatives, and incorporating breaks, students curtail screen hours and enhance their holistic health and wellness.

IMPLICATIONS:

- This study can be used as a reference for other researches in the field.
- The study points towards the over use of gadgets by the young adult and can serve as a base line for policy makers for developing policies which can help decrease on line work and promote more off line tasks.
- The study can be used to further explore the other factors that are contributing to the higher level of social anxiety experienced by females as compared to males. Intervention may be planned accordingly.
- It can be used to create awareness about the detrimental impact of increased use of screens on the overall well-being of college students.
- The study points towards the need to explore innovative ways to limit On-Screen-time both for leisure as well as for work.
- This research indicates the gender differences in use of technology and high lights the need for more gender-based studies in the area of technology and well-being.

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