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# Nurses' lived experiences of self-control in emergency settings: a qualitative study

Mehraban Shahmari 10, Seemin Dashti 20, Mahsa Jafari 30 and Fatemeh Ebrahimi Belil 4\*0

#### **Abstract**

**Background** Given nurses' vital role in emergencies, it is essential to understand their perceptions and strategies for self-control. This study examines nurses' experiences and insights regarding self-control during high-pressure scenarios. The findings could inform the development of effective stress management strategies and enhance nursing training programs, ultimately improving patients' overall quality of care.

**Methods** This study utilized a qualitative, descriptive design with a content analysis approach. Data was collected through semi-structured interviews with 24 nurses in various wards of five university-affiliated hospitals, including [specific wards, e.g., emergency, intensive care, internal, etc.]. The nurses were selected using a purposive sampling technique, and the data were analyzed through qualitative content analysis.

**Findings** Nurses' lived experiences and understanding of self-control in emergencies revealed three main categories, each comprising several sub-categories: Managing Emotional Intelligence in Crisis Situations (Emotion Regulation in Critical Situations, Using Resources and Experiences for Emotion Management, and Control of Individual Emotions), Adherence to Principles in Crisis Situations (Compliance with Ethical Standards, Ethical Decision-Making, Patient-Centered Focus, and Effective Communication), and Self-Control in Managing Stress and Fatigue (Fatigue Management and Interpersonal Interaction and Collaboration).

**Conclusion** This study highlights the importance of self-control for nurses working in high-stress environments. It emphasizes that enhancing emotional intelligence, adhering to professional standards, and effectively managing stress are crucial for overcoming workplace challenges. These factors not only foster resilience but also support self-control, which is essential for maintaining composure and making informed decisions during emergencies. The findings advocate for creating supportive work environments and implementing evidence-based policies to improve nurses' self-control skills, ultimately leading to better patient outcomes. These insights can guide enhancements in nursing education and overall care quality.

Keywords Nurse, Content analysis, Emergency nursing, Self-control, Emotional intelligence, Qualitative research

\*Correspondence: Fatemeh Ebrahimi Belil sara.1381@yahoo.com

<sup>1</sup>Department of Medical-Surgical, School of Nursing and Midwifery,

Ardabil University of Medical Sciences, Ardabil, Iran

<sup>&</sup>lt;sup>4</sup>Department of Medical-Surgical Nursing, School of Nursing and Midwifery, Ardabil University of Medical Sciences, Ardabil, Iran



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Department of Nursing, Ardabil Branch, Islamic Azad University, Ardabil,

<sup>&</sup>lt;sup>3</sup>School of Nursing and Midwifery, Ardabil University of Medical Sciences, Ardabil, Iran

# **Background**

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In emergency scenarios like severe trauma, heart attacks, strokes, and acute abdominal issues, nurses are essential for patients suffering from these emergencies. They provide immediate assessment and intervention, requiring swift decisions to ensure timely care. Despite operational and ethical challenges in fast-paced environments, nurses remain crucial in stabilizing patients [1–3]. For instance, nurses often face dilemmas such as balancing patient autonomy with beneficence or addressing shortages of essential supplies and equipment, which complicate their decision-making process [4].

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Research on self-control predominantly stems from psychology and social work; however, studies within the nursing theoretical framework highlight the critical role of emotional intelligence in mitigating burnout and stress among nurses. For instance, Musio et al. (2024) demonstrate the impact of emotional intelligence on nurses' professional quality of life in prehospital emergency settings, emphasizing its significance in high-pressure environments [5].

In high-stakes situations, the ability to utilize self-control skills is vital as it directly influences patient outcomes and nurses' well-being. Self-control involves managing actions and regulating unwanted behaviors and emotions [6]. Furthermore, self-control is intricately linked to experiencing meaning in life—a connection particularly relevant in nursing. Research shows that finding meaning at work enhances nurses' resilience [6], which improves their capacity to cope with professional demands. This skill allows nurses to focus on long-term goals despite immediate challenges by effectively managing their attention, emotions, and behaviors [7, 8].

Nurses with low self-control may struggle to manage their emotions, leading to inadequate behaviors that affect their ability to care for themselves and others. For example, these behaviors might include poor communication, increased stress levels, and a lack of self-care, which can negatively impact personal well-being and patient care [9]. Nurses with high self-control can acknowledge their negative emotions and motivations, making rational decisions under pressure while maintaining composure [10, 11]. Emotional intelligence, an essential element of self-control, is critical in mitigating burnout and stress while enhancing compassion satisfaction [5]. Additionally, improving self-control skills can lead to enhanced problem-solving abilities, thereby boosting nurses' quality of training and clinical competencies [12].

