'I Genuinely Can't Understand Why I Was Selected for the Job': Descriptions of the Impostor Phenomenon in University Staff and Professors

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Abstract

The Impostor Phenomenon (IP) is a person's experience of internalized fraudulence relative to their successes; this is characterized by a fear of being "found out" and judged by others as well as difficulties internalizing successes (Clance & Imes, 1978). Previous research has suggested that it is commonly experienced by professors and staff in postsecondary institutions and associated with a variety of negative outcomes related to career and mental health. As part of an online survey about IP, academic staff and professors were provided an open text box and asked to describe the causes, consequences, and experiences of impostor feelings in academic settings. Three overarching categories and eight subcategories were identified through inductive content analysis, including 1) triggers of impostor feelings (i.e., interpersonal interactions, situational influences), 2) qualities of the experience itself (i.e., negative external perceptions, negative self-perceptions, feelings of fraudulence, negative emotions) and 3) management of impostor feelings (i.e., effective strategies, ineffective strategies). Implications for addressing impostor feelings in academic staff and professors are considered.

Keywords
Impostor Phenomenon; academic staff; professors; mental health

Introduction

The Impostor Phenomenon (IP) is a person's feelings of internalized fraudulence relative to their successes, accompanied by a concern about being "found out" and judged by others (Clance & Imes, 1978). Manifestations of impostor feelings may include misattribution of successes, difficulty accepting positive feedback, self-criticism, high anxiety, feelings of depression, and avoidance of work-related challenges (Clance & Imes, 1978; Clance & O'Toole, 1987; Kolligian & Sternberg, 1991). Postsecondary institutions are notoriously hypercompetitive, isolating, and hierarchical (Gill, 2020; Zorn, 2005); therefore, it is perhaps unsurprising that impostor feelings are persistent and prevalent among graduate and undergraduate students (Ménard & Chittle, in press). However, little is known about the experience of IP among academic staff and professors, who are often called on to mentor and assist students suffering from impostor feelings. The purpose of this study was to better understand the experience of Impostor Phenomenon based on written descriptions provided by university staff and professors.

Literature Review

Quantitative Findings about IP in University Staff and Professors

Most investigations with academic staff and professors have found moderate-to-severe levels of impostor feelings in the majority of participants sampled (Boyle et al., 2022; Chakraverty, 2022; Owens et al., 2021; Sims & Cassidy, 2019; Vaughn et al., 2019; Wester et al., 2020), although studies involving academic librarians have typically found lower levels of impostor feelings in that group for reasons that are not yet clear (Barr-Walker et al., 2019; Clark et al., 2014). Research focused on demographic differences has sometimes identified greater impostor feelings in male professors (Topping & Kimmel, 1985) or female professors (Sims & Cassidy, 2019), but other studies have found no gender differences (Barr-Walker et al., 2019; Clark et al., 2014; Crawford et al., 2016; Shreffler et al., 2023; Wester et al., 2020). Most studies related to IP and career stage have found that newer employees and professors report greater impostor feelings (Barr-Walker et al., 2019; Clark et al., 2014), and that these feelings decrease with years in the job and rank (Owens et al., 2021; Shreffler et al., 2023; Topping & Kimmel, 1985; Wester et al., 2020). Studies that have looked at differences in IP levels across race and ethnicity have generally found no significant differences (Barr-Walker et al., 2019; Carvajal, 2022; Wester et al., 2020).

While the results of these investigations provide insight into the prevalence of IP and which groups may be more likely to experience it, few have explored causal factors or outcomes of experiencing IP. Only one such study could be located that identified the contributors to IP in a group of 431 family medicine professors, which included inadequate mentorship and poor integration into the profession (Carvajal, 2022).

Qualitative Findings about IP in University Staff and Professors

Qualitative studies have attempted to shed light on the essential features of IP in academic settings; however, most of these investigations have focused on the experiences of graduate and undergraduate students. Recurring themes across these investigations include self-perceptions of inadequacies, issues related to racial identity, fear of failure and excessive future expectations, and

external attributions of success (Chakraverty, 2019; Craddock et al., 2011; McElwee & Yurak, 2010; Stone et al., 2018).

