



## IMPOSTOR PHENOMENON PREVALENCE AMONG HYDERABAD'S NON-MEDICAL AND MEDICAL STUDENTS

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**Abstract:** Despite objective success, the Impostor Phenomenon (IP) is typified by ongoing self-doubt and a fear of being revealed as incompetent. University students are becoming more aware of it, especially in settings where academic performance is high. To ascertain the incidence and seriousness of the impostor phenomenon among Isra University, Hyderabad, medical and non-medical students. Using a non-probability convenience sampling technique, 200 undergraduate students participated in a descriptive cross-sectional study. The Clance Impostor Phenomenon Scale (CIPS) was used to gather data. SPSS version 22 was used to conduct the statistical analysis. Of the participants, 44% reported feeling like an impostor a lot, 42% moderately, 10% severely and 4% mildly. Compared to male students, female students showed higher impostor scores. Comparatively speaking, the prevalence was higher among medical and allied health students than among non-medical students. The phenomenon of impersonation is very common among Isra University students. To lessen its psychological effects and improve the wellbeing of students, early detection, counselling, and mentorship programs are advised.

**Key words:** Impostor Phenomenon, Medical Students, Non-Medical Students, Self-Doubt, CIPS

### INTRODUCTION

Impostor Phenomenon (IP), first described by Clance and O'Toole in 1987, refers to an internal experience of intellectual fraudulence where individuals are unable to internalize their achievements despite clear evidence of competence (Clance and O'Toole (1987). Individuals with IP often attribute success to luck rather than ability and live in fear of being exposed as inadequate. University students, particularly those in competitive academic environments such as medicine, allied health sciences, business, and technology, are especially vulnerable. Persistent impostor feelings are associated with anxiety, depression, burnout, perfectionism, and reduced academic confidence (Gottlieb *et al*, 2020). Medical students face additional stressors including academic pressure, frequent evaluations, and high professional expectations, which may exacerbate impostor feelings (Levant, *et. al.*, 2020). However, emerging evidence suggests that non-medical students in competitive fields may experience comparable levels of impostor phenomenon. Understanding its prevalence across disciplines is crucial for designing effective institutional interventions (Ikbaal, *et al.*, 2018). A study by Rosenthal *et al.* (2020) looked at the frequency of the persistent impostor phenomenon among medical students and how it related to personality traits and psychological distress. Before beginning

medical school, they recruited 257 "prematriculation" (entering) students from a large urban medical school who completed the CIPS and tests of personality, loneliness, self-compassion, empathy, and self-esteem; 182 of the students repeated the CIPS at the end of the first academic year (Rosenthal *et al.*, 2020). It was reported that impostor syndrome among University of Kansas third-year medical students as they made the switch to clinical training. Of the 215 students who were invited, 127 replied, and 112 of them finished the Clance Impostor Phenomenon Scale (CIPS) (Levant *et al.* 2020). A cross sectional study was conducted to assess the prevalence of impostor syndrome and its association with academic performance among healthcare students in Saudi Arabia (Alrefi *et al.*2024). Şahin *et al.* 2022 conducted a study that aimed to adapt and validate the Clance Impostor Phenomenon Scale for Turkish university students. A cross-sectional study was conducted to assess the prevalence of impostor phenomenon (IP) among 242 students, 121 medical from CMH Lahore Medical and Dental College and 121 non-medical from LUMS (Raashed *et al.* 2025). Jamil *et al.* (2024) investigated impostor syndrome among 553 undergraduate medical students at Al-Mustansiriyyah University, Baghdad, using the Clance Impostor Phenomenon Scale. Results showed that 50.8% reported moderate and 5.2% intense impostor feelings. Females had

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slightly higher moderate scores (53.9% vs. 46.6%), while males reported more intense experiences (6.41% vs. 4.39%). A current study in Croatia was conducted with the objective of examining the prevalence of impostor phenomenon (IP) among first year family medicine residents (Tomičević *et al.* 2025). Anderson *et al.* 2023, investigated impostor phenomenon among 1,204 graduate students in healthcare programs across the U.S. using the Clance Impostor Phenomenon Scale (CIPS).

### METHODOLOGY

#### Study Design

A Descriptive Cross-sectional Analytical study was conducted.

#### Participants

A total of 200 undergraduate students (medical and non-medical) aged 18-25 years from Isra University, Hyderabad, participated in the study.