Understanding nurses' perceptions of their vital role in self-control and strategies for managing it in emergencies can help identify various challenges they face, including psychological, emotional, and situational factors. This comprehensive understanding ultimately aims to reduce stress and job burnout. By adding various experiences, we ensure that all relevant insights are captured, providing a holistic view of the challenges nurses encounter in high-pressure environments. Recognizing effective self-control techniques can also improve patient safety and care quality. While existing studies have explored stress, coping strategies, and resilience among nurses in various settings, more information is needed on how nurses comprehend and apply self-control in these contexts [13–15].

Consequently, this study addressed a specific gap in the existing literature by exploring nurses' lived experiences and perceptions of self-control during emergencies using qualitative methodology and content analysis. Previous studies have primarily relied on quantitative methods or observational data, which may not fully capture the nuanced experiences of nurses under pressure. A qualitative approach, specifically content analysis, can effectively gather participants' experiences and insights [16, 17]. The findings from this study could contribute to developing self-control strategies for stress management in these contexts, enhance nurses' training programs, and improve patient safety.

#### **Methods**

Qualitative research is essential in nursing and healthcare, providing insights into complex phenomena through detailed interpretations of participant experiences [17]. In this qualitative descriptive study, we employed a qualitative content analysis approach, following the Consolidated Criteria for Reporting Qualitative Research (COREQ) guidelines [18]. This method was chosen for its ability to uncover conflicting viewpoints and unresolved questions regarding the meanings and applications of nursing practices and patient care [19]. Qualitative content analysis is crucial as it allows for an in-depth exploration of the intricate ideas and perceptions within nursing. Its interpretive nature helps reveal subtle meanings in the data, which is vital given the complexities of healthcare [16, 17]. While this method aims for structured findings, it remains inherently subjective, relying on researchers to effectively manage their biases. By analyzing manifest and latent content, we gain a richer understanding of participants' meanings, constructing insights that honor the complexity of their narratives [19, 20]. Data were collected from different wards of five university-affiliated hospitals.

## **Participants**

Participants were selected through purposive sampling based on specific inclusion criteria: possessing a bachelor's degree in nursing or a higher academic qualification, being willing to communicate and share their insights, and having experience providing care to patients in emergencies. The researcher arranged the time and location of the interviews by effectively communicating with the participants and clarifying the study's purpose. The interviewer and participants were not previously acquainted. In total, 24 nurses aged between 20 and 45 participated in the study. Among them, 19 were female. All participants held at least a Bachelor of Nursing Science (BNSc), with some pursuing or completing Master of Nursing Science (MNSc) programs. Participants' job statuses varied, including permanent, contractual, and obligations related to mandatory service. Their work experience ranged from 1 to 20 years, showcasing a diverse array of expertise within the nursing profession. The participants were distributed across several units, including Internal Medicine, General, Infection, Emergency, Dialysis, Cardiac Care Unit (CCU), Intensive Care Unit (ICU), and the Operating Room. This diversity in experience and clinical settings may influence the results, as varying levels of expertise can lead to different perspectives on patient care and emergencies. For instance, novice nurses may have other insights than their more experienced counterparts, potentially affecting the depth and breadth of the data collected. To ensure a balanced representation of experiences, novice and experienced nurses were included, allowing for a richer understanding of the challenges and insights across different stages of their careers. Participants were informed of their right to withdraw from the study at any time without any consequences. This option was communicated before the interviews, ensuring participants felt comfortable and supported throughout the research.

# **Data collection**

The first author (MSh) conducted comprehensive semistructured interviews over three months in 2024, focusing on nurses' perceptions and strategies for self-control during high-pressure scenarios. With 14 years of clinical nursing experience and a PhD in Nursing, MSh served as an Assistant Professor, supported by three other faculty members in nursing. Interview guide questions were developed based on existing literature [6, 21] and the researchers' professional insights.

Twenty-four face-to-face interviews were conducted at the participants' workplaces, averaging 47.5 min (ranging from 35 to 60 min). The interviews began with general questions and progressed to more specific inquiries aligned with the study's objectives (see Table 1).

Data saturation [17] was achieved through a systematic process:

**Number of interviews** A total of 24 interviews is sufficient for qualitative studies, allowing for a comprehensive exploration of diverse experiences and perspectives among nurses.

