When the Wounded Walk: Exploring the Lived Experience of Secondary Traumatic Stress in the Emerging Nursing Workforce

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Abstract

Aims:
The purpose of this study is to explore undergraduate nursing students' lived experiences with secondary traumatic stress, coping, and exposure to potentially traumatic clinical scenarios in practice.

Methods:
An interpretivist, Heideggerian hermeneutic phenomenology framed by Benner's interpretive lens guided the inquiry. Undergraduate nursing students who scored ≥ 38 on the Secondary Traumatic Stress Scale were purposively recruited. Semi-structured, face-to-face interviews were audio-recorded, manually transcribed verbatim, and subjected to iterative inductive coding.

Findings:
Four main themes emerged from the data, indicating lived experiences on 1) *How an Event Becomes 'Traumatic,'* 2) *Maladaptive or Ineffective Coping in Response to an Event,* 3) *Nursing Culture as a Conduit for Secondary Traumatic Stress,* and 4) *The Student Journey Toward Effective Coping*.

Conclusions:
This study tackled the largely unaddressed problem of secondary traumatic stress (STS) in undergraduate nursing students, a hidden driver of burnout and early exit from the profession. Findings revealed a predictable four-step cascade: 1) emotionally charged event, 2) distorted thoughts, 3) physiological arousal, and 4) behavioral avoidance, intensified by a cultural expectation of stoicism. Although students cobbled together relational, spiritual, cognitive, and physical coping tools, these strategies alone rarely broke the cycle.

Implications for the profession and patient care
Three educational imperatives follow: embed explicit secondary traumatic stress literacy alongside self-care modules, normalize brief peer/faculty debriefings, and train preceptors to frame vulnerability as a form of competence. Trauma-informed pedagogy built on these steps can foster integrated (rather than sustained) trauma, curb attrition, and help secure the future nursing workforce.

What problem did this study address?
Undergraduate nursing students frequently experience secondary traumatic stress during clinical training, yet curricula and clinical cultures provide little explicit preparation or support. This gap accelerates burnout and early departure from the profession, worsening nurse shortages and threatening patient safety.

What were the main findings?
The study uncovered a four-step STS cascade: clinical event leads to distorted thoughts which leads to physiological arousal and produces behavioral avoidance (amplified by hidden-curriculum stoicism). Students improvised multi-layered coping toolkits, but these alone were perceived as insufficient. Targeted, real-time interventions can interrupt the cascade and transform distress into manageable, integrated memories.

Where and on whom will the research have an impact?
The research will influence educators, clinical mentors, and health-system managers who shape the day-to-day experiences of nursing students and new graduates, with ripple effects for patient safety and workforce sustainability across comparable healthcare contexts worldwide.

Reporting Method: SRQR

Patient or Public Contribution
This study did not include patient or public involvement in its design, conduct, or reporting.

Keywords:
Secondary traumatic stress, nursing students, phenomenology, qualitative study, Heideggerian hermeneutics, trauma-informed education.

What does this paper contribute to the wider global community?

- Proposes a developmental-cognitive pathway of nursing students' secondary traumatic stress.
- Identifies stoic hidden curriculum as a contributing factor perceived in student attrition.
- Recommends scalable trauma-informed educational support interventions.

Introduction

Nurses are essential to the health of societies worldwide, and their empathy, presence, and technical skills are core to their indispensable role. However, these qualities can place nurses at risk for compassion fatigue and burnout, especially when adequate support and preparation are lacking (Pehlivan et al., 2025). While the World Health Organization (WHO, 2020) initially estimated that by 2030, there would be a nursing shortage of 5.7 million nurses, the International Council of Nurses (ICN) found that the impact of the COVID-19 pandemic had a far greater impact on the profession in the long term (Buchan & Catton, 2023). Subsequent efforts by global healthcare systems to intensify customer service and community engagement, without adequately supporting the nursing workforce, have led to an estimated 13 million nursing shortage anticipated in just a few years (Buchan & Catton, 2023). The latest ICN report estimates a shortage of 5.9 million nurses, with an expected need for 30 million additional nurses globally (Stewart et al., 2025).

In an executive summary from the ICN (Buchan & Catton, 2023, p. 4), the authors emphasized that rebuilding the nursing workforce was not a matter of individual nurse resilience: *"…without sufficient investment in well-supported nurses, there can be no effective healthcare system recovery and rebuild."* Yet, the ICN found in data from 2024-2025 National Nursing Association (NNA) members that 72.1% of nurses globally have seen little to no increase in salary since 2021, indicating that healthcare systems continue to undervalue nurses with 64.2% still attempting (and failing) to meet rising community health demands due to nursing workforce shortages (Stewart et al., 2025). NNA members include over 130 countries from the WHO regions of Europe, Africa, the Americas, Western Pacific, Eastern Mediterranean, and South-

East Asia (Sharplin et al., 2025). Yet, 48.4% of NNAs also reported significant increases in ongoing nursing workforce attrition (Stewart et al., 2025).

Addressing nursing workforce attrition is a multilevel stakeholder investment, with needs at many levels worldwide. Placing the burden of resilience on individual nurses is not a viable solution to these chronic workforce crises (Buchan & Catton, 2023; Stewart et al., 2025). One grossly apparent occupational hazard for nurses is the high mental and emotional workload of practicing caring for patients with inadequate human resources (Goudarzian et al., 2024; Poku et al., 2025; WHO, 2020). Inadequate human resources in this context refers to a situation where there are insufficient numbers of appropriately skilled or trained nursing staff to safely and effectively manage patient care. This includes shortages in nursing personnel, staffing below recommended levels, or situations in which nurses must handle disproportionately high patient ratios, thereby increasing workload, emotional stress, and the potential for compromised care quality (Goudarzian et al., 2024; Poku et al., 2025; WHO, 2020).

While beneficial for patient care, high levels of empathy and emotional engagement can negatively affect nurses' well-being if they are left unsupported in potentially traumatic experiences (Zhang et al., 2025; Zhou, 2025). Empathy in nursing fields such as critical care can be correlated with compassion fatigue, as nurses attempt to protect themselves mentally and emotionally while caring for others who are experiencing pain or suffering (Flarity, 2011; Flarity et al., 2013; Hunsaker et al., 2015). Factors that negatively influence nurse well-being and professional quality of life contribute to higher nurse intention to leave and turnover (Buchan & Catton, 2023; Chen et al., 2021; Lessi et al., 2024; WHO, 2020). In their most recent report, the ICN (Stewart et al., 2025, p. 5) reported that 61% of nurses globally are experiencing significant job strain, resulting in a *"job satisfaction crisis."*

Professional quality of life, a construct that captures both the rewards and the risks of caregiving, is commonly framed as the dynamic balance between compassion satisfaction and compassion fatigue (Stamm, 2010). Compassion satisfaction, the fulfillment derived from helping others, is a protective factor (Sprang et al., 2023; Stamm, 2010). Compassion fatigue, by contrast, encompasses subcomponents of a) burnout and b) secondary traumatic stress (STS). While burnout has dominated recent scholarship, STS has received far less empirical attention in nursing (C. Beck, 2011; Oakley et al., 2025; Roitenberg, 2025).

Secondary traumatic stress: Definition and relevance

STS (also termed *vicarious trauma*, *second-victim syndrome*, or *second-hand trauma*) refers to the emotional, cognitive, and physiological reactions that arise from indirect exposure to another person's suffering (Bond et al., 2025; Palm et al., 2004; Schmidt & Haglund, 2017). Symptoms parallel those seen after direct trauma and include intrusive images, avoidance, and hyperarousal (Simsek et al., 2025). Because nurses routinely witness acute distress, their empathic engagement renders them highly susceptible to STS, with downstream effects such as emotional exhaustion, diminished sense of safety, and disruptions in core beliefs (Bond et al., 2025; Oakley et al., 2025; Shorey & Wong, 2023). Relevant to this concept is the term pathogenic guilt: an empathy-driven form of guilt that arises when nurses internalize excessive responsibility for patient suffering or outcomes beyond their control. It is characterized by persistent self-blame, intrusive thoughts, and emotional distress, stemming from an intense empathic identification with patients' pain or adverse situations. A combination of STS and pathogenic guilt may explain links between empathy and manifestations of CF in nurses (Duarte & Pinto-Gouveia, 2017; Mottaghi et al., 2019). Fortunately, evidence indicates that self-care practices, peer and supervisory debriefings, and trauma-informed organizational cultures can

buffer these effects (Flarity et al., 2013; Wong et al., 2022). If left unaddressed, STS has been found to directly correlate with nurses' intention to leave (Comparcini et al., 2025; Edwin et al., 2024).

Prevalence and consequences for the workforce

The prevalence of clinically significant STS is striking (Chachula & Ahmad, 2022). Over 90% of practicing nurses experience secondary trauma during their careers (Bock et al., 2020; Gilroy et al., 2024). Within the past ten years, more than 60 % of emergency-department nurses, 50 % of pediatric nurses, and 35 % of labor-and-delivery nurses have reported moderate-to-high STS (Ariapooran et al., 2022; Duffy et al., 2015; Kellogg et al., 2018; Nicholls et al., 2021). One multi-site study found that 92% of nurses reported moderate to high STS (Zacharias & Upendra, 2023). Persistent exposure correlates with nurses experiencing anxiety, depression, interpersonal conflict, absenteeism, presenteeism (attending work despite physical or psychological distress, illness, or impairment, resulting in reduced productivity, compromised quality of patient care, and/or potential harm), and intentions to leave the profession, thereby jeopardizing patient safety and organizational stability (Bock et al., 2020; Bond et al., 2025; Jeong & Shin, 2023; Salmon & Morehead, 2019; Schuster & Dwyer, 2020). Nurses experiencing these significant psychological and emotional stressors, yet continuing to function professionally, are described as the "*walking wounded"* (Butts & Rich, 2022, p. 93; Christie & Jones, 2013; Conti-O'Hare, 2002) and are thereby more likely to contribute to the ongoing nursing shortage (Comparcini et al., 2025; Lee & Kim, 2020). This is especially relevant to novice nurses, where psychological distress from such experiences correlates more strongly with intention to leave (Edwin et al., 2024; Zeng et al., 2023). These nurses are leaving the workforce so quickly that many depart before they have a chance to become fully competent, often within the first two years of employment (Kim et al.,

2021; Wu et al., 2025). This exodus is a major contributor to today's global nursing shortage (Sharplin et al., 2025). Replacing each nurse is costly (Stewart et al., 2025). One systematic review estimated the cost to be roughly triple a single nurse's annual salary (Bae, 2023; Buchan & Catton, 2023; Ruiz, 2016). Nurse turnover also disrupts workflow (Neri, 2024; Stewart et al., 2025), strains preceptors and other remaining staff (Kauth & Reed, 2024; Narbona-Galvez et al., 2024; Neri, 2024), and ultimately jeopardizes patient safety and care quality (Ayala, 2025; Bae, 2025; Hakamy et al., 2025; Stewart et al., 2025). As aptly stated by the ICN, *"No country can train its way out of nurse shortages without addressing the workplace issues that are driving both new and experienced nurses away,"* (Stewart et al., 2025, p. 13).