Few studies could be found where qualitative data was collected exclusively from academic staff and faculty, and many of these focused specifically on the challenges experienced by specific groups within academia. Chakraverty (2021) interviewed eight graduate students/postdoctoral fellows in engineering education and three professors and identified two themes: existing in a world separate from engineering and facing gendered experiences (2021). Contributors to these feelings included academic communication, the focus on qualitative methodologies typical in this area, and conflict within their professional identities. In a related study (Chakraverty, 2022), the impostor experiences of 22 Hispanic/Latino early career researchers in STEM were analyzed; themes identified in interviews included family background and first-generation status, disparity in observable traits and ethnic identity, communicating in English, "enhance diversity" (i.e., participants felt they were hired to enhance the diversity of their area), and underrepresentation and isolation.

These findings have begun to shed light on essential features of IP; however, most of this research has been focused on undergraduate and graduate students or on the challenges experienced by specific groups, especially those related to identity. To date, no qualitative studies could be located involving a sample of academic staff and/or professors.

Purpose and Research Questions

The existing literature on experiences of IP in academic staff and professors suggests that this is a significant and widespread issue, making it an important and timely issue to investigate for several reasons: 1) Experiences of IP in other populations (e.g., students) have been consistently associated with lower self-esteem and increased rates of mental health concerns such as depression and anxiety (Bravata et al., 2020), which may contribute to elevated levels of distress. 2) IP has been negatively associated with career planning and occupational self-efficacy (Neureiter & Traut-Mattausch, 2016, 2017), career satisfaction (Sharma, 2018), and productivity in the form of publications (Wester et al., 2020), and positively associated with burnout (Legassie et al., 2008; Regan et al., 2019; Villwock et al., 2016). Staff and professors who are struggling with impostor feelings may be less likely to take on academic challenges (e.g., apply for grants, submit publications, initiate new projects), thus limiting productivity on both personal and institutional levels. 3) If IP is disproportionately experienced by marginalized groups (e.g., women, ethnic minorities), as has been found in previous research with students (Ménard & Chittle, in press; Bravata et al., 2020), these groups might be more vulnerable to feeling dissatisfied or even leaving their jobs, thus decreasing representation and potentially having spillover effects on the students attending the institution. 4) Academic staff and professors are frequently called on to mentor students, many of whom may be struggling with impostor feelings; however, this may be challenging for staff and professors who are struggling with impostor feelings and who are not receiving support for this issue. Successfully addressing impostor feelings in undergraduate and graduate students may require addressing impostor feelings in staff and professors as well.

The questions that guided this investigation included the following: What causes impostor feelings? How are impostor feelings experienced? How are impostor feelings managed?

Methods

Procedure

Data was collected at a mid-size university (approximately 16,000 graduate and undergraduate students) in Canada. As part of a larger online survey about IP, participants were provided an open text box and asked to describe their experiences of IP in academic settings, including what the experience was like, what triggered the feelings, how they managed the situation, and what the impact was on them. Participants could contribute up to 20,000 characters (roughly 3,200 words). The average response was 71 words long (range 2 to 375).

This study was cleared by the Research Ethics Board of the university. An e-mail was sent to professors and staff requesting their participation and including a link to the online survey. A social media campaign, including posts on Twitter, Instagram, and Facebook, was launched simultaneously. Reminder e-mails were sent on a weekly basis. As compensation, participants were told that they could choose to enter a draw for a $20 gift card to Tim Hortons.

Participants

A total of 92 staff and professors shared answers to the question about experiences of IP; of those, 88 could be analyzed in greater depth (for example, answers such as "Does not apply to me" were excluded). Staff could include employees working in food services, housekeeping and grounds, skilled trades and technical staff, community police and parking services, and office and clerical staff. Participants were primarily female (84.5%) and heterosexual (92.3%). Few participants identified as under 30 (9.1%) or over 60 (10.4%); most were 30-39 (20.1%), 40-49 (29.9%) or 50-59 (30.5%). The most frequently-represented ethnic origins included European (64.9%), other North American (15.5%), Asian (7.4%), or Multiethnic (5.4%); smaller numbers identified as North American Aboriginal (3.4%), Caribbean (1.4%), or African (1.4%) in origin. Most respondents did not identify as a member of a visible minority ethnic group (86.4%). Respondents were divided between staff (65.5%) and professors (34.5%), and most were employed full-time (89.5%). A few held a high school diploma (5.6%) or a college or trade school certificate (14.2%); most had a bachelor's (32.7%), master's (19.8%), or doctoral degree (27.8%). Participants were asked to self-identify their current career stage; a majority described themselves as mid-career (42.3%) with sizeable groups identifying as early career (29.4%) or late career (28.2%).