Iterative data collection and analysis Data were analyzed concurrently with the collection, enabling researchers to identify emerging themes and explore them more deeply in subsequent interviews. By the twentieth interview, the main themes had been established, and later interviews did not yield new information, indicating that data saturation had been reached.

**Unexpected themes** During analysis, unexpected themes emerged, particularly regarding the impact of nurses' personal experiences on their ability to manage stress and fatigue in high-pressure situations. This finding highlighted the significant role personal experiences play in nurses' self-control.

Table 1 Interview guide

Question

1. Please share your experiences related to patient care.	Can you describe a specific situation that was particularly challenging? How did you handle it?
2. Can you describe an acute or emergency patient care shift?	How do you prepare yourself mentally and emotionally for such shifts? What strategies do you use to stay focused during high-pressure situations?
3. How do you manage your emotions to ensure they do not impact your performance in emergencies?	What techniques or methods have you found effective in controlling your emotions? Can you share an example of how managing your emotions positively influenced patient care?
4. Have you ever prioritized your personal opinions or feelings over the hospital's legal regulations and ethical standards?	Can you provide an example of when this occurred? How did you balance your personal feelings with professional responsibilities?
5. How do you handle physical or mental exhaustion from working in a high-stress environment, especially when taking on new responsibilities?	What specific practices or routines help you cope with fatigue and stress? How do these practices affect your ability to perform your duties effectively?
6. What does self-control mean to you? Please explain.	How do you apply self-control in your daily work as a nurse? Can you share an instance where self-control was critical in managing a challenging situation?
7. The interview proceeded with additional probing questions to clarify and extract more detailed information, such as:	"What do you mean by that?" "Can you elaborate further?" "Could you provide some examples?"
8. Finally, participants were asked:	"Is there anything else you want to add?"

**Probing Questions** 

**Final assessment of saturation** Data saturation was confirmed when no new themes or insights emerged from the final interviews. This assessment involved careful monitoring of theme frequency and repetition across interviews.

# **Data analysis**

This study adhered to the five-step framework proposed by Graneheim and Lundman (2004) to conduct a rigorous qualitative content analysis [19, 22, 23]. First, interviews were fully transcribed immediately after completion, ensuring accurate documentation of participants' responses. The transcripts were then read multiple times to identify key nuances and patterns, forming the foundation for subsequent coding. Semantic units were defined in the third step, with basic codes assigned to encapsulate their core meanings. These initial codes were systematically grouped into broader categories, merging related meaning units to reveal latent content and deeper insights. This process went beyond surface-level labeling, synthesizing connections to illustrate overarching themes. Further analysis revealed central categories, capturing the essence of participants' lived experiences and enriching the interpretive framework. The process of coding and forming main categories is outlined in the Supplementary Information.

Data saturation occurred when no new categories or insights emerged from data collection and analysis, ensuring a comprehensive understanding of nurses' perceptions and self-control strategies in emergency nursing [17]. MAXQDA version 20 software facilitated data organization and interpretation, enabling visual mapping of relationships among codes and categories. The study also addressed its ontological and epistemological underpinnings, enhancing credibility through transparent methodology. The analysis conveyed thematic depth by integrating condensations within sub-categories, offering robust and reliable findings grounded in qualitative rigor [22].

# Trustworthiness and rigor

To ensure the trustworthiness and rigor [24] of the data throughout the study, the researcher focused on the following criteria:

(a) Credibility: The researcher engaged extensively with participants and the data to foster a deeper understanding. Findings were shared with participants for validation and feedback, facilitating a dialogue that aimed to mediate the most likely interpretations of their experiences. (b) Dependability: Sufficient time was allocated for thorough data collection, and continuous interaction with the data was maintained throughout the research process. The research team conducted rigorous reviews of all research phases to ensure consistency. (c) Confirmability:

Extracted codes were collaboratively reviewed by the team to enhance reliability. Any disagreements regarding themes were resolved through discussion to reach a consensus. (d) Transferability: Participants were chosen for their diversity to enhance the applicability of findings in similar communities. A thorough description of the research process, participant characteristics, and context was provided to facilitate understanding. (h) Authenticity: The research process and data management were audited by peers to bolster credibility. Comprehensive records of all study phases were kept for future reference, ensuring transparency and authenticity in the research findings.