Vulnerability of nursing students

It follows that if novice nurses are especially affected by STS, there is a likelihood that similar vulnerabilities exist within the student-nurse population during clinical placements (Kim et al., 2021). While most STS research centers on practicing nurses, emerging evidence supports this hypothesis (Gilroy et al., 2024; Oakley et al., 2025). According to Oakley et al. (2025, p.E47), *"Conceptual clarity is needed to improve STS measurement in nursing students; however, students experience STS and are at risk of developing its negative consequences."*

Students often confront the same emotionally charged situations as nurses, including workplace violence, suffering and/or death of patients (adults and children), bullying, harassment, and a workplace environment rife with moral and ethical dilemmas (Birks et al., 2024; Camara et al., 2024; Dafny, 2025; Dehkordi et al., 2024; Gilroy et al., 2024; Gonella et al., 2025; Lu et al., 2024). Yet, with limited clinical experience and coping repertoires, students are at heightened risk for intrusive thoughts, hyper-arousal, and negative shifts in professional identity (Balay-Odao et al., 2024; Gilroy et al., 2024; Simsek et al., 2025). They report lingering

sadness, anxiety, and avoidance of certain specialties after distressing events, and frequently criticize their programs for inadequate preparation (Gilroy et al., 2024; Simsek et al., 2025; Smith, 2024).

Untreated, such experiences can predispose the emerging nursing workforce to join the ranks of the *walking wounded* (Butts & Rich, 2022, p.93, Christie & Jones, 2013; Conti-O'Hare, 2002; Oakley et al., 2025). Alarmingly, a 2023 survey in the United Kingdom of final-year student nurses found average personal- and work-related burnout scores above 60% on the Copenhagen Burnout Inventory (levels typically reported by seasoned staff), indicating many graduates enter practice already depleted (Cottam et al., 2023). Comparable upstream losses are evident elsewhere: a longitudinal study in the United States found that only one-quarter of pre-nursing majors ultimately reached nursing licensure, with the steepest attrition occurring in first-year science courses and disproportionately affecting underrepresented students (Bennett et al., 2021). Qualitative data from Ireland echo this pattern: Nagle et al. (2025) demonstrated that *hidden-curriculum* messages absorbed incidentally during clinical placements, such as rigid hierarchies, staff burnout, and lack of voice, pushed many students to question whether they would remain in Irish nursing or even in the profession at all.

Beyond individual suffering, the stakes are systemic: secondary traumatic stress and early burnout sharply reduce the odds that novices will pursue, or remain in, professional nursing roles (Gilroy et al., 2024; Oakley et al., 2025; Schmidt & Haglund, 2017). In the United Kingdom alone, the National Health Service is grappling with 34,000 vacant nursing posts and a projected retirement wave of 175,000 nurses in the next decade; applications to nursing programs are collapsing in every English region, putting the government's ten-year workforce plan at risk (Royal College of Nursing [RCN], 2024). Unless universities and clinical partners equip students

to recognize and metabolise secondary trauma, the profession's pipeline will continue to narrow, exacerbating an attrition crisis that healthcare systems cannot afford (Goddard et al., 2021; Shaver & Viveiros, 2024).

Educational preparedness and current gaps

Recognizing the escalating issue of nursing burnout, the American Association of Colleges of Nursing (AACN, 2024) has begun emphasizing well-being and self-care in undergraduate curricula. Current toolkits, such as the *Developing Nurse Well Being and Leadership Toolkit,* offer resources for nursing programs to integrate concepts like well-being, self-care, resilience, and leadership (AACN, 2024). While these topics are essential, the authors were unable to locate any teaching or curriculum materials, resources, or toolkits designed to explicitly teach students how to recognize, prevent, or respond to STS.

The omission is consequential: structured self-care modules reduce perceived stress (Gancheva & Smith-Peters, 2022), graded self-care assignments build resilience to academic and clinical pressures (Jenkins et al., 2019), and, critically, a trauma-informed educational approach has been proposed as the missing link that embeds STS literacy within everyday teaching practice (Goddard & Jones, 2021). Integrating targeted STS content and trauma-informed principles could therefore magnify the benefits of existing well-being initiatives and close a key preparation gap for novice clinicians (Goddard & Jones, 2021).

Coping resources and student readiness

Students with limited resilience, scant social support, and fewer adaptive coping behaviors tend to exhibit the highest STS scores (Cao et al., 2021). Qualitative findings echo this pattern: many students rely informally on trusted faculty, family, or peers and advocate for formal curricular strategies, such as trauma-informed debriefings and proactive mental-health

referrals, to help them process traumatic encounters (Smith, 2024). Those with weaker internal and external resources endure greater STS and perceive nursing programs as offering insufficient guidance (Dewey & Allwood, 2022).

Aim

The purpose of this study is to explore the lived experience of undergraduate nursing students as they experience secondary traumatic stress during their program enrollment.

Methods

Qualitative approach and research paradigm

This study employed a hermeneutic phenomenological design, guided by Patricia Benner's (1994) interpretive framework, to explore the lived experiences of undergraduate nursing students encountering secondary traumatic stress (STS). Hermeneutic phenomenology, rooted in Heidegger's (1962) philosophy, systematically examines the meanings embedded in participants' narratives, making it especially suited for uncovering the nuanced emotional and psychological dimensions of STS.

Operating from an interpretivist paradigm, the research assumes that reality is co-constructed through participant–researcher interactions, with each participant's unique context shaping their interpretation of events (Gadamer, 1978). Benner's approach, informed by Heideggerian hermeneutics, emphasizes understanding human experience as it is lived, situated, and interpreted within specific contexts. This methodology enables a deep exploration of how nursing students make sense of their experiences, aligning with the aim to illuminate the meanings underlying their encounters with STS.

Researcher characteristics and reflexivity

The multidisciplinary research team characteristics included a background in nursing education, critical care, mental health, narrative and phenomenological research, social work, and psychology. An international team of doctorally prepared faculty members, alongside a psychologist, undertook this study with graduate-level research assistants from the school of social work. One pre-nursing undergraduate student, a certified nursing assistant (CNA), was included to perform vital signs on participants before and after interviews. The team psychologist specialized in the treatment of anxiety and depression in adults, with expertise supporting clients in faith-centered communities.

The diversity of professional backgrounds within the team enriched the interpretive process but also introduced the potential for disciplinary biases in data interpretation. To address this, reflexivity was maintained as an active, ongoing process throughout the study. Strategies included reflective journaling, peer debriefings, and regular team discussions on positionality and potential sources of bias. The research team explicitly acknowledged how their professional commitments might bias the way they interpreted students' experiences of STS, potentially leading them to over- or underemphasize specific stressors or coping responses. To mitigate these biases and enhance trustworthiness, nursing faculty were not involved in directly interacting with or interviewing the participants. Data analysis was performed primarily by research team members, excluding nursing faculty members and research assistants. Regular meetings were held throughout the collection and analysis process to discuss and mitigate potential implicit and explicit bias. This deliberate and structured approach to reflexivity aligns with best practices in qualitative nursing research, supporting transparency, self-awareness, and the credibility of study findings (Olmos-Vega et al., 2023; Peddle, 2021).

Context

Participants were recruited from a baccalaureate nursing program within a private academic institution in the Western United States. The setting is characterized by a structured clinical curriculum of over 700 hours, requiring undergraduate nursing students to complete hospital-based, simulation-based, and community-based experiences. Clinical rotations often include direct exposure to acute patient events, end-of-life scenarios, and other stressors that can precipitate STS. Students were enrolled in a stress management course during their first semester within the nursing program, but many chose to opt out of the course. Institutional resources, such as campus counseling services and online wellness modules, were available to students but had not been uniformly utilized or mandated in the past (Watson et al., 2025a).

Sampling strategy

A purposive sampling technique was used to identify participants with lived experience relevant to the study aims. Criteria for inclusion included: (a) enrollment in the undergraduate nursing program, (b) age ≥ 18 years, (c) English proficiency, and (d) self-reported moderate or high STS symptoms as assessed by the Secondary Traumatic Stress Survey (STSS). Students scoring 38 or higher on the STSS were invited to participate in in-depth interviews (Bride et al., 2004). Recruitment continued until data saturation was reached (i.e., when no new themes or insights emerged in subsequent interviews). The codebook stabilized after 10 transcripts; two additional interviews yielded no new sub-themes.

Ethical issues

Approval for the study was granted by the primary investigator's Institutional Review Board (#IRB2024-267). Potential participants first reviewed an implied consent form for the initial STSS survey. Then, before each interview, they received a formal consent form that explained the study's risks, benefits, and confidentiality measures. Participation was entirely

voluntary, and students could withdraw at any point without academic consequences. To safeguard emotional well-being, participants were provided with information about on-campus counseling and community mental health resources. All data were de-identified upon collection and stored on secure, password-protected servers with restricted access granted only to authorized research personnel.

Data collection methods

Initial screening was conducted through a validated instrument, the Secondary Traumatic Stress Scale ($\alpha = 0.93$) developed by Bride et al. (2004). Participants who scored moderate, high, or severe on the survey were invited to participate in interviews. Data were gathered primarily through semi-structured, one-on-one audiovisual recorded interviews with each participant, lasting approximately 60 minutes. An interview guide comprising open-ended questions was developed to explore participants' encounters with STS, perceived triggers, and coping mechanisms. Interviews were conducted iteratively: preliminary insights informed subsequent questioning, enabling the research team to explore emerging themes in depth. If participants exhibited signs of emotional distress, they were reminded of their right to pause or discontinue the interview. Vital signs, including heart rate, blood pressure, and oxygen saturation, were checked at both the beginning and end of each session to monitor physiological stress responses.

Data collection instruments and technologies

A semi-structured interview guide provided topical prompts (e.g., "*Tell me about a time you felt especially impacted by a patient's trauma*"). Interviews were audio-visually recorded. All consent forms and surveys were administered via Qualtrics, with the STSS embedded for screening purposes. No modifications to the instruments occurred during the study, although

minor adjustments (e.g., rewording of prompts) were made if participants indicated confusion or required further clarification.

Units of study

A total of 35 undergraduate nursing students participated in the study, with (n = 12) scoring moderate, high, or severe on their STSS. Students represented a range of academic levels within the BSN program based on voluntary participation. In addition to demographic data (age, level in program, and clinical rotation history), each participant contributed a detailed narrative of their perceptions of experiencing secondary trauma in a clinical or academic setting.

Data Processing

All audio recordings were transcribed manually by the research team, verbatim. Transcripts were reviewed for accuracy against the original audio and de-identified before coding. Identifiers were replaced with alphanumeric codes; master linking logs were stored separately in a secure, encrypted folder. Interview transcripts, field notes, and observational data were manually managed on an encrypted server. Access to these files was strictly limited to key personnel, and an audit trail was maintained detailing all coding decisions and data management steps.