Analysis

Participants' descriptions of IP were submitted to inductive content analysis (Vears & Gillam, 2022), a method of analyzing and summarizing text-based data using iterative coding. This approach to analysis is indicated when there is little research in an area and the goal is to better understand the phenomenon under investigation.

Two coders separately reviewed the data and familiarized themselves with participant responses. They then generated codes reflecting the triggers, experience, and consequences of IP (i.e., big-picture meaning units; Vears & Gillam, 2022). Similar codes were grouped together to form subcategories. Coders met to compare and refine codes and subcategories before agreeing on a coding schema. This system was then reviewed by a third party (i.e., an auditor) who was blind to

the development of the initial coding system (Morrow, 2005). Based on this review, additional refinements and changes were made to the coding schema. To enhance the rigor of this study, peer review was facilitated by the use of two coders and an auditor to ensure a data-driven analysis that accurately captured participants' meaning (Milne & Oberle, 2005). Authenticity of responses was also assured through the design of the study, whereby participants had ownership in writing and describing their experiences thus ensuring an accurate transcription of events. Multivocality was also achieved by including multiple and varied voices in the results section (Tracy, 2010).

Findings

Three categories were identified based on content analysis of written responses: triggers for the experience, qualities of the experience itself, and the outcomes of managing impostor feelings (Table 1).

Table 1

Coding Schema for Descriptions of Impostor Phenomenon in Professors and Staff

Triggers of imposter feelings
Interpersonal interactions
Situational influences
Qualities of impostor experiences
Negative external perceptions
Negative self-perceptions
Feelings of fraudulence
Negative feelings in-the-moment
Management
Effective strategies
Ineffective strategies

Triggers of Impostor Feelings

Participants described two main types of experiences that brought on impostor feelings, including interpersonal interactions and situational influences.

Interpersonal Interactions

This subcategory captured participants' descriptions of interactions they had with colleagues, typically negative ones, that were associated with the development of impostor feelings. Within responses of this type, participants consistently mentioned situations of public ridicule and interactions with colleagues, often characterized by a perceived lack of respect. One participant described an upsetting moment: *"I made a typographical error in an email I was sending to faculty, and one faculty member in particular 'replied to all' and basically made fun of me to everyone in the department."* Despite the participants' own feelings about their quality of work, these interactions continued to resonate. A professor described their feelings attending conferences: *"At almost every academic conference I have attended for the last 15+ years ... there is a certain posturing among academics in those settings that feels inherently competitive and cut*

throat." Other situations described by participants involved experiences that reinforced the institutional hierarchy amongst university employees. One staff member wrote, *"I sometimes feel excluded from important meetings, etc. because I am not an 'academic'."* Some participants recounted moments when they were told they did not possess the proper abilities for the job they currently had or for which they planned to apply, e.g., *"When I was told by a superior that I have no future here."*

Many professors and staff members also described interactions with students that triggered impostor feelings. This often included situations where participants felt that students were rude or impolite, causing them to feel disrespected and eventually manifesting as feelings of impostorism, for example:

> *I often felt like an impostor in front of the classroom teaching at first, because I would sometimes be challenged by white male students who took exception to something I said…. I felt small and frightened when this happened and it had a lasting impact on my self confidence.*

This excerpt illustrates the lasting power of these experiences and the interaction effect of gender/race/ethnicity. Participants shared interactions with students that left them feeling intimidated. *"I am still sometimes easily intimated by graduate students who give off the air that they know more than me"* is how one participant described the feeling. Whether the interaction be in class or elsewhere, certain judgments and criticisms expressed by students made even well-established professors feel like impostors.