To further enhance trustworthiness, we implemented several strategies to refine our understanding throughout the research process continuously:

Reflexivity: The research team maintained a reflexive journal to document thoughts, biases, and assumptions, allowing for critical reflection on how these factors might influence interpretations. Member Checking: Preliminary findings were shared with participants for validation and feedback, ensuring our interpretations accurately reflected their experiences. Collaborative Analysis: Data coding and categorization were conducted collaboratively among team members, incorporating diverse perspectives to mitigate individual biases. Continuous Engagement with Data: We regularly revisited transcripts and emerging themes, refining our understanding and interpretations based on new insights. By employing these strategies, we aimed to ensure our analysis reflected participants' lived experiences and was robust in trustworthiness.

# Ethical approval and consent to participate

The study received ethical approval from the ARUMS Research Council Ethics Committee (reference code IR.ARUMS.REC.1402.394). Informed consent was obtained from all participants, who were fully informed about the study's objectives and their right to withdraw at any time. Participants were free to choose the time and location of their interviews, and consent was secured for recording. Confidentiality and anonymity were prioritized; identifiable information was not collected, and data was anonymized. Recorded interviews and related data were securely stored and accessible only to authorized personnel to maintain trust and encourage open participation.

# **Findings**

Nurses' lived experiences and understanding of self-control in emergencies are classified into three main categories and nine sub-categories (refer to Table 2).

**Table 2** Results overview: main categories and sub-categories

Main categories	Sub-categories
Managing Emotional Intelligence in Crisis Situations	Utilizing Emotion Regulation in Critical Situations
	Using Resources and Experiences for Emotion Management
	Controlling Individual Emotions
Adherence to Principles in Crisis Situations	Complying with Ethical Standards
	Making Ethical Decisions
	Prioritizing Patient-centeredness
	Engaging in Effective Communication
Self-Control in Managing Stress and Fatigue	Implementing Fatigue Management Strategies
	Engaging in Interpersonal Interaction and Collaboration

#### Managing emotional intelligence in crisis situations

This category encompasses nurses' application of emotional intelligence and emotion management during critical and stressful situations. Emotional intelligence is crucial for recognizing, regulating, and managing emotions—both personal and those of others—especially in emergencies. The category is divided into three sub-categories: regulating emotions, utilizing resources and experiences to manage emotions, and controlling personal emotions.

**Utilizing emotion regulation in critical situations** Nurses emphasized the importance of effectively regulating emotions for self-control during critical situations. This sub-category focuses on managing immediate emotional responses in high-pressure scenarios to ensure optimal decision-making and effective patient care. Participants described self-control as the ability to regulate feelings such as anxiety and anger in real time, preventing these emotions from interfering with professional responsibilities. They highlighted the necessity of maintaining calmness and focus during stressful moments.

For example, during CPR, I experience intense emotions where every second counts. I recall one instance when I said, "In critical situations, I find myself facing intense emotions and the need for quick decision-making that can truly impact my effectiveness." (P11).

One participant stated, I recognize self-control in managing our anger when interacting with patients or their families in critical situations. (P5).

Another added, In my opinion, the key is to remain calm. If we lose our composure, we risk leaving things unresolved. (P15).

However, some nurses also shared experiences where they struggled with self-control. For instance, one nurse recounted a situation where overwhelming stress led to frustration during a critical procedure, impacting communication with a colleague and delaying patient care.

This understanding underscores the critical role of emotional regulation in enabling nurses to address patient needs, even in unpredictable situations effectively.

Using resources and experiences for emotion management According to the nurses' statements, self-control involves drawing on personal experiences and past training, which are effective strategies for managing emotions and stress in critical situations. One participant shared, "In emergencies where we face resource or time constraints, I draw on my past experiences to act more calmly. I often think back to similar challenges, allowing me to navigate the current situation more effectively. (P9)" Nurses utilize these resources to make appropriate decisions and respond correctly when faced with new and unexpected challenges. This approach enhances their confidence and allows them to leverage past experiences to improve their performance.

In emergencies, I take a calming breath and reflect on past experiences to maintain self-control. (P13).

# Another participant mentioned:

Self-control involves using methods to manage emotions, like relaxation techniques and seeking input from colleagues. (P24).

Controlling individual emotions This sub-category emphasizes the ability to separate personal emotions from professional responsibilities, which is crucial for nurses' self-control. It focuses on the long-term practice of maintaining boundaries between personal challenges and work obligations. Nurses believe that distinguishing personal feelings from professional duties allows them to respond more accurately and efficiently to patients' needs in critical situations.

One participant expressed, "I remind myself that personal problems should not affect my work performance." (P21) Another nurse noted, "During CPR, I reminded a colleague to manage emotions to maintain composure." (P20).