Data Analysis

Consistent with Heideggerian (1962) hermeneutic phenomenology, the team engaged in repeated, in-depth readings of each transcript to capture emerging meanings, guided by Benner's (1994) interpretive framework. The analysis team iteratively moved between parts of the transcripts (individual statements or codes) and the whole (overall narrative) to identify inductive patterns. Initial codes were clustered to form subthemes, which were then synthesized into overarching themes. The interpretive process involved researcher memo-writing, team

debriefings, and ongoing reference to the study's conceptual focus on STS. Occasional discrepancies in coding and thematic grouping were resolved through consensus.

Techniques to Enhance Trustworthiness

Credibility

Researchers invested substantial time in data collection to develop a robust understanding of participants' experiences with STS. This prolonged engagement involved extended interviews, iterative listening, and repeated reading of transcripts, ensuring the research team became fully immersed in the data. In keeping with this commitment, researchers implemented member checking by sharing preliminary thematic summaries with participants willing to review them. Feedback or clarifications gathered through this step validated the accuracy of emerging interpretations. To further enhance credibility, diverse team members (spanning mental health, nursing education, and psychology) regularly reviewed codes and themes. Through peer debriefing, they posed critical questions, challenged assumptions, and collectively contributed to refining the interpretations.

Dependability

All decisions related to sampling, data collection, coding, and theme generation were carefully documented to create an audit trail, ensuring transparency and accountability. This included annotated transcripts, reflexive memos, and meeting logs, allowing for an examination of consistency and coherence in the research process. Additionally, a code–recode strategy was employed, wherein certain interviews were initially coded and then set aside for recoding after a period. When the research team detected discrepancies, they engaged in discussions aimed at refining code definitions, ensuring that data interpretation remained systematic and stable over time.

Confirmability

Each research team member maintained a reflexive journal, noting personal reflections, potential biases, and any assumptions that might inadvertently influence the interpretation of data. These journals helped safeguard against the imposition of researchers' preconceptions. Triangulation of sources provided another layer of confirmability. In addition to interview transcripts, demographic information and de-identified field notes on participants' nonverbal cues (observed during interviews) were used to verify consistency in interpretations. Throughout the process, interpretive discussions centered on team consensus. Investigators with backgrounds in critical care, mental health, and psychology examined emergent findings in tandem, reconciling divergent perspectives through evidence within the data.

Transferability

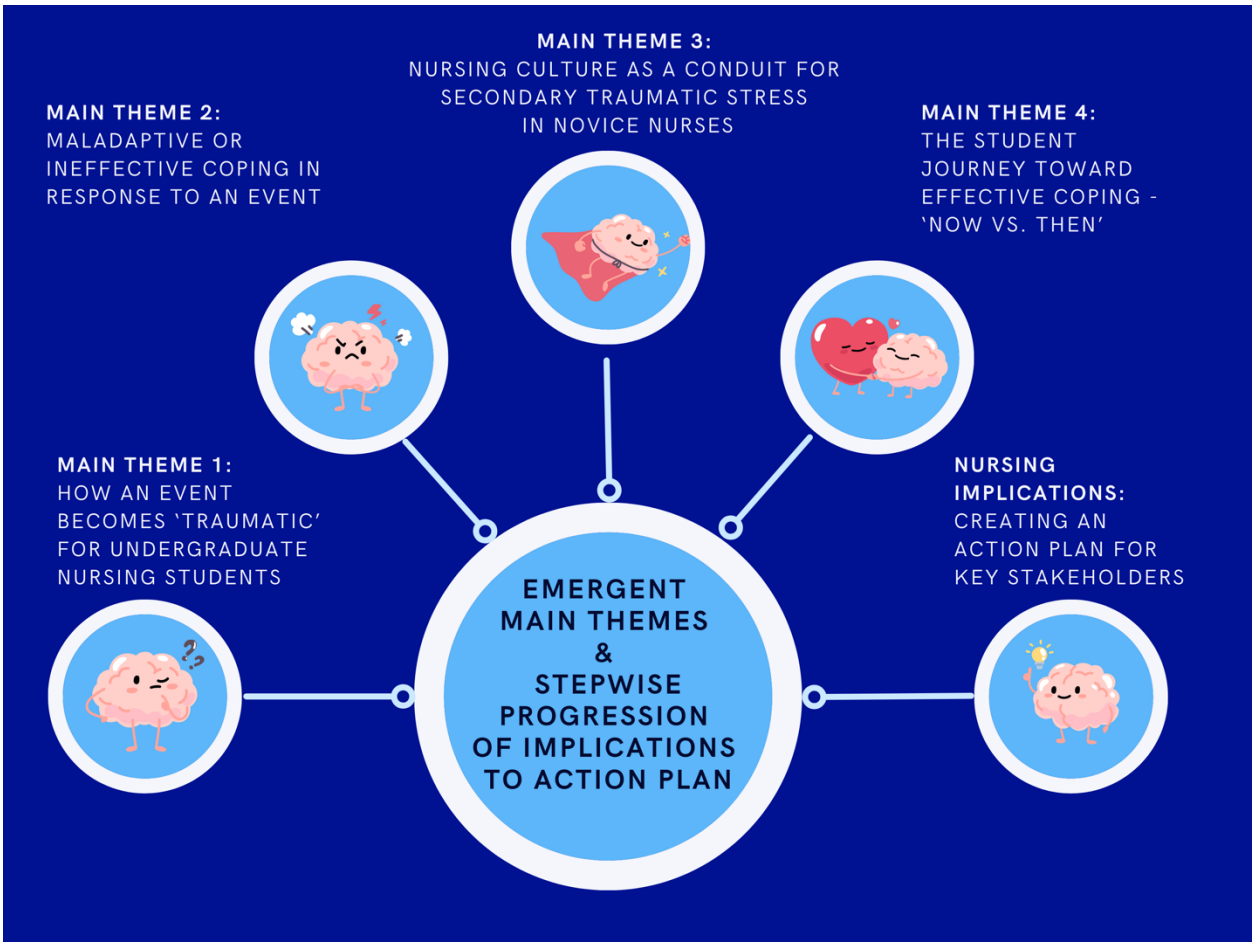
To facilitate the application of findings to other contexts, researchers incorporated rich and detailed descriptions into the study's final report. This included detailed accounts of participants' academic levels, the types of clinical environments in which they trained, and their emotional responses to STS. Such contextual information enables readers to evaluate how the findings may apply to similar settings or populations. Purposeful sampling further strengthened transferability by drawing participants from various clinical exposures and academic stages. This diversity allowed for a broader view of STS experiences, increasing the likelihood that insights could be extended to comparable nursing programs.

Findings

Emerging themes and empirical data

The research team identified four main themes from the empirical data. See Figure 1.

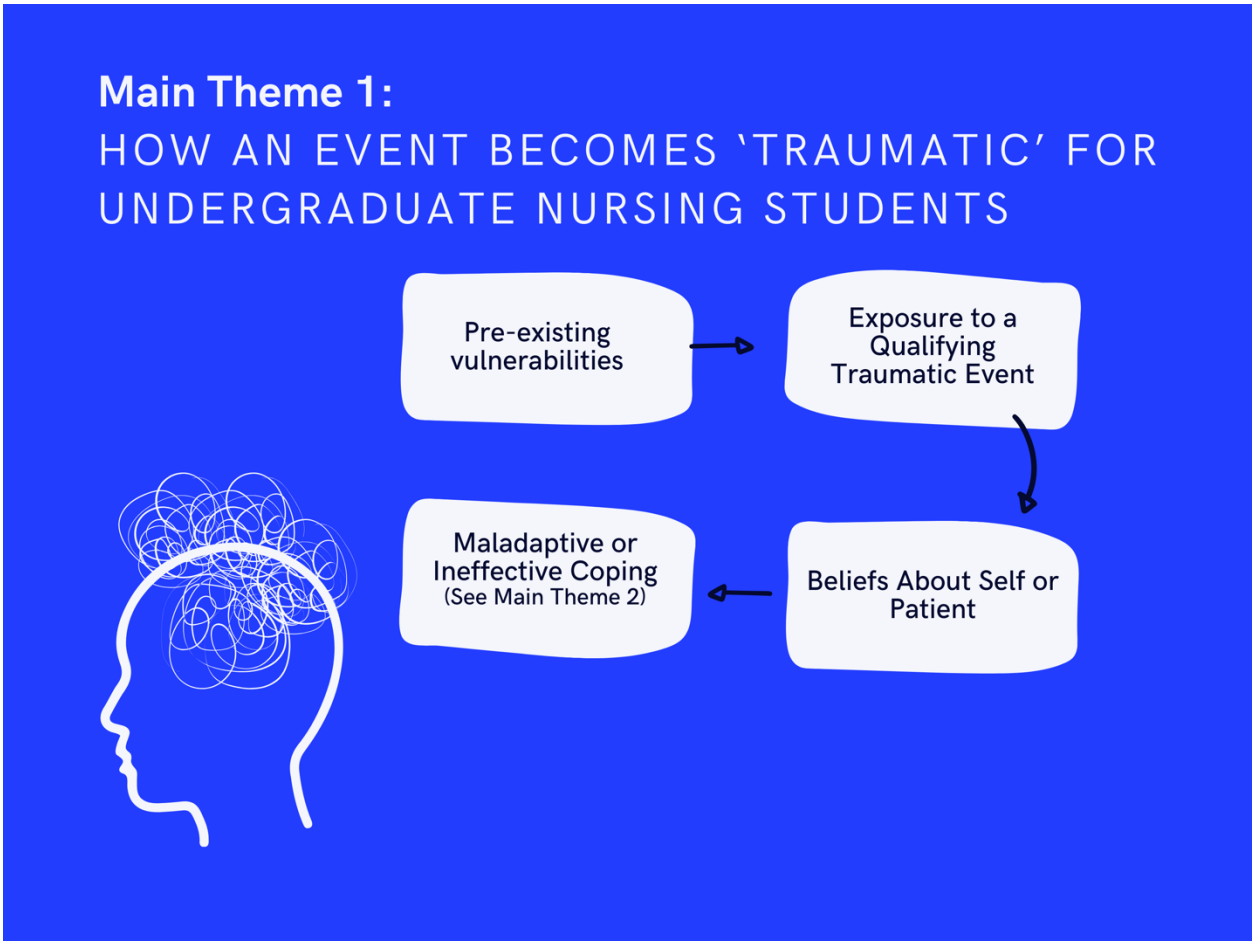
Figure 1. *Main themes*



Main theme 1: *How an Event Becomes "Traumatic" for Undergraduate Nursing Students*

Participants emphasized that the same clinical incident can be registered as routine for one learner yet traumatic for another. The difference lies in the personal histories and meaning-making lenses students bring to the bedside. See Figure 2.