Situational Influences

This subcategory captured triggers for impostor feelings in relation to situational influences, which consisted of specific events or activities. For many participants, this included new experiences in the form of new jobs, new challenges, or new roles presented within an existing job. One participant wrote, *"After switching to a new position in a different faculty after [many] years in the prior position I have felt vulnerable."* Feeling unprepared or "thrown" into a position were common elements within this subcategory, often combined with references to inadequate or limited training. Another participant explained: *"When I start a new position and there is no training I feel like I don't know anything."* Many participants also made references to public speaking, including presentations, meetings, and lectures; these situations were often accompanied by feelings of judgment and self-doubt associated with deeper feelings of impostorism. One participant stated, *"Any time I have had to do a presentation or speak in front of a group of people, I have felt extremely nervous, felt like I was being judged,"* suggesting that this was not an isolated or one-time occurrence but characteristic of repeated experiences. A professor described an invited talk he presented: *"The entire presentation I was watching the audience seeing if they were tuning me out and wondering 'Who is this guy, and why did we bother bringing him in?'"* Other elements encapsulated within this subcategory include self-perceptions of failure, whether personal or professional, and dissatisfaction prompted by these feelings of failure. For example, *"I was asked to attend a meeting in place of the Director. I went feeling unprepared and dissatisfied with the outcome."*

Qualities of Impostor Experiences

Participants disclosed thoughts and feelings that characterized impostor experiences as they occurred. This subcategory consisted of the following categories: negative external perceptions, negative self-perceptions, feelings of fraudulence, and negative feelings in-the-moment.

Negative External Perceptions

Participants shared their fears of judgment and criticism from others that they felt during experiences of impostorism. Participants described the external pressure they felt to perform well due to their fears of disappointing colleagues, supervisors, or family members. One person wrote, *"I often felt like I was going to be/was a disappointment to those around me."* Another participant recounted impostor feelings they had had during graduate school: *"I had tremendous anxiety over giving in a final paper that was anything less than graduate level to my professors."* Participants prioritized the preservation of their reputation and were most concerned with how others would perceive their actions or abilities, even when they initially believed that they were capable of completing a task.

Negative Self-Perceptions

Another common experience recounted by participants dealing with impostorism were feelings of self-doubt, decreased confidence, and in some cases, worthlessness. Participants described their fears of being under-qualified for their roles, especially in comparison to their colleagues. *"I felt like my experiences weren't interesting or valuable enough,"* wrote one participant. Similarly, many participants attributed group successes to the knowledge and work of their colleagues and downplayed their own role in joint accomplishments. For example, successfully securing grant funding or a publisher's attention was credited by participants to the expertise of their research partners and not to their own contributions. Participants also described perceived inferiority or inadequacy due to their lack of traditional training or recent acquisition of an unfamiliar position. One participant wrote:

> *My training was not the typical path within this field, and as a result I felt inadequate as an instructor in the program because I perceived there were certain paradigms, expectations, or manners of teaching that I was not providing to students but were assumed as common knowledge to all faculty.*

In some cases, participants described self-criticism even in response to positive feedback from others. For example, a participant explained, *"Considerable self-doubt existed, despite the feedback I received from colleagues and superiors that I was performing as expected."* Participants' perceptions of self-inadequacy remained despite receiving positive acknowledgments from others.

Feelings of Fraudulence

Responses in this subcategory reflected accounts from participants who felt that they did not belong in their roles and were successful due to "pure luck." Participants described feeling that they were not smart enough to be in their positions and often struggled with understanding why they were originally hired. For example, one participant shared, *"I teach, and I feel I am barely*

ahead of the students and fear they will figure that out.'' These participants specifically emphasized their fears of "exposing" themselves as frauds in their field and as instructors. In order to mask these feelings of fraud, some participants described situations in which they pretended to know what they were doing in order to "blend in" with their colleagues. *"I always act like I know what I am doing. It's stressful, but students will always believe the [professor] knows what they are doing''* is how one person compensated for their impostor feelings.