However, there are instances where personal emotions have seeped into their professional roles, leading to difficulty in maintaining focus. For example, one nurse shared, "When I was caring for a terminally ill patient, I had to suppress my personal feelings to provide the best possible care, reminding myself that my emotions could interfere with their needs. (p12)" Another nurse recounted when she lost her composure during a family tragedy, which momentarily affected her ability to provide care.

By effectively managing their emotions over time, nurses can concentrate on patient care without letting personal issues interfere with their performance.

#### Adherence to principles in crisis situations

Adherence to professional and ethical principles in critical situations is vital to nursing practice. It represents a form of self-control that reflects nurses' commitment to delivering optimal patient care. Nurses frequently encounter ethical dilemmas during emergencies, such as conflicts between patient needs, family expectations, and institutional protocols. Navigating these challenges requires a strong foundation in Compliance with Ethical Standards, Ethical Decision-Making, Patient-Centered Care, and Effective Communication.

# Complying with ethical standards

Participants' views indicate that all nurses must exercise self-control in sensitive situations, focusing on professional, ethical, and legal principles. Most of them indicated that legal and ethical aspects in all decisions and actions taken should be of primary importance concerning patient well-being. One of the respondents said, "Self-control means doing what is right for the patient based on professional principles." (P18). This illustrates their emphasis on greatly unrooted in-depth and considerate motives in the face of decision-making, which is never simple.

Self-control is at the center of many professional dilemmas for nurses during emergencies, such as when there is a need to provide care urgently but the patient or family is not supportive. A nurse articulated, "I always make decisions based on ethical principles, even in critical situations." (P8).

The participants highlighted that commitment to ethical advocacy enables them to manage problematic cases where conflicts are paramount while ensuring that all the decisions taken are in the patient's best interests. Another nurse stated, "In difficult situations, I remind myself of the ethical guidelines to keep my focus on what truly matters." (P12).

## Making ethical decisions

Making correct decisions in emergencies is crucial for nurses' self-control. This category addresses the process of making timely and effective decisions under pressure, particularly in situations where ethical standards must be upheld. Nurses prioritize immediate actions that benefit the patient while adhering to ethical guidelines. They must quickly assess situations, manage time effectively, and ensure their choices reflect ethical principles.

Self-control is the ability to make decisions in critical situations, prioritizing the patient's best interest. (P3).

In high-pressure situations, I focus on ethical guidelines to guide my choices, especially when faced with conflicting demands from family members and hospital protocols. (P6).

Nurses often face dilemmas such as deciding whether to prioritize a patient's immediate medical needs over their expressed wishes or dealing with conflicting demands from family members. Their self-control enables them to remain focused on ethical guidelines, leading to better patient outcomes.

# **Prioritizing Patient-centeredness**

A patient-centered approach is crucial for nurses as it directly impacts their ability to manage anxiety and deliver optimal care. Participants expressed that focusing on patients' needs allows them to navigate high-pressure situations more effectively. This attentive approach creates a supportive environment where nurses can respond compassionately, ensuring that patient welfare is prioritized.

One nurse shared, "When I am engaged with my patients, it is easier to forget my stress and focus on what they need." (P6) This indicates that immersing themselves in the patients' experiences not only enhances care but also alleviates personal anxiety. Another participant noted, "It is about seeing the whole person, not just the medical issue—this helps me connect and stay calm." (P9) This perspective underscores the importance of viewing patients holistically, fostering deeper relationships and professionalism in care delivery.

Additionally, a participant emphasized, "Every time I take a moment to listen to my patients, I feel more centered and effective." (P3) This highlights the value of active listening, which enhances both the nurse-patient relationship and the nurse's well-being. Another nurse stated, "When I prioritize my patients' stories, it transforms my anxiety into a sense of purpose." (P7) This illustrates how connecting with patients personally provides meaning and reduces stress during challenging times.

The emphasis on patient-centeredness highlights how prioritizing patients' needs can significantly reduce nurse stress and anxiety. By concentrating on the individuals they care for, nurses create a nurturing environment that facilitates transparent decision-making and enhances the overall quality of care without overlapping with ethical adherence.

### **Engaging in effective communication**

Establishing communication and trust with patients and their families during critical situations is crucial for nurses' self-control. This sub-category focuses on how professional communication enhances patient outcomes and helps nurses manage their emotions effectively. By engaging in empathetic and supportive dialogue, nurses can reassure patients, fostering a sense of safety and trust that is essential for optimal care.

One participant expressed, Proper communication is vital to ensure patients feel supported. (P11).