Figure 2. *Main Theme 1 and Related Subthemes*



Subtheme 1.1: ***Pre-existing vulnerabilities.*** Students carried an invisible backpack into every shift: a mix of prior trauma, mental-health history, and current life stressors that primed their reactions. One participant shared,

> *"I would just be anxious all the time…when I was off shift, I would be thinking about [the patients], and I thought that was good. I thought that meant I was just dedicated. After changing that, I realized it was not healthy. I feel like when I'm [in clinicals] a lot, it's easy to get caught up in that bubble. And then symptoms like anxiety or bad dreams persist longer than they normally would. I also have OCD, and so sometimes I get just these random intrusive thoughts, like getting paper cuts all over my face, and what that would feel like. When [clinicals] are going poorly, I experience those for a lot longer, and it's harder to get them under control. Whereas normally if I'm not as stressed, I would be able to just think them away."*

Participants noted that earlier experiences of bereavement, violence, or chronic illness sensitized them to parallel patient stories. Those managing baseline anxiety, depression, or thin coping reserves described feeling "*already at capacity*," so that even moderately distressing events tipped them into overwhelm. External pressures, such as looming exams, financial strain, and caregiving for relatives, further depleted their bandwidth. Combined, these factors created a fragile foundation on which any clinical crisis could land as traumatic rather than merely stressful.

Subtheme 1.2: *Exposure to a Qualifying Traumatic Event.* All participants traced the onset of STS symptoms to at least one high-impact incident: most commonly, unexpected patient deaths, patients relayed stories of violent injuries or abuse, or first-time involvement in a resuscitation. One participant shared,

> *"I had two patients back-to-back pass away when I had clinicals last semester. You can imagine doing CPR on someone and watching their family as they realize they're not going to make it. That definitely sticks with me…the memory [keeps coming] back. I mentor a new student; she asked, 'Have you ever done CPR on a real patient?' I just started tearing up. I felt that intenseness again. Once a week it'll come up and I'll think about it. I've learned how to push it out."*

The events' suddenness and perceived gravity overwhelmed the participant's novice nurse coping reserves, catalyzing the subsequent cascade of stress reactions.

Another participant shared,

> *"I feel like the most traumatic part of it wasn't the fact that I was doing CPR. It was other people's responses to it. A lot of it was putting myself in their shoes. I was just overwhelmed with sadness for them for a long time."*

In this situation, the participant notes the distress of the patient's family members who were present for cardiopulmonary resuscitation, and how imagining seeing these efforts

through the eyes of the patient's family made the efforts distressing to the participant as well.

Subtheme 1.3: *Beliefs About Self and the Victim.* Students' real-time appraisals powerfully shape how deeply an incident cuts. A recurrent motif was omniscient guilt: the conviction that they should have anticipated every complication or patient need to spare the patient discomfort. When novices adopted this totalizing sense of responsibility, intrusive self-blame and relentless mental reruns followed. Impact intensified whenever they saw themselves or loved ones in the patient: children, age-peers, or cases echoing family histories evoked a visceral mirror effect. Distress deepened further if students believed the patient remained at risk, vulnerable to future abuse or injury, or continued suffering, reinforcing a narrative of unfinished caregiving. For example, one participant reflected:

> *"I'm working with pediatrics. Six out of twelve have three traumatic histories. It's really difficult, hearing about sexual abuse for children…as you can imagine, either [reading the] charts or they'll say very graphic things. Initially, reading about it and hearing about it wasn't a big deal. As soon as I left and let it process, it was just like that deep sadness pit in my stomach, and this all-over tenseness. [I've experienced] a lot of emotional turmoil because of that. Thinking about the things they've gone through that has stuck with me for weeks. [I feel] anger towards people who could hurt kids, in that way, especially. I just felt scatterbrained, really stressed, and I couldn't get my mind off. It just kept going back and back."*

Another participant shared,

> *"In clinical this semester, I had a patient who had told me that they had been raped by a caregiver. They just had trouble with brief changes and stuff. It was very sensitive because they were super afraid that it would happen again. They told me, in detail, about that experience. She still had a really hard time with anyone taking care of her. She was quadriplegic. So, she needed people to help her. It was super scary and just hard for her to let that happen because of what had happened before. She'd wake up in the morning and think that it was happening again.*
>
> *It was really sad, and I liked this patient a lot. She was younger, whereas most of the people in nursing homes are old, so we bonded and [played] games. It's just really sad to me that she's someone who's so dependent on other people's care*

> *and has to be trusting in nursing and nurses, and then, like, her trust is just completely gone, rightfully so. She can't do anything to change her need for that. She still needs nursing care and still needs to live in a facility. She can't do anything to change how it is or what happened.*
>
> *She couldn't yell or walk; you know what I mean? She was defenseless. She had no control over being at that institution. So, like, [we] couldn't do anything to help her. And it just made me really, really sad to think about the fact that it's still affecting her every day. She wakes up and is afraid or screaming or crying and that's… her life is already so hard. She doesn't mean to be like that. It's heartbreaking."*

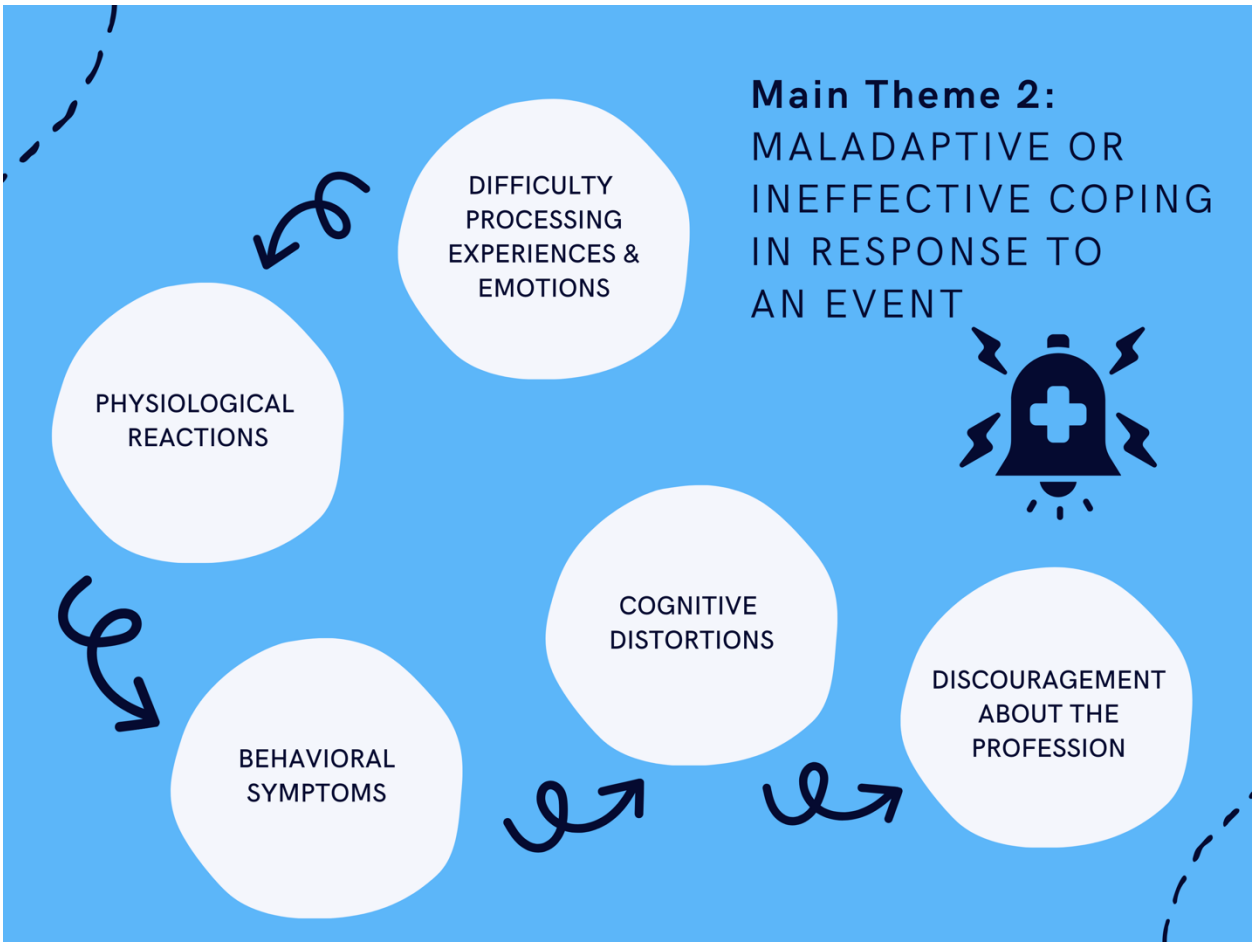
In short, moral and role-based interpretations, more than the event's objective severity, determined the depth and duration of students' secondary traumatic stress.

Synthesis. An incident becomes traumatic for nursing students when it collides with *pre-existing vulnerabilities* and is filtered through *beliefs about self and the victim*. Recognizing these subjective thresholds can help educators tailor debriefings and support to each learner's unique psychological landscape.

Main theme 2: Maladaptive or Ineffective Coping in Response to an Event

This overarching theme captures the individual, relational, and educational forces that converge to heighten students' vulnerability to STS. Participants portrayed STS not as a single-event reaction but as the cumulative product of how a traumatic encounter is interpreted, supported, and integrated (or left unprocessed) within the culture of nursing education. See Figure 3.

Figure 3. *Main Theme 2 and Related Subthemes*



Subtheme 2.1: ***Difficulty Processing Experiences and Emotions.*** Even when time was available, some students lacked the vocabulary or frameworks to make sense of what they felt. They described being *"emotionally overwhelmed"* yet unsure how to translate feelings into coherent narratives, leading either to suppression or relentless mental replay. Other participants tried to avoid topics that brought the experiences to mind, as one shared:

> "*[In class the professor will say] today we're discussing ways to cope with loss. I definitely get tense. I go; I don't really want to talk about that. I don't really want to even think about it again. I usually can make it through it, but yeah, it definitely [added] an extra layer of stress. [I think] 'Oh man, I've been through this. I should have done things differently.'"*

This processing gap prolonged physiological arousal and delayed recovery. Students reported self-isolating behaviors to "*protect"* their loved ones. One participant shared,

> *"I get irritable when I'm stressed. I'm a procrastinator at the same time. I am always doing things at the last minute, and that just adds to the stress, which is not good, but I think in those moments, I definitely tend not to be as kind as I should be to my spouse. I am more high-strung around my family members.*
>
> *I feel like I can notice when I am stressed, and I try to be by myself so I can get school done or whatever because I definitely think I put that stress onto the people in my life sometimes if I am around them during those moments..."*

Subtheme 2.2: ***Physiological Symptoms***. Trauma is stored in the body. Thus, memories and/or interaction with the traumatic event result in a higher degree of physiological arousal (Wei et al., 2017). To assess these changes, students wore heart rate monitors throughout the interview. While the data were not subjected to statistical analysis, a clear pattern emerged: heart rates consistently increased by 10 to 35 beats per minute during the recounting of traumatic events. Notably, heart rates returned to baseline shortly after the story concluded. This recurring physiological response suggests a strong somatic connection to the students' traumatic memories. Additionally, many students expressed concern with increased trouble sleeping, headaches, and gestational pain. One participant explained,

> *"I have trouble sleeping, especially the night before clinicals. Like, I always take a sleeping pill the night before clinicals… it just scares me. I am scared I'm going to miss my alarm. I'm scared I'm like going to be late. It like freaks me out, like about what's going to happen."*

Subtheme 2.3: ***Cognitive Distortions.*** Participants frequently experienced spiraling thought patterns characterized by cognitive distortions, including catastrophizing, overgeneralizing, mind-reading, and all-or-nothing thinking. For example, one student expressed all-or-nothing thinking: "*If I'm not studying right now, then I'm going to fail."* Another demonstrated mind reading with the belief, *"They're going to judge me for my lack of skills."* These distortions were not limited to minor concerns; they extended into deeply personal areas. After working with patients who had experienced severe abuse, one participant reflected:

> *"I'm so grateful for my husband for being super supportive, but also, it's conflicting because I'm like… the patients I've talked to, their husbands were also really good. Not that I'm saying I think my husband's going to abuse me... It's just like there's always that potential."*

Another student described how clinical exposure influenced her anxiety about everyday risks:

> *"Honestly, it gives me anxiety about going out and doing things, and same with my husband. Like he goes skiing, [and] every time he goes skiing, I'm nervous that he is going to get paralyzed because I know [this patient] was paralyzed."*

While cognitive distortions are common in the general population, these findings suggest an elevated and clinically significant presence of such distortions among nursing students, which can significantly impact their daily functioning and are closely tied to their clinical experiences.