Negative Feelings In-The-Moment

The final subcategory represented negative or uncomfortable emotions that arose in the moment of feeling like an impostor. Professors and staff shared a variety of difficult feelings that characterized these experiences including stress, embarrassment, anxiety, low self-esteem, discomfort, and panic, among others. *"I felt small and frightened when this happened''* is how one participant described the moment. Fears of failure sometimes led participants to second-guess their decision-making, resulting in additional stress and feeling overwhelmed. One woman recounted a negative moment during a job interview: "*After a long day of interviewing, I was exhausted. I started to question myself. I doubted my abilities*."

Managing IP

Lastly, participants described the potential outcomes of dealing with IP, which included both effective and ineffective strategies.

Effective Management

Participants described several effective approaches to managing impostor feelings and their long-term effects. One common approach was to work hard to prepare for new roles they were given; this in turn improved confidence in themselves and boosted their skills. For example, one person said, *"The tasks always go well and I learn and gain more experience so the next time I don't feel like an impostor."*

Another way that participants effectively managed symptoms of impostorism was by leaning on supportive friends and trusted colleagues. Examples from participants included: *"[I] talked through a lot of day-to-day challenges with my husband and close friends outside of the university."* Participants also looked for guidance and support from trusted colleagues and peers for help when taking on new or difficult tasks.

Participants also described attempts to manage their symptoms by directly challenging their thoughts and beliefs. This included adopting a positive mental attitude as well as learning to recognize their self-worth. Some participants explained that they were currently working on and practicing this approach while others reported extensive mental training that had resulted in improvement over their lives in their impostor feelings. *"Self-care and being patient with myself have been survival tools"* is how one participant managed impostor feelings. In some cases, participants described seeking help from healthcare professionals and/or attempting various self-care practices during times of stress (e.g., going for walks).

Ineffective Management

Many participants also shared difficulties they encountered in effectively managing IP. Participants shared situations occurring many years in the past that gave rise to impostor feelings that continued to haunt them with varying degrees of severity. For some individuals, the situations they experienced that caused their initial feelings were so impactful that their confidence was diminished and they were still disinclined to apply for new jobs or promotions, present at conferences, or take on new or challenging tasks. "*I felt like everyone was judging me and I now refuse to do public speaking and that holds me back in applying for other positions on campus,*" shared one person. Another person described an upsetting public speaking engagement: *"Giving a public lecture - it didn't go well. Prioritised the wrong things and didn't get the tone right. Happened ages ago and I still feel awful about it, that I ruined my reputation."* The repercussions of these moments reverberated for years. Many participants described ongoing upsetting memories and long-lasting negative feelings related to the triggering event. *"It has left me second guessing myself prior to every decision I make"* is how one participant described the impact.

Discussion

The purpose of this investigation was to identify commonalities across written descriptions of IP provided by staff and professors. Within the domain of triggers, professors and staff identified negative interpersonal interactions with colleagues and students that precipitated impostor feelings. Participants recounted interpersonal exchanges with colleagues and students where they were not treated as equals, others expressed doubts about their abilities to complete particular tasks or hold specific roles, or they felt intimidated and disrespected. This concept was also identified in Carvajal's study of medical faculty (2022) in the form of poor integration into the profession; unfriendly interpersonal interactions are unlikely to result in a sense of belonging and integration. Similar to Craddock et al.'s work with doctoral students (2011), situational factors, such as new jobs or projects or public speaking, were also frequently identified as precipitators of impostor feelings.

In describing the qualities of impostor experiences, for a plurality of participants, IP caused negative self-perceptions characterized by decreased confidence, self-doubt, and feelings of worthlessness. Professors and staff members also reported negative emotional impacts (e.g., stress, anxiety, depression), concerns related to negative external perceptions (e.g., concerns over how others perceived their abilities), and feelings of fraudulence that they associated with IP. Professors' and staff's reports of negative self-perceptions (e.g., inadequacy, self-doubt) corroborate prior research on students (e.g., Craddock et al., 2011; Stone et al, 2018), as well as other negative feelings (e.g., depression, anxiety, low self-esteem) that have been consistently associated with IP in other investigations (e.g., Badawy et al., 2018; Cokley et al., 2017; McGregor et al., 2008; Oriel et al., 2004).