Another nurse emphasized, Building rapport with patients helps in managing my own emotions. (P2).

Effective communication is key when navigating ethical dilemmas, such as when family members disagree with medical decisions or when a patient's condition changes rapidly. By maintaining open lines of communication, nurses can help alleviate tensions and foster a collaborative environment, which is crucial for emotional stability.

In summary, adherence to professional and ethical principles—including Ethical Advocacy, Ethical Decision-Making, Patient-Centered Care, and Effective Communication—plays a pivotal role in nurses' self-control during emergencies. By following these principles, nurses can navigate their ethical dilemmas, ultimately providing the best care in complex situations and fostering trust with their patients.

#### Self-control in managing stress and fatigue

Managing stress and fatigue in the workplace is a significant challenge for nurses in critical and emergency departments. The ability to effectively handle stress and fatigue is essential for maintaining the quality of care they provide and preventing physical and psychological injuries that can arise from prolonged work. Therefore, nurses view the management of stress and fatigue in their work environment as a form of self-control. This category encompasses two sub-categories: Implementing fatigue management strategies and engaging in interpersonal interaction and collaboration.

# Implementing fatigue management strategies

Nurses prioritize tasks and collaborate with colleagues to manage fatigue effectively. This management is crucial in high-stress environments, directly impacting their ability to provide quality care. By breaking down tasks and sharing responsibilities, nurses can mitigate the effects of fatigue on their performance.

Fatigue significantly impacts self-control. We can manage fatigue more effectively by breaking down tasks and sharing patient care. Non-urgent medications can be administered after stabilizing the patient, enhancing care while managing our conditions. (P17).

#### Another participant stated:

Managing fatigue is crucial; it helps us think clearly and prioritize. (P16).

# Engaging in interpersonal interaction and collaboration

This sub-category highlights the significance of interaction and teamwork among colleagues during critical situations, viewing it as an essential aspect of self-control. Effective collaboration alleviates stress and fatigue and enhances the overall quality of patient care. By working together, nurses can share responsibilities, seek assistance, and improve team performance in high-pressure environments.

I need self-control to communicate and collaborate effectively with all colleagues in critical situations. (P22).

#### Another nurse added:

Teamwork is essential; it distributes the workload and improves our response. (P23).

# Discussion

This study aimed to explore nurses' lived experiences of self-control in emergency settings. The findings indicate that nurses' understanding and self-control experiences—especially in emotional intelligence management, adherence to professional and ethical principles, and managing stress and fatigue—are crucial factors in improving the quality of care and preserving their mental health. These results emphasize the different aspects of nurses' self-control when faced with crises and stressful situations.

Understanding the influence of organizational culture on these competencies is vital, as it sets the framework within which nurses operate and develop their selfcontrol skills [25]. In this context, managing emotional intelligence is crucial for nurses in critical situations. This enables nurses to regulate emotions and effectively respond to patients' needs amid job-related stress. Participants in this study indicated that managing emotions in high-pressure situations, such as during mass casualty incidents or when caring for patients at the end of life (those nearing death due to advanced illnesses), and utilizing resources and experiences to navigate emotional challenges is crucial to emotional intelligence management. Additionally, research indicates that emotional intelligence positively influences the quality of patient care, with studies showing that nurses with higher emotional intelligence make better decisions and manage patients more effectively [26, 27].

Furthermore, enhancing emotional intelligence skills has been shown to alleviate stress and fatigue among nurses, leading to improved overall quality of care [28]. This improvement in care quality is linked to better emotional regulation and self-control, which are components of emotional intelligence. Effective emotional regulation enhances not only the quality of patient care but also the personal well-being of nurses by allowing them to manage their emotions more effectively in high-pressure situations [29, 30]. This ability to regulate emotions through self-control supports mental health resilience and reduces burnout among healthcare professionals.

In emergency nursing, higher emotional intelligence has been linked to lower job stress and greater job satisfaction, emphasizing the potential advantages of emotional intelligence training in various nursing settings [5]. Moreover, the ability of nurses to manage emotions such as anxiety and anger plays a critical role in the quality of care. Studies suggest that nurses who control their emotions are more adept at meeting patients' needs [27, 31]. However, it is important to note that excessive emotional attachment to patients can complicate emotional regulation [32, 33]. While emotional intelligence can improve nurses' quality of care and job satisfaction, they may still face challenges in regulating their emotions. For example, during a high-stress emergency like a mass casualty incident, a nurse may feel overwhelmed, leading to ineffective communication with colleagues and delays in patient care. These lapses in self-control can compromise the fundamental principles of care that nurses aim to maintain.

