

Anxiety and the Imposter Phenomenon Among Graduate Students in Online Versus Traditional Programs

Christy Fraenza, Ph.D.

Abstract

This study compared online and traditional students on measures of imposter phenomenon (IP), anxiety, and perfectionism. Traditional students had significantly higher IP scores. Perfectionism was the strongest predictor of IP scores. Because the scale for perfectionism explored socially prescribed perfectionism, it seems to suggest an underlying social component to IP.

Problem

Individuals who experience IP may never truly enjoy their successes and may live in a negative cycle of stress and anxiety as they attempt to maintain high standards of performance (Sonnak & Towell, 2001). As outlined by Kolligan and Sternberg (1991), **a key feature of IP is social anxiety**, especially when there are evaluations, and it is commonly known that graduate school programs consist of multiple evaluative experiences. However, little research has focused on graduate student experiences with IP. Research **on online students** has indicated that students in this setting experience **less anxiety** (DeVaney, 2010; Ioakimidis, 2007) and feel freer to be themselves (Sullivan, 2002). Because anxiety was identified as a key component of the experience of IP, it was important to determine if and/or how IP is experienced differently in an online environment, where social cues and direct contact are limited.

Purpose

The purpose of this quantitative study was to determine if there were any significant differences between IP and anxiety scores between the students in online and traditional program types.

Dr. Carolyn King, Committee Chairperson
Dr. Michael Durnam, Committee Member
Dr. James Carroll, University Reviewer

Relevant Literature

Research on IP has found a **positive, significant relationship with anxiety** (Bernard, Dollinger, & Ramaniah, 2002; Chae, Piedmont, Estadt, & Wicks, 1995; Ross, Stewart, Mugge, & Fultz, 2001). Previous studies on graduate students have indicated that **online students experience lower levels of anxiety** (DeVaney, 2010).

Researchers have theorized that the loss of social cues and pressures in **electronic communications may reduce anxiety** associated with asking for help (Kitsantas & Chow, 2007) and may create a more comfortable, open environment where all members are equal (Sullivan, 2002). Many cues about the context of an interaction are not present in electronic communication, such as body language, nonverbal cues, physical appearance, and emotional reactions (Parks & Floyd, 1996). Without this information, **communication online should result in less social influence and conformity** in comparison to face-to-face communications (Parks & Floyd, 1996). Because face-to-face communications are absent, or limited, in online graduate programs, it was theorized that online graduate students would experience less anxiety and less intense IP when compared to traditional graduate students.

Research Questions

RQ 1: Is there a significant difference in IP scores, as measured by the Clance Imposter Phenomenon Scale (CIPS), between online graduate students and traditional graduate students?

RQ 2: What is the nature of the relationship between IP, as measured by CIPS, and anxiety scores, as measured by the Zung Self-Rating Anxiety Scale (SAS)?

RQ 3: Is there a difference in anxiety scores, as measured by the SAS, between online graduate students and traditional graduate students?

Procedures

Design

- **Between-subjects** design that compared two independent samples (Gravetter & Wallnau, 2004).

Sample

- A sample of **115 online** graduate students was compared to a sample of **105 traditional** graduate students.
- Online student participants were obtained via the participant pool and traditional student participants were obtained through an e-mail invite at a large state university.

Instrumentation

- Clance Imposter Phenomenon Scale (CIPS)
- Zung Self-Rating Anxiety Scale (SAS)
- Perfectionistic Self-Presentation Scale (PSPS)
- Demographic Questionnaire

Data Analysis

Descriptive statistics for all demographic variables

Independent t-tests to determine if differences existed between the two groups on measures of IP and anxiety.

Pearson correlation to determine the nature of the relationship between IP scores and anxiety scores

Multiple regression analysis to determine which set of variables best predicted IP scores

Findings

RQ 1: Traditional graduate students had significantly higher IP scores than online graduate students

RQ 2: Results revealed a significant, positive relationship between IP scores and anxiety scores

RQ 3: Traditional graduate students had higher anxiety scores than online graduate students, but this difference was not significant

All three predictor variables (perfectionism scores, anxiety scores, program type) were all significant predictors of IP scores. **Perfectionism was the most influential predictor.**

Limitations

No cause-and-effect relationship can be determined.

Results are not generalizable to the entire graduate student population, as the sample was predominantly White.

Participants were not chosen at random, as participants were only those who volunteered to complete the surveys.

Conclusions

Graduate students, whether online or traditional, are dealing with high levels of anxiety and IP.

Perfectionism was found to be a powerful predictor of IP scores, even more so than type of program and anxiety. Because the scale used to assess perfectionism was only focused on socially prescribed perfectionism that is driven by social forces, it seems **an underlying social component could be a factor in IP.**

Social Change Implications

Given the high IP and anxiety scores found in this sample of graduate students, it's important for those working in higher education to become informed of the IP experience so that they can effectively support students through this negative experience.

This study provides new information to support future research into if the online environment could minimize or reduce anxiety and IP in graduate students.