A range of strategies were identified by participants to help them effectively navigate impostor feelings. Adaptive approaches included preparing for new roles/tasks and gaining experiences over time, consulting supportive peers and colleagues for advice and help, and engaging in health and wellness practices (e.g., self-care activities, consulting health care professionals), similar to results from Hutchins (2015). However, for some, impostor feelings resulted in long-lasting negative memories and emotions and hindered their willingness to engage in future opportunities (e.g.,

promotions, new jobs). Again, this supports other findings showing lower scholarly productivity in faculty with higher IP scores (Wester et al., 2020). Impostor feelings are problematic not only due to the distress they cause but also the possibility for permanent damage to career progress.

Participants in this investigation did not identify identity-related issues (i.e., gender, race) as significant contributors to IP feelings. This finding supports similar results from studies by Shreffler and colleagues (2023) and Wester and colleagues (2020) but runs contrary to accounts from participants in studies by Chakraverty on engineering education researchers (2021) and Hispanic/Latino early career researchers (2022). This may be due to homogeneity in research participants sampled, i.e., 84.5% identified as female, 92.3% as heterosexual, and 86.4% said they were not a visible minority. In addition, this investigation employed a more generalized sampling strategy rather than purposefully exploring the experiences of a specific group. The saliency of identity issues to impostor feelings may be stronger in minoritized participants or those pursuing research activities not traditionally associated with their discipline (e.g., chemistry professors who focus on education).

An especially novel finding from this investigation was the degree to which interpersonal interactions were associated with the development of impostor feelings. This underlines the need for supervisors to be mindful of how they interact with new and existing employees with regards to delivery of feedback, recognition of positive performances, and responses to staff members' self-appraisals (Clark et al., 2014) and mistakes (Kets de Vries, 2005). Creating a personalized and supportive environment that does not punish employees for mistakes may help those experiencing IP (Crawford et al., 2016). Furthermore, since many participants in this study described feeling underprepared or inadequately trained for a new role or situation, supervisors can support staff members by building a workplace culture in which all staff are encouraged to participate in continued professional development opportunities throughout their careers (Coomber, 2018). In this investigation, when asked about a time they felt like an impostor, many participants described interactions with colleagues and supervisors that are characteristic of social bullying (e.g., persistent criticism, insulting behaviour). Social bullying has been noted in academic contexts (e.g., Wieland & Beitz, 2015) and is often perpetrated by administrators and senior professors (Beckmann et al., 2013). Notably, participants did not describe these actions as bullying, suggesting the need for psychoeducation about social bullying in academic workshops and educational campaigns related to IP and for departments and faculties to enforce zero-tolerance policies for this behaviour.

Implications

There is consistent evidence that IP is a common and serious issue in student populations and is associated with many negative outcomes (Bravata et al., 2020; Ménard & Chittle, in press). IP is a significant issue in university settings, both in terms of the consequences to the staff or professors suffering from impostor feelings and also to the wider student population.

Staff and professors suffering from impostor feelings may be limited in their ability to assist others with similar feelings, or to provide mentorship. This is problematic as mentorship in graduate school may be particularly important for reducing IP in professors (Zorn, 2005), thus setting up a vicious cycle. Further research is required to establish whether impostor experiences among staff or professors trickle down and have an impact on students. However, correlational evidence

suggests that professors who have more feelings of impostorism have lower student evaluation of teaching scores, mentor and advise fewer students, and are less comfortable being seen as a role model to students (Brems et al., 1994).

Participants in the current study reported that IP caused both situational distress and persistent negative recollections, which corroborates research suggesting that impostor feelings may negatively impact job performance, career trajectories, and mental health (Ménard & Chittle, in press). As such, it is critically important to find effective strategies to minimize IP. An important strategy might be to normalize impostor feelings in academia through open dialogue and awareness campaigns (Craddock et al., 2011; Hoang, 2015; Hutchins, 2015; Jöstl et al., 2012) as well as formal workshops to raise awareness, share adaptive coping strategies, and provide an outlet for individuals to connect with others experiencing IP (e.g., Cisco, 2019; Danhauer et al., 2019; Hutchins, 2015; Verkoeyen, 2017).