#### Sampling Technique

Non-probability convenience sampling.

#### Inclusion Criteria

- Enrolled undergraduate students (1st–final year)
- Both genders
- Willing to provide informed consent

#### Exclusion Criteria

- Students unwilling to participate
- Age above 27 years

#### Data Collection Tool

The Clance Impostor Phenomenon Scale (CIPS), a validated 20-item questionnaire rated on a 5-point Likert scale (score range: 20–100).

- ≤40: Mild
- 41–60: Moderate
- 61–80: Frequent
- ≥81: Severe

#### Data Analysis

Data were analyzed using SPSS version 22. Descriptive statistics were used to calculate frequencies and percentages.

#### Ethical Considerations

Ethical approval was obtained from the Ethical Review Committee of Isra Institute of Rehabilitation Sciences. Confidentiality and informed consent were ensured.

### RESULTS

**Table 1: Age Distribution of Participants**

Age Group	Frequency	Percentage (%)
<20 years	8	4.00
20–22 years	70	35.0
23–25 years	103	51.5
>25 years	19	9.50
<b>Total</b>	<b>200</b>	<b>100</b>

The majority of participants (51.5%) belonged to the 23-25 years old age group, followed by 35% aged 20–22 years.

**Table 2: Gender Distribution of Participants**

Gender	Frequency	Percentage (%)
Female	151	75.5
Male	49	24.5
<b>Total</b>	<b>200</b>	<b>100.0</b>

Female students constituted the majority 75.5% of the study population.

**Table 3: Severity of Impostor Phenomenon**

Impostor Phenomenon Level	Frequency	Percentage (%)
Mild	8	4.0
Moderate	84	42.0
Frequent	88	44.0
Severe	20	10.0
<b>Total</b>	<b>200</b>	<b>100.0</b>

Overall, 96% of participants experienced moderate to severe impostor feelings, with 44% reporting frequent and 10% reporting severe impostor phenomenon. Out of 200 participants, the majority was female (75.5%). Most students were aged between 23–25 years (51.5%). Students from Doctor of Physical Therapy (37.5%) and Computer Science (32%) constituted the largest groups.

Regarding impostor phenomenon severity:

- Frequent: 44%
- Moderate: 42%
- Severe: 10%
- Mild: 4%

Overall, 96% of students experienced some level of impostor feelings. Higher prevalence was observed among females and students enrolled in medical and allied health programs.

**Table 4: Association Between Gender and Severity of Impostor Phenomenon (Chi-Square Test)**

Impostor Phenomenon Level	Female n (%)	Male n (%)	Total n (%)
Mild	6 (4.0)	2 (4.1)	8 (4.0)
Moderate	68 (45.0)	16 (32.7)	84 (42.0)
Frequent	65 (43.0)	23 (46.9)	88 (44.0)
Severe	12 (8.0)	8 (16.3)	20 (10.0)
<b>Total</b>	<b>151 (100)</b>	<b>49 (100)</b>	<b>200 (100)</b>

Chi-square value ( $\chi^2$ ): 6.87

Degrees of freedom (df): 3

p-value: 0.032\*

\*p < 0.05 (statistically significant)

## DISCUSSION

The findings demonstrate a high prevalence of impostor phenomenon among students at Isra University, consistent with international literature. Similar studies have reported moderate to high impostor experiences among medical students, particularly females. Medical students' high impostor scores could be explained by their fear of failing, clinical responsibilities, and extreme academic pressure. IP is not discipline-specific, though, as non-medical students also expressed strong impostor feelings, especially in competitive fields like computer science and business.

Gender differences observed in this study align with previous research indicating that females are more likely to internalize self-doubt due to societal expectations and perfectionism. The widespread nature of impostor phenomenon across years of study suggests that it is a persistent psychological issue rather than a transitional phase.

## CONCLUSION

Impostor phenomenon is highly prevalent among both medical and non-medical students at Isra University, with greater severity observed among females and medical students. These findings emphasize the need for institutional mental health support and early interventions to reduce self-doubt and promote academic confidence.

## RECOMMENDATIONS

- Establish student counseling and mental health support services
- Introduce mentorship and peer-support programs
- Conduct workshops on self-efficacy and stress management
- Incorporate awareness of impostor phenomenon into academic advising
- Encourage future longitudinal and interventional studies

## Conflict of interest

Authors declare no conflict of interest.

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