Emotional intelligence is closely tied to Jean Watson's carative precesses as outlined in her Theory of Transpersonal Caring, particularly factors that focus on cultivating sensitivity to oneself and others and promoting the expression of feelings. By enhancing these qualities, nurses can deepen their connections with patients, boost their resilience in emergencies, and improve the overall patient experience [34]. Furthermore, organizational culture promotes an environment where emotional

intelligence is valued, encouraging continuous learning and development [35].

Nurses can improve their emotional management by drawing on past experiences and previous training. Techniques gained from training programs can aid nurses in making sound decisions when faced with new challenges. Nevertheless, the organizational culture must support ongoing training; otherwise, relying solely on past experiences may not be sufficient for developing emotional management skills [25]. Moreover, enhancing empathy towards patients can improve communication quality and alleviate stress [36, 37]. Nonetheless, some studies emphasize that merely relying on past experiences is insufficient; ongoing training is essential for further strengthening emotional management skills [38].

Adherence to principles during critical situations is another crucial aspect of self-control. Maintaining adherence to principles during critical situations and distinguishing personal issues from professional responsibilities are vital aspects of self-control. This distinction allows nurses to meet patient needs more effectively, alleviating job-related stress and enhancing care quality [38]. Nevertheless, the pressures of the work environment can hinder nurses from upholding these principles [39]. The importance of ethical standards in nursing is supported by findings that show that deviations from ethical practices lead to potential harm to patients and increased emotional distress among nurses, thereby linking ethical competence to overall well-being and job retention [40, 41].

Research indicates that following legal and ethical guidelines improves care quality and boosts nurses' job satisfaction [38, 42]. Making accurate and principled decisions in emergencies, guided by the patient's condition, is essential. To translate findings regarding ethical adherence into practice, organizations must create cultures prioritizing ethical training and decision-making support [43]. Ongoing training in ethical decision-making can equip nurses to handle high-pressure situations effectively. Conversely, lacking organizational support can result in unethical choices [44]. By concentrating on patient needs, nurses can reduce their anxiety and improve the overall quality of care [45, 46].

Nurses frequently face particular ethical dilemmas during emergencies, like determining whether to honor a patient's do-not-resuscitate do-not-resuscitate (DNR) directive despite family members advocating for intervention. In these instances, maintaining self-control is essential for upholding established ethical standards while navigating the emotional upheaval of the circumstance. Nurses must juggle their professional duties with the emotional strain felt by both the patient and their loved ones, ensuring their choices prioritize the patient's autonomy and desires. This necessitates a firm grasp on

self-control to stay committed to ethical principles, even amidst heightened personal emotions.

Managing stress and fatigue presents a significant challenge for nurses, making task prioritization essential for maintaining patient focus, even during periods of exhaustion. Training in stress management has been shown to enhance job satisfaction and correlate with lower incidence rates of burnout and improved mental health outcomes across diverse nursing settings, underscoring the need for tailored stress management initiatives [44, 47, 48]. While such training has the potential to reduce work-related stress and positively influence overall nurse performance, challenges like staff shortages and extended work hours may impede its successful application [49].

Moreover, research indicates that merely teaching stress management techniques is insufficient; organizational commitment must be to implement systemic changes that alleviate the burdens contributing to nurse fatigue [50, 51]. Effective communication with patients is crucial in alleviating negative emotions and promoting calm. However, workplace pressures can hinder adequate attention to patients' needs, adversely affecting the quality of care provided [49]. Furthermore, strong communication with colleagues is a vital form of self-control that can reduce stress and enhance care quality. Organizational culture must also encourage open communication and teamwork among staff to facilitate these interactions [52].

Studies indicate that collaborative interactions among nursing staff improve team dynamics and foster shared responsibility, ultimately leading to better patient outcomes in nursing contexts [45, 51].

# Strengths and limitations

The present study encountered several limitations. Some participants initially expressed concerns about the potential disclosure of their names and institutional affiliations. This issue was addressed by assuring them of the confidentiality and anonymity of their information. Additionally, in qualitative research, participants may only partially share their experiences on the topics discussed, and some factors may be beyond the researcher's control. The researcher emphasized effective communication and comprehensively explained it to participants to mitigate this.