Subtheme 2.4: *Behavioral Symptoms.* Beyond discrete distortions, students reported experiencing broader cognitive rhythms, including nighttime replay, anticipatory dread of future shifts, and vivid sensory flashbacks (such as smell and sound). These patterns sustained sympathetic activation, making it difficult to relax, concentrate on coursework, or enjoy time off. One participant shared: *"[The patient] was always in my dreams, but I wouldn't be able to help her out of whatever situation."* Another participant reflected:

> *"[After] working in the ICU I'd go home and try to lay down and sleep and then hear the beeping or the alarms or the monitors, but there's not anything actually there. Or I would dream about my patients or like dream [that] I'm still at work. I need to do this, this, and this…and then I would think I needed to get up and do CPR even though it was in my dream."*

A third participant shared:

> *"I don't get a lot of good sleep, and that impacts my concentration. Like with clinicals, I…had this intense fear that I would sleep past my alarm, be late, and then people would get upset with me. So, I would wake up every hour before I was supposed to go… because I was worried that I would miss that or I would have nightmares. Then, even just my first clinical, I had the same thing; I just kept waking up. Sometimes I would dream about someone having a heart attack, and I couldn't help them. My therapist recommended that I do drawings before bed or*

> *coloring. I would do that sometimes, but most of the time I feel like I'd toss and turn until sleep. I just thought it was a healthy thing because [that way] I was not going to miss my alarm."*

Subtheme 2.5: *Discouragement About the Profession.* Repeated exposure to suffering and witnessing burned-out staff sparked doubts about nursing as a career. Students believed that to be "*a real nurse,"* they were expected to endure symptoms of STS without proper support since this is *"just what nurses do."* Several students voiced fears that *"every shift will feel like this,"* questioning whether the profession's rewards could outweigh its emotional costs. For example, one participant shared:

> *"I think the whole hopelessness part has stuck with me. Every time that I don't do well on an exam, I'm like, 'I'm just not going to enjoy the rest of my life. Why am I even here?' I had my first thoughts of suicide a few weeks ago, linked back to my experiences in clinicals."*

Another participant noted:

> *"As a nurse, I'm going to experience [mistreatment by patients] for the rest of my life. Am I ever going to find satisfaction? Constantly being overworked and not having the support I need from my coworkers, and then there's the patients themselves... I ended up losing a little bit of hope about that."*

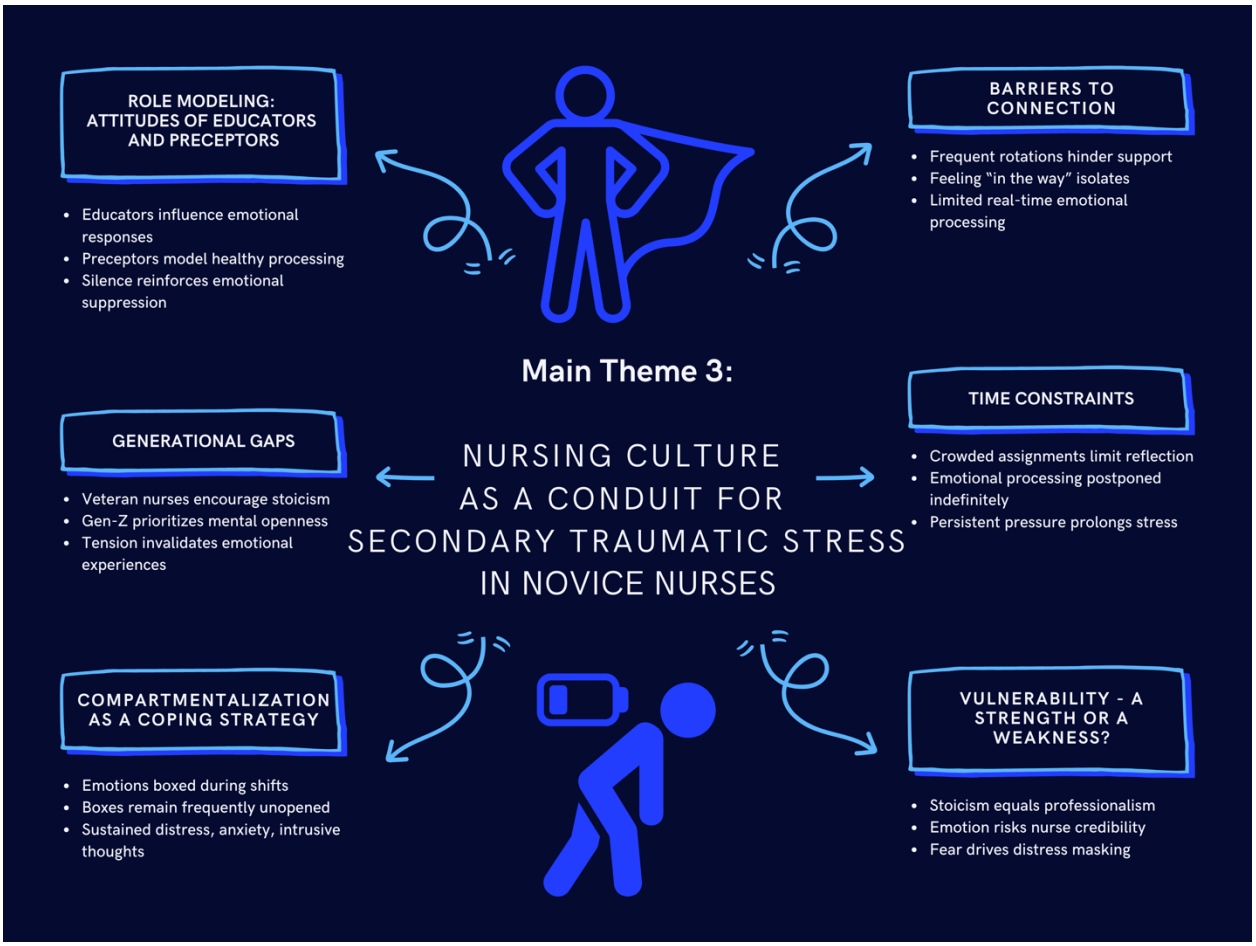
Such misgivings actively undermined students' experiences of compassion satisfaction and eroded their motivation to persist in pursuing a nursing position following graduation.

Synthesis. Collectively, these subthemes reveal that undergraduate students' susceptibility to STS is not dictated solely by the trauma they witness; it is shaped by the cultural scripts they inherit, the cognitive frames they apply, and the relational and pedagogical contexts that either help them integrate or compel them to suppress their experience.

Main theme 3: *Nursing Culture as a Conduit for Secondary Traumatic Stress*

Students described a hidden curriculum of social norms and structural pressures that, collectively, primed them for STS. The following subthemes show how those cultural messages were learned and enacted. See Figure 4.

Figure 4. *Main Theme 3 and Related Subthemes*



Subtheme 3.1: ***Vulnerability – A Strength or a Weakness?*** Stoicism is traditionally equated with competence in nursing culture, positioning visible distress as "*unprofessional.*" One participant shared, "*Being vulnerable with people is difficult in nursing school."* Students internalize early on that emotional vulnerability might undermine their credibility as "*real nurses.*" Participants commonly expressed, *"I try not to cry in front of patients,"* highlighting an ongoing tension between authenticity and professional image. Another student shared, *"There's*

nothing worse than crying [when] you're [at] clinical [and] going to help another patient and you're still got tears in your eyes." In contrast, one participant shared,

> *"When I was talking to his nurse, I got teary-eyed. I'm pretty sure I cried when I was at their family's house. I don't necessarily feel like that's inappropriate just because I want them to know that the patient was cared for and it's not just something that is easy."*

Another participant reflected on how emotional expression may affect their social or professional image in nursing:

> *"I do feel like it's; it's easy to bottle things up because you don't want yourself to be portrayed negatively or, like, you don't want people thinking of you in a certain way. For me, personally, I've bottled up things just because I don't wanna make it seem like I'm weak or something…or that I'm struggling when I'm worried that no one else is…"*

Due to inconsistent messaging about emotional openness, some students perceive vulnerability as a professional liability.