Mentorship has also been identified as an important strategy to reduce IP (e.g., Craddock et al., 2011; Hoang, 2015; Hutchins, 2015; Jöstl et al., 2012; Zorn, 2005), especially in cases when employees find it challenging to discuss their performance with their supervisor (Clark et al., 2014). Formal mentorship programs designed for professors and staff that address impostor feelings could help normalize the phenomenon, provide emotional and instrumental support, and encourage professors to internalize their accomplishments (Hutchins, 2015). Mulholland and colleagues (2023) recently highlighted the positive impact of a postgraduate certificate in academic practice for its participants; the peer support provided in this program was beneficial to helping early-career academics address impostor feelings. Such programs should be implemented more widely and should also include higher education staff, who often do not have access to the same professional development opportunities as professors. The hierarchical nature of universities often overlooks the fact that staff play critical roles on campus, and many have advanced degrees themselves. Acknowledgment of the expertise held by staff through inclusion in such programming would help instill and develop their sense of belonging in academia.

Strengths and Limitations

This study represents one of the first qualitative investigations of impostor experiences of professors and staff. This study provides a comprehensive picture of impostor feelings, including how this phenomenon is triggered, felt, and handled, providing a robust picture of the root causes and implications and suggesting fruitful areas for future quantitative investigations. This is particularly important, as little of the IP literature has focused on coping strategies, despite the wide-scale prevalence and persistence of this phenomenon. Identifying effective strategies, mitigating variables, or protective factors to manage IP could be critical to effectively managing negative outcomes associated with impostor feelings. A strength of this study is the inclusion of voices from marginalized and disenfranchised groups (e.g., ethnic and sexual minority group members) as well as the participation of academic staff, who are rarely included in studies of higher education. The use of two coders and an external auditor enhanced the validity and reliability of the study findings.

Some limitations of this study are typical of qualitative data collected through open-ended online surveys. Participant responses can vary in depth and quality, and not all participants addressed each facet of the research question (i.e., what provoked their impostor feelings, how they managed

the situation, and what the impact was on them). Future researchers should consider interviewing professors and staff to gain further context into the causes of their impostor feelings as well as to uncover additional mediators and moderators that may influence IP. Since this study was cross-sectional, it remains unclear how impostor feelings may change over time or how effective participant coping strategies are at mitigating IP; these questions could be addressed through longitudinal and intervention studies. Further research is necessary to evaluate what types of interventions (e.g., mentorship programs, campus-wide workshops) can reduce impostor feelings among professors and staff.

This study relied on self-reported data, which can be subject to recall bias as well as social desirability in responding. Given that professors and staff self-selected to complete the survey, there is the possibility of volunteer bias whereby the participant pool consisted of individuals more prone to impostor experiences or who felt more passionate or interested in the topic. As with any qualitative study, the degree to which results can be generalized to other populations of professors and staff is limited. Further research is needed focusing on the experiences of groups that have been historically disenfranchised within academia to determine to what degree impostor feelings may have played a role in their career trajectories.

Conclusion

The aim of this study was to investigate professors and staff experiences of IP, including an exploration of factors that triggered this feeling, how they managed the situation, and what the impact was on them. Situational influences (e.g., feeling unprepared, insufficient training) and interpersonal interactions with colleagues and students caused participants to feel like impostors, which led to feelings of fraudulence, negative self-perceptions, concerns of negative external perceptions, and negative feelings (e.g., stress, anxiety). Participants identified a range of strategies that help them to cope with impostor feelings; however, many respondents appeared to be ineffectively managing impostor feelings (e.g., feeling reluctant to engage in future experiences, lasting negative feelings about past impostor experiences), which might negatively impact their career satisfaction and progress. In-depth interviews to better understand the impact of demographic factors and group membership, as well as nuances in the triggers, experiences, and outcomes of impostor feelings, are indicated. Institutions of higher education must consider developing interventions and resources to better support professors and staff who experience IP. Systemic cultural change is needed within institutions of higher education to address issues related to entrenched hierarchies, excessive competition, disciplinary nationalism, scholarly isolation, and the fetishization of productivity in order to address and mitigate impostor feelings.

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