Furthermore, the researcher spent considerable time in the research environment, fostering continuous interaction to help alleviate this limitation. Another potential limitation is interviewer bias, which may have influenced data collection and interpretation. To mitigate this bias, the researcher employed strategies such as journaling to reflect on their assumptions and maintain objectivity throughout the process. Additionally, peer debriefing was

utilized to ensure that interpretations were grounded in participants' responses rather than the researcher's perspectives. Moreover, due to the qualitative nature of this study and the specific context in which it was conducted, the findings may have limited generalizability to other healthcare settings or populations.

#### Conclusion

This study delved into the lived experiences of nurses regarding self-control in emergency settings, shedding light on the high-stress scenarios they encounter when caring for patients suffering from severe trauma, critical injuries, or life-threatening conditions like mass casualty incidents and critical care emergencies. In such situations, rapid decision-making and emotional regulation are crucial for providing effective patient care. It emphasized the crucial roles of emotional intelligence, ethical adherence, and stress management in enhancing care quality and promoting nurses' mental well-being. The results suggest that improving emotional intelligence helps nurses regulate their emotions, make sound decisions, and meet patient needs effectively. However, challenges such as frustration or overwhelming anxiety can occasionally hinder a nurse's ability to respond promptly and effectively, particularly during chaotic events. For instance, in situations involving severe patient trauma or fast-paced resuscitation efforts, failures in self-control can lead to poor communication with colleagues and delays in patient care, which may result in adverse outcomes for patients, underscoring the need for effective training and support.

Furthermore, adherence to ethical principles leads to better care quality and job fulfillment. Nurses often face specific ethical dilemmas in emergencies—such as deciding whether to follow a patient's do-not-resuscitate (DNR) order when family members are urging them to take action. In these contexts, self-control becomes paramount; nurses must navigate the emotional turmoil while prioritizing the patient's rights and wishes. Adequate self-control ensures adherence to ethical standards and fosters trust and communication with patients and their families, significantly contributing to positive patient experiences and outcomes. These ethical challenges highlight the need for ongoing organizational support and training to empower nurses to handle job-related difficulties.

The study emphasizes the importance of organizational support and ongoing training to overcome these challenges. Stress and fatigue management have emerged as crucial areas for improvement, with strategies such as training and promoting collaboration among staff offering potential solutions. By improving self-control skills, nurses can enhance their resilience, reduce burnout, and maintain focus on patient-centered care, which is vital in

emergency settings. By fostering a culture that promotes continuous learning, ethical leadership, and effective communication, organizations can enhance nurses' abilities to maintain self-control during high-pressure situations, ultimately improving their job satisfaction and the quality of patient care.

In summary, this study highlights the critical role of emotional intelligence and a supportive work environment in enhancing nurse resilience in emergency settings. These findings add to nursing literature by advocating for incorporating emotional intelligence and ethical principles into nursing education and practice. Connecting these components with Jean Watson's carative factors, the study demonstrates that cultivating these qualities through specific training and institutional backing can lead to better outcomes for both nurses and patients in high-stress environments, ensuring that quality care is maintained even amidst the chaos of emergencies.

#### **Abbreviations**

ARUMS Advanced research in uncertain management systems

BNSc Bachelor of nursing science MSc Master of nursing science PhD Doctor of philosophy

COREQ Consolidated criteria for reporting qualitative research

CCU Cardiac care unit
ICU Intensive care unit
MAXQDA Max qualitative data analysis
DNR Do-not-resuscitate

# **Supplementary Information**

The online version contains supplementary material available at https://doi.org/10.1186/s12873-025-01205-z.

Supplementary Material 1

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#### **Author contributions**

M.Sh. Contributions to conception and design, analysis, and interpretation of data, drafting the article, and final approval of the version to be published. S.D. Contributed to data collection, data analysis, and final review of the manuscript. M.J. Contributed to data collection, edited the paper, analysis, and interpretation. F.E. Contributions to analysis and interpretation of data, review, and editing of the final draft, final approval of the version for publishing, and general supervision of the research group.

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#### Data availability

Data is provided within the manuscript or supplementary information files.

#### **Declarations**

#### Ethical approval and consent to participate

This study adheres to the principles outlined in the Declaration of Helsinki. The ARUMS Research Council Ethics Committee approved the study (Reference Code: IR.ARUMS.REC.1402.394). After a thorough explanation of the study's

objectives, informed consent was obtained from all participants. Participants were informed of their right to withdraw at any time and were free to choose the time and location for their interviews. Additionally, permission was secured to record the interviews, and measures were implemented to ensure the confidentiality of all participants.

#### Consent for publication

Not applicable.

#### **Competing interests**

The authors declare no competing interests.

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