Subtheme 3.2: *Role Modeling by Educators and Preceptors*. Faculty and precepting nurses have a significant influence on students' emotional coping strategies. Educators who dismiss emotional reactions with statements like *"That's just nursing"* implicitly endorse suppression, while those who openly acknowledge and normalize emotional responses foster psychological safety. One participant shared the message received from their faculty, *"[With] nursing, you have to just be prepared for the unexpected to happen. A lot of times it's emotional, but you just kind of have to keep it together."*

Similarly, preceptors who openly model healthy emotional processing gift students examples of how to express and manage feelings constructively. One student noted,

> *"Recently, I've been working a lot at [a pediatric hospital], and they have group sessions where they process and talk about what they're going through. I honestly wish we had something like that in nursing school."*

Conversely, preceptors who remain silent, task-focused, and emotionally distant inadvertently encourage students to suppress emotions. One participant shared noticing the role modeling in their nurse preceptor during a clinical rotation, *"There's that culture, especially in nursing, where it's like, 'Yeah, that's rough, but other patients need us still.'"* Another participant noted, *"There was kind of a comparison to other nurses. You don't see them crying. So, they've learned to tough it out or shut it off. It's a process <laugh>."*

Students who felt their responses did not align with the attitudes and behaviors of their nursing role models sometimes found themselves altering their career path or avoiding certain patients based on this interpretation. One participant shared,

> *"I've taken a step back from working with hospice patients because I noticed that it was emotionally taxing, and I think that's just the kind of person I am. It couldn't be like 'Easy come, Easy go' with these patients like the rest of the staff. I felt like I had to go to all their funerals, and I felt like I had to make sure their family was okay. I was just taking on more than is in my scope of practice. Those are normal things to do, but it wasn't required of me."*

Subtheme 3.3: *Time Constraints.* Crowded patient assignments and inflexible clinical schedules create barriers to emotional processing and recovery. The limited time for meaningful reflection often forces students to postpone emotional debriefing, which can be done indefinitely. A participant noted,

> *"Sometimes when providing patient care...You know, you'd go on to the next patient, and so you'd go to the bathroom, get yourself to stop crying, tell yourself it's okay, we can get through this, and then go and care for your other patients. And that was hard 'cause it was, you know, you didn't acknowledge those feelings. As they came, you had to just kind of take 'em back. Then later, whenever you did get to process them, you know, it was the end of your shift, and you're like, I kind of don't wanna be thinking about this right now. I'm too tired..."*

This persistent time pressure inhibits emotional resolution, prolonging stress responses. One participant shared:

> *"Immediately after a patient died, the next nurse next door over was like, 'Hey, can you come help me change a patient's brief?' I have no time. I sat there and cried for a second. Then, after that, I had another patient pass [away]. I think it's also the impact on me that's hard to think about when that happens. This is just another Tuesday or Wednesday for me, but it's the worst day for the patients and their families. I had a child who had died by suicide, and the parents didn't find out until the next day. Seeing the family come in and go…it was like, 'The body is here, but our kid is not anymore.' That was really hard. Then the nurses were like, 'Do you want to go see this cool test we're doing next door?' I was like, 'No, I want to take a second to mourn with this family that just found out their child passed.'"*

The participants struggled to balance expressing emotion within the time constraints allocated by patient acuity, nursing tasks, and staffing needs. A lack of resources, or indeed, recognition of the need for resources, complicated their experience of patient care and socialization into the nursing role.

Subtheme 3.4: *Compartmentalization as a Coping Strategy.* Students frequently resort to compartmentalizing distressing clinical experiences, mentally *"boxing up"* unsettling images or emotions to manage immediate responsibilities. Compartmentalization is often necessary in the face of tight time constraints. While it can be a helpful coping strategy initially, it frequently becomes maladaptive for participants when experiences and emotions are suppressed rather than intentionally set aside for later processing. The results were seen largely on an intrapersonal scale. One participant shared,

> *"After those experiences, they each kind of built up, but then all at once they kind of mellowed out, and I stopped thinking about them as much. Maybe I just buried them. Maybe I didn't address 'em, but once I stopped thinking about them. It was just kind of like…I don't know, a little bit of a dent in my compassion, if that makes sense. I still cared about my patients... I felt more like some drops had been taken outta my bucket, and so I didn't have as much to give. It's hard 'cause you have to learn how to kind of emotionally turn yourself off almost."*

Another participant shared,

> *"You don't want to address [emotional reactions to patient care] when you're at clinicals or when you're on the job. It's hard. You really can't do that [and still]*

> *take care of other people. On my lunch break, I only get 30 minutes. You don't have time to address that and make sure that you're in a good place, then go back. Like you don't rip the scab off if you know you're not going to have time to put any band aids [back] on."*

Many students acknowledge that these mental boxes often remain unopened, perpetuating intrusive thoughts, anxiety, and sustained emotional distress. One student noted the cumulative effect: *"I feel like it's harder for me to be compassionate to people outside of work. I can't relate to you as much. There's a little part of my heart that's missing now."* This phenomenon was seen as a way to immediately contain 'negative' emotions (i.e., grief), but then left a barrier on the student's ability to also experience positive emotions (i.e., compassion).

Subtheme 3.5: *Barriers to Connection*. Frequent rotation of clinical sites, varied shift patterns, and students' persistent feeling of *"being in the way"* or inability to relate to their preceptors impeded stable, supportive relationships. The results were seen largely on an interpersonal scale. The resulting lack of reliable peer or mentor connections prevents real-time emotional processing and further isolates students experiencing secondary traumatic stress. For example, one participant shared,

> *"At the hospital during my first code... that experience has replayed in my head a lot [eight months]. There was this older guy, and he wasn't doing very well in the ICU, and he just started coding. There were lots of students on the floor that day. So, every nurse brought [their] students and we were just standing outside the doorway. I helped with CPR for a little bit, but the main thing was that it was such a traumatic situation for the family that was in the room. [Yet] there were tons of nurses outside the room with the door open, and a lot of them were laughing and acting like it wasn't a big deal. The code wasn't my favorite thing to do. It's hard, and the patient didn't end up making it. Mainly, [when it replays I] remember how I felt. Some of [the nurses] are making light of it, and then some of the [family] were having the worst day of their life at the same time, and it was weird to have both in the same [room]. I was frustrated because I realized how it affected the patient's family."*

Another participant shared,

> *"[With] HIPAA, it can be hard to come home and not really know even how to express what you've experienced, especially if you don't have people at home [who] understand nursing or what it's like to do a 12-hour shift…"*

Fearful of jeopardizing patient confidentiality, grades or other evaluations, social standing or reliability as a future nurse, or even future professional references, students may mask symptoms of distress, reinforcing isolation and exacerbating internal struggles with STS. The nature of this phenomena was largely experienced as a chronic manifestation of a lack of ongoing availability to process emotions.

Subtheme 3.6: *Generational Gaps*. Participants contrasted a veteran "tough-it-out" ethos with Gen Z students' insistence on mental-health openness. One student noted that, on clinical units, she felt *"like the only one experiencing these emotions,"* as though her more senior colleagues were somehow immune to stress. She longed for a simple check-in: *"What are you guys struggling with right now?,"* imagining that an invitation from professors to talk would validate her experience. Another lamented that nursing school rarely framed hardship as a source of growth: *"Hard things happen…and if you need help, that's okay,"* she said, suggesting curricula that integrate both challenge and support could normalize help-seeking.

This divide, participants argued, invalidates younger nurses' distress and deepens silence around secondary traumatic stress. When emotional expression is deemed *"unprofessional,"* students internalize their anxiety rather than share it. To bridge this gap, students suggested that nursing programs and clinical leaders must create structured spaces (intergenerational debriefings, peer-mentoring circles, and reflective seminars) where seasoned nurses model vulnerability and normalize self-care. Participants believed that open dialogue in both education and practice would allow the nursing profession to honor the lessons of experience without silencing the needs of its newest members.

Synthesis. A nursing cultural emphasis on stoicism, inconsistent role modeling, pervasive time constraints, and systemic barriers to meaningful connections were listed as complications the students experienced. Notably, participants perceived generational gaps to heighten undergraduate nursing students' vulnerability to secondary traumatic stress. Several participants linked this cultural dissonance to doubts about staying in nursing, a connection explored further in the discussion section of these findings.

Main theme 4: *The Student Journey Toward Effective Coping*

This theme describes the winding, developmental path undergraduate nurses travel as they learn to manage the emotional aftershocks of clinical trauma. Rather than discovering a single 'best' strategy, students assemble a layered repertoire of supports and self-care practices that evolve from *then* (early efforts using coping that worked before clinical exposure) to *now* (tailored, intentional, integrated routines). For example, one participant shared,

> *"It's more at home that I have the problem. My husband will try to talk to me, [but] I'll be thinking about these difficult experiences. I'm like, 'I'm sorry, I'm thinking about my patient right now. I'm thinking about this one kid, and this situation's going on.' I feel bad for my husband and my parents; I can't watch TV shows anymore. I have seen someone die, I don't want to see that [on TV]. You don't want to remind yourself of it. Like in the 'Law and Order: Special Victims Unit.' I used to love that show. [Now] I can't watch it."*

Many students noted a change in the effectiveness of their previously established coping skills once clinical exposure began. For example, leaning on family support sources with varying levels of success. One student shared, *"It became hard to connect with my family as much just because they did not have any similar experiences."* Then, as nursing cohorts' bond, peer support emerges; shared stories during lunch breaks or late-night group chats offer validation that "*I'm not the only one*." One participant shared,

> *"One thing that's nice is the mentor program. It's nice to have somebody who's already experienced what you're going through. I'm doing that right now with a*

> *student in the second semester, and it's helpful to have somebody who understands what you're going through. So, I think that's a great system."*

With growing confidence, students seek faculty support, valuing instructors who normalize strong emotions and guide them toward processing emotions relating to the nursing world. One student shared,

> *"I've had a lot of faculty and especially clinical instructors who have been a big support. They're good at helping people manage stress. Even though my program has high expectations and is super competitive, I feel like there [are] golden professors at the same time [who] are understanding. I think it just takes reaching out to people. Professors can be a certain way in class, but if you reach out to them individually, they're usually kind."*

When scheduled debriefings are unavailable, participants created informal debrief spaces (car-ride conversations, late-night talks), demonstrating their initiative to process events collectively.

Students experiment with personal self-regulation tools. Exercise helps discharge adrenaline and restore sleep; journaling translates chaotic feelings into coherent narratives. Over time, they realize that each tactic (whether social or solitary) works chiefly because it fosters connection: to others, one's body, or a larger sense of meaning.

Comparing their coping "*then vs. now*," participants describe a shift from reactive, attempts based on pre-clinical experience to a deliberate, multi-layered toolkit that blends relational, spiritual, cognitive, and physical strategies, ultimately enhancing resilience to future clinical stressors. One participant shared the development of their perspective,

> *"Another piece of advice for people [who] go through secondary trauma [is] to know their limits. [For example,] I know I enjoy psych, but I also don't know if I could do it long term. I think a lot of nurses go; well, I'm always going to have these really bad jobs. They're going to be sad or gross or whatever it is. Things get better, and it's important to recognize that. Things always do get better, even if it's like the first couple weeks or months or whatever it is. It's hard. [Experience is] definitely like a little band-aid. Eventually, the scab gets smaller and smaller."*

Another participant relayed how they used spirituality to help deal with challenging stressors,

> *"There were a lot of days where I know it would've been easy to be like, 'how could this happen to some people?' Or, 'why did they have such a slow death?' Or 'why did I just get beat up?' But I think that our role as caretakers lets you get deeper insight into how the Savior views us. So, I would start shifts by praying that I would be able to see that. And even though they were still terrible, sometimes I was able to catch a glimpse of like, 'Oh, sometimes I'm probably a dementia riddled person to God compared to how great He is, and He still comes to help me.' So, I want to show that to these people who need help now. I think the spiritual aspect of my life improved a lot just because of the experiences that I was having."*

Another participant shared their journey coping with food throughout the nursing program,

> *"I used food for [coping] for a while. Like, I would come home and I wouldn't feel like making anything super healthy, and I just wanted something quick. So, I would eat ramen every day, which isn't bad, but it didn't help me feel good. I noticed a big difference between eating ramen or macaroni and cheese every day and getting fruits and vegetables in. So, I am trying more and more to have healthy food prepped when I come off of work so that it can be my quick food."*

Another participant shared the effect of prayer and mental preparation before their shift:

> *"I think that I got a lot better at specific prayer working in nursing. Just because I didn't want to be like, 'Oh, help it to be a good shift.' I mean, I did want it to be a good shift, but I needed a lot more help than that. So I would go and pray for the individual patients in my interactions with them. Also, just going through what was going to happen that day, mentally, was super good, and it helped me feel prepared to come on shift."*

One participant shared that social activities with peers were particularly helpful after hard shifts:

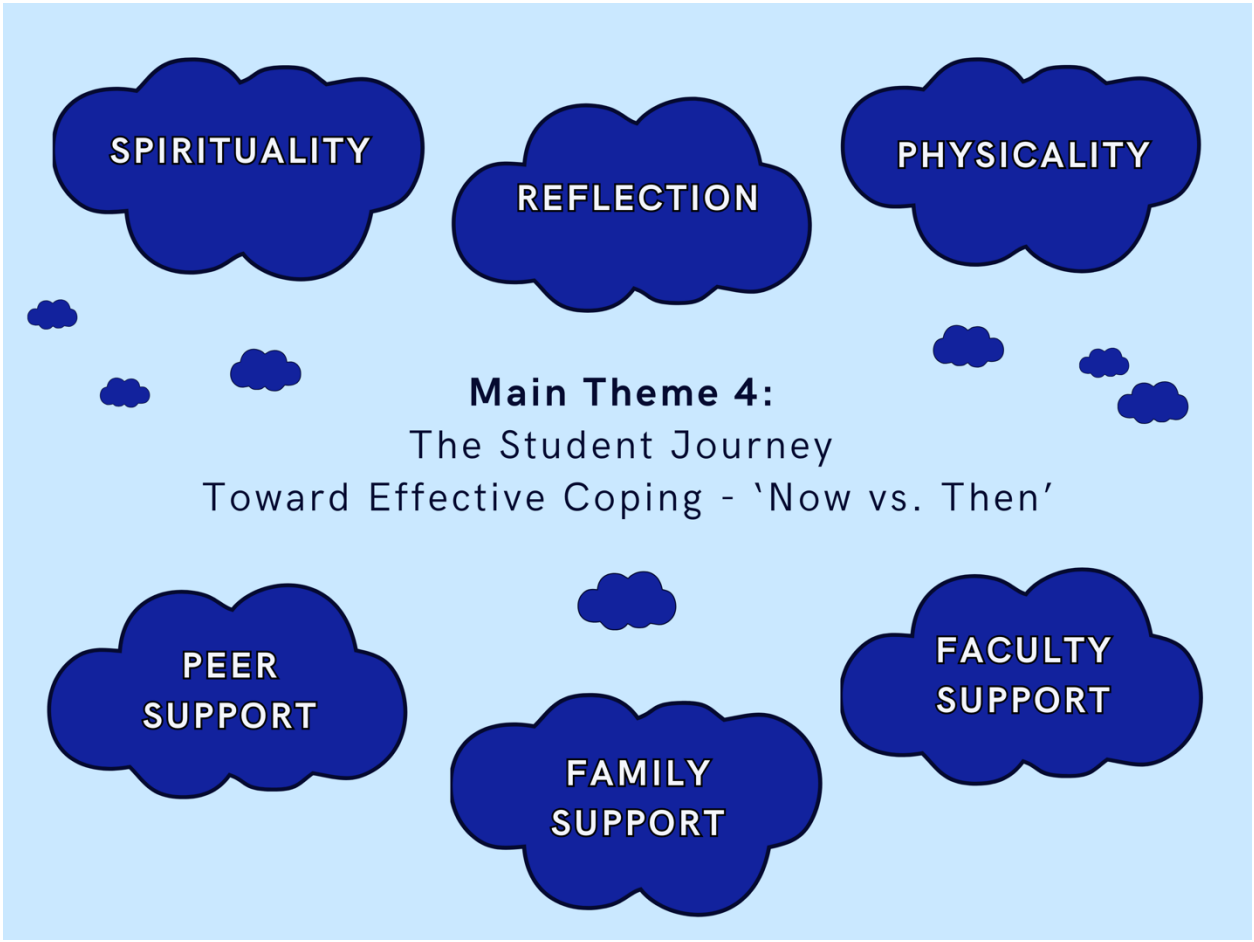
> *"One resource my university has is the clubs, and the social aspect has been super helpful because if something's stressful, you just get in a super serious mood, and then you can go to a club and everyone's laughing. Then you're like, 'Oh, I could've chosen to be goofy all this time...so why was I so heated before?' Maybe it takes your mind off of your work because if you're hanging out with your nursing friends, that's all we talk about."*

Another participant shared how mood tracking helped clue them in to when they may need some extra resources,

> *"I have a health app on my phone with reminders set up to track my mood twice a day. At four o'clock every day, I get a little buzz and it asks, 'How are you feeling? What's contributing to that?' In the moment I'm like, 'Hey, this is like one moment in time. That's dumb.'*
>
> *Then, you do it for a couple of months, and you can go back on the calendar and see this color-coded grid of how you've been feeling. So, I look at that, and if there's an overwhelming blue section that I can't necessarily tie to anything else, it would indicate that I need a little more help. I'm just so inside the boat I can't see it."*

See Figure 5.

Figure 5. *Main Theme 4 and Related Subthemes*

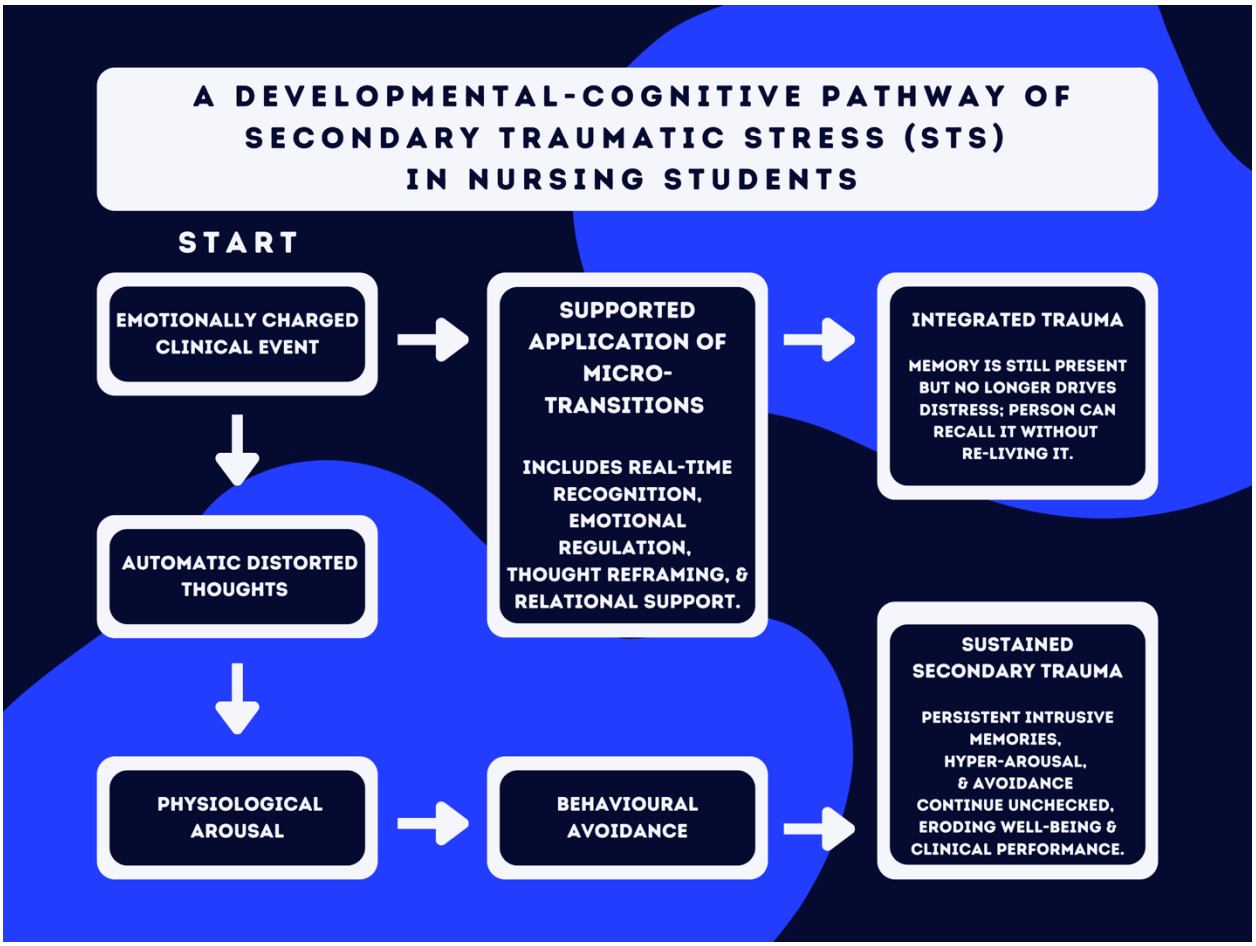


Discussion

A proposed developmental-cognitive lens on STS in students

Decades of theory position emerging adults as still consolidating emotional-regulation skills (Arnett, 2000; Erikson, 1968). Quantitative surveys confirm that nursing students report higher distress than age-matched peers (Gilroy et al., 2024), yet no prior study has provided a hermeneutic-phenomenological account of how those developmental vulnerabilities translate into real-time STS sequelae. This work documents a distinct developmental-cognitive pathway: 1) emotionally charged clinical events, 2) automatic distorted thoughts (Beck, 1976), 3) physiological arousal, and 4) behavioral avoidance. This cascade is illustrated in Figure 6.

Figure 6. *Proposed Developmental-Cognitive Pathway of Secondary Traumatic Stress*



Connecting hidden curriculum and attrition

Our participants described tacit messages of stoicism and hierarchy that compounded STS, echoing Irish findings that incidental *hidden-curriculum* learning pushes students to question their nursing future (Nagle et al., 2025). What our study adds is evidence that those tacit norms also intensify cognitive distortions and bodily hyper-arousal, creating a psychological context in which leaving the profession feels self-protective. This dovetails with Shaver and Viveiros's (2024) synthesis, which shows isolation and expectation–reality gaps as triggers for voluntary BSN withdrawal, and with Bennett et al.'s (2021) longitudinal audit in the United States demonstrating pipeline leaks long before licensure.

From stress to workforce risk

Burnout surveys already show that graduates in the United Kingdom enter practice physiologically depleted (Cottam et al., 2023). Our qualitative data clarify why: students absorb repeated micro-traumas without structured debriefing, then carry forward intrusive images and guilt. In line with Goddard and Jones's (2021) call for trauma-informed curricula, our findings provide concrete learner-derived targets: cognitive distortions, social disconnection, and freeze loops that educators can address directly in real-time (Substance Abuse and Mental Health Services Administration [SAMHSA], 2014).

Implications for pedagogy

Findings suggest a three-pronged strategy for redesigning undergraduate nursing education. First, they tell a developmental-cognitive model of student STS. In tracing the thought-emotion-behavior loops that students described, we can locate practical entry points for brief, cognitive-behavioral techniques (i.e., reframing automatic thoughts or using grounding exercises) and embed them in existing self-care modules rather than creating stand-alone courses.

Second, the data highlight the value of "*role micro-transitions,"* ideally during student clinical prebriefing and debriefing (Watson et al., 2024d, pp.1-11). Students linked spikes in STS to the frantic pace of clinical work and the absence of moments to switch mental gears between patients. Simple, low-cost cues that signal a role change (e.g., deep-breath check-ins, corridor reflections, or end-of-room huddles) could provide students with the psychological pause they need, aligning with evidence that intentional role-transition prompts reduce stress (Prescott et al., 2024; Watson et al., 2024d; Young et al., 2024).

Finally, our participants underscored the necessity of relational scaffolding at the point of care. Although many wellness initiatives occur in the classroom, students shared that the real crucible of stress is the clinical ward or unit, where supportive on-shift check-ins from preceptors make the difference between processing an event and silently carrying it forward. Training mentors to recognize early STS cues, and to offer brief, empathic conversations, may counteract the hidden-curriculum messages of stoicism and hierarchy that Nagle et al. (2025) found drive students away from the profession. In combination, these three interventions move trauma-informed pedagogy from abstract ideal to actionable practice.

Moving toward a sustainable change

This proposed developmental-cognitive model, empirical mapping of hidden-curriculum stressors, and actionable debriefing targets shift the conversation from *whether* undergraduate STS exists to *how* programs and faculty can help to dismantle the deleterious long-term effects. Without such upstream action, the voluntary attrition documented by Shaver and Viveiros (2024) and the vacancy projections identified by the RCN (2024) and the ICN (Buchan & Catton, 2023; Stewart et al., 2025) will persist. Embedding trauma-informed, CBT-aligned, and relationship-centred strategies in curricula and clinical placements is therefore not remedial but essential to workforce sustainability (Buchan & Catton, 2023; SAMHSA, 2014; Stewart et al., 2025).

Strengths

The hermeneutic-phenomenological design uncovered the lived texture of secondary traumatic stress in a way that surveys or purely descriptive interviews cannot. Moving repeatedly between single quotations and the whole narrative allowed us to expose tacit beliefs, bodily sensations, and cultural cues that shape students' distress. This depth produces practice-proximal

knowledge, enabling educators to pinpoint when cognitive distortions or freeze responses occur and to intervene in real-time.

An analytical team with international and multidisciplinary members from nursing, psychology, social work, and pedagogy engaged in reflexive memo writing and peer debriefing. Multiple professional lenses reduced single-discipline bias and enriched thematic construction, enhancing the credibility of the findings.

Detailed accounts of program structure, placement patterns, and stoic cultural expectations help readers in other training systems judge how closely the context matches their own. Although the work was completed in one U.S. setting, the scripts students described mirror patterns reported in the United Kingdom, Ireland, and the Asia-Pacific region, supporting conceptual transferability to comparable high-income environments.

Participants identified not only what harmed them but also what helped, and at what moment. These data highlight developmental pressure points for brief cognitive-behavioral techniques, micro-transition cues, and mentor check-ins that can be embedded in existing curricula at minimal cost.

Limitations

Several limitations inherent to the study design are acknowledged. Interviews capture experience only once. Longitudinal studies are needed to track how coping toolkits grow or erode over semesters and into early practice. Participation was voluntary, so silent or marginalised students may hold different stress trajectories. Future work could combine cohort-wide screening with opt-in diaries to broaden representation. Findings are based on one faith-integrated campus that offers an optional stress-management course. Programs with different

cultures or resource levels may exhibit varying dynamics. Replication across multiple sites will strengthen generalisability.

Recommendations for Future Research

The authors recommend that future research assess specific, structured clinical debriefings, peer-support curricula, and faculty STS literacy training and compare impacts on stress perception, compassion satisfaction, retention, and early career persistence. Comparative studies across diverse nursing program structures and cultural contexts could further illuminate the role of institutional culture in moderating STS vulnerability and coping mechanisms.

Nursing implications

To address STS in the emerging nursing workforce, faculty, clinical educators, and institutions should consider implementing the following action items. See Figure 7 for one proposed plan of action.

Figure 7. *Proposed Action Plan for Stakeholders*

In addition to this action plan, the authors suggest the following supportive measures to create a climate that encourages ongoing advocacy for the nursing workforce at all levels of experience in practical applications.

Intentional Psychoeducation and Normalization of Emotional Experiences

Research indicates that psychoeducation on topics such as trauma and STS can significantly mitigate the harmful effects of these conditions (Ghafoori et al., 2016). For example, a study by Lee and Rawlings (2021) found that young adults who participated in group-based psychoeducation developed greater resilience, enabling them to prevent or even reverse the psychological impact of potentially traumatic events. This type of intervention can be effectively delivered through collaboration with school counseling services. By integrating

psychoeducation into group therapy settings or offering lectures led by mental health professionals or trained educators, schools can provide students with essential knowledge and coping skills to address prevalent mental health challenges.

Normalization of emotional experiences can happen in conjunction with psychoeducation groups and/or lectures. Additionally, regular integration of emotional debriefs and open discussions about emotional experiences in the clinical setting could be extremely beneficial in the normalization process. When professors are willing to share their own experiences with authenticity, it helps students feel seen, validated, and less alone in their emotional responses. Although discussion on and vulnerability around difficult experiences can be challenging, simply normalizing the experience will encourage and enable students to seek needed help and support in times of need (Biondi et a, 2021).

Preparation via nursing simulation

Simulation training should explicitly include scenarios addressing potential secondary traumatic experiences. Facilitators must guide role-playing exercises and structured discussions, enabling students to navigate emotionally challenging clinical situations safely. Furthermore, facilitators must be trained in trauma-informed practices to create supportive and psychologically safe simulation environments (Watson et al., 2024a; Young et al., 2024).

Establish context-specific coping plans

Students should develop tailored coping plans for resource-limited and resource-abundant clinical environments. Institutions should encourage the regular rehearsal of emergency coping algorithms. Students should be guided to actively leverage available support systems, including peer networks, faculty mentorship, familial relationships, and personal or spiritual practices, enhancing their overall resilience (Prescott et al., 2024; Watson et al., 2024b; Watson et al.,

2024c). Organizations may also model these practices upon hire and during annual check-ins with nursing employees.

Coping skills grounded in Cognitive Behavioral Therapy (CBT) can be effectively taught to students to reduce the impact of cognitive distortions and strengthen their emotional resilience. One widely used and accessible CBT intervention is the thought record, which guides students through a structured reflection process. When experiencing spiraling thoughts, students are prompted to identify the triggering event, their automatic thoughts, associated emotions, and the specific cognitive distortion involved. They then rate how strongly they believe the thought and then proceed to generate more balanced, evidence-based responses to automatic thoughts. This practice helps students slow down the escalation of negative thinking and regain a sense of control. In naming both their emotions and the underlying distortion, students become better equipped to manage unhelpful thoughts before they intensify. Guided thought records can be accessed for free on the Beck Institute website (Beck Institute for Cognitive Behavioral Therapy, 2018).

Acceptance and Commitment Therapy (ACT) also provides easy-to-use coping tools. ACT emphasizes mindfulness and can teach individuals how to detach from unhelpful thoughts rather than attempting to eliminate them. One simple and accessible ACT technique is *Leaves on a Stream*, a guided imagery meditation that can be easily found online. In this exercise, participants visualize placing each thought on a leaf and allowing it to float down a stream gently. The goal is to observe thoughts without judgment and practice letting them pass without attaching meaning or personal value. This intervention helps students reduce the emotional weight of distressing thoughts, fostering psychological flexibility and allowing them to navigate difficult experiences with greater ease (Harris & Hayes, 2019). For example, a 12-session online

ACT program guided by Utah State University in the United States is readily accessible and can be easily integrated into student coursework (Utah State University, n.d.).

Practice role micro-transitions

Educational programs should explicitly teach students deliberate methods for managing mental and emotional role micro-transitions between clinical responsibilities and personal life. Techniques such as cued task-switching, mindfulness exercises, intentional awe, and journaling can facilitate emotional regulation and reduce residual stress. Early development of a professional nursing identity should also be fostered, enhancing students' personal resilience and professional clarity (Watson et al., 2024d; Watson et al., 2024e). These techniques can be incorporated into the curriculum through simulation or pastoral sessions. This could be further supported by unit or ward educators, as well as offering paid workshops as part of employee wellness efforts for practicing nurses (Foster et al., 2021).

Engage in healthy workplace advocacy

Curricula should emphasize that advocacy for healthier clinical environments must complement individual self-care strategies. Nursing programs should encourage students to participate in discussions about organizational culture proactively. Novice nurses should be familiar with engaging with nurse well-being initiatives to promote comprehensive professional resilience and workplace wellness (Watson et al., 2024f). Beyond the academic setting, preliminary evidence suggests organizations employing practicing nurses may support and facilitate this through transparent efforts to assess, improve, and maintain aspects of a healthy work environment. One cost-effective resource for such efforts can be found in the American Association of Critical Care Nurses' (2025) *Healthy Work Environment Assessment Tool*

(HWEAT). Appointing a nursing work environment council or several individual change agents is advisable to promote employee engagement in this arena (Ramkaew et al., 2024).

Strengthen practical coping skills before workforce entry

Explicit coping skills training should be integrated consistently throughout nursing curricula, focusing on practical methods to effectively manage stress and emotional responses. Students should be supported in proactively identifying internal and external coping resources, ensuring preparedness to handle professional stressors successfully upon entering the nursing workforce (Watson et al., 2025a; Watson et al., 2025b). Implementing these evidence-informed actions can enhance nursing students' resilience, emotional intelligence, and preparedness for the emotional complexities of professional nursing practice. Novice nurses who have not experienced such opportunities will benefit from a supportive mentor, unit educator, and nursing manager (Najafi & Nasiri, 2023a; 2023b; Wang et al., 2024). A needs assessment upon hire is advisable to direct priorities and ongoing evaluation of nurse well-being.

Conclusion

Secondary traumatic stress in undergraduate nurses unfolds as a predictable cascade: a jolting clinical event ignites distorted thoughts, those thoughts accelerate bodily arousal, and the resulting tension pushes students toward quiet avoidance. Left unchecked, the loop hardens into sustained trauma that shadows learning, performance, and, ultimately, career commitment. Our study shows that the loop is also interruptible. When educators and preceptors coach students to notice the first spike of emotion, steady their breathing, re-frame the thought, and exchange a brief word of support, the same experience can be woven into memory without hijacking it. Real-time interventions, therefore, become the hinge on which long-term outcomes turn. What this means for nursing education is straightforward but urgent: trauma-informed programs must

move beyond classroom wellness talks and into the minute-to-minute texture of clinical placements, where role micro-transitions, mentor check-ins, and quick cognitive tools are treated as essential parts of safe practice. If we normalize such supports and abandon the hidden demand for stoic endurance, STS transforms from a silent attrition driver into a structured opportunity for resilience building, protecting both today's learners and tomorrow's nursing workforce.

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