

How Internal Medicine Residents Deal with Death and Dying: a Qualitative Study of Transformational Learning and Growth



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BACKGROUND: Dealing with death and dying is one of the most common sources of work-related stress for medical trainees. Research suggests that the degree of psychological distress that students and residents feel around providing care for terminally ill patients generally decreases as training progresses. However, there is a dearth of literature that directly addresses how trainees learn to manage emotions and process grief when patients die.

OBJECTIVE: To gain insight into medical resident experiences in caring for the dying, including the role of training level and use of support networks and coping strategies to manage personal reactions to patient death.

DESIGN: A thematic analysis of focus group interviews was conducted, and patterns that reflected resident coping and managing experiences with patient death were identified.

PARTICIPANTS: Internal medicine residents from all year levels and recent graduates from two large academic medical centers in the United Arab Emirates.

APPROACH: Qualitative study using a phenomenologic approach.

RESULTS: Residents undergo transformational learning and growth in their experiences with death and dying. Five major themes emerged: emotions, support, education and experience, coping strategies, and finding meaning. As residents progress through their training, they seek and receive support from others, improve their end-of-life patient care and communication skills, and develop effective coping strategies. This transformational growth can enable them to find meaning and purpose in providing effective care to dying patients and their families. Positive role modeling, faith and spirituality, and certain innate personality traits can further facilitate this process.

CONCLUSION: Understanding the complex emotions inherent in caring for dying patients from the perspective of medical residents is a critical step in creating evidence-based educational innovations and policies that support trainees. Residency programs should work to foster reflective practice and self-care in their trainees and teaching faculty.

KEY WORDS: Palliative care; End-of-life care; Medical residents; Graduate medical education; Death and dying; Coping strategies.

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BACKGROUND

Residency is a time of significant professional and personal growth for physicians. Residents spend a substantial amount of time at the hospitalized patient's bedside, and can develop close relationships with patients and their families.¹ Although a strong therapeutic bond can be a source of satisfaction for physicians, treating critically ill patients can be stressful and emotion laden. Dealing with death and dying is reported to be one of the most common sources of work-related stress for trainees,² and greater exposure to death is associated with greater stress.³ This is concerning as it is estimated that in the first year of practice, a physician can care for an average of 40 dying patients.⁴

Trainee discomfort in managing terminal patients is well cited in the literature.^{5,6} Residents in programs worldwide report deficiencies in their end-of-life education, and lack confidence and preparedness to deal with dying patients and their families.^{5,6} Moreover, residents can experience significant grief after a patient's death.¹ A multi-institutional survey of residents in Canada found that over half of respondents reported feelings of sadness, stress, and failure after a patient death.⁷ If unaddressed, these experiences can lead to depression, disengagement, and burnout,⁸ and can adversely impact patient care.^{8,9} In recognition of this, training programs have implemented curricular modifications to support residents' emotional reactions to patient deaths, including brief, real-time debriefing sessions,¹⁰ monthly chief resident-led "death rounds,"¹¹ and training in bereavement counseling-informed peer debriefing.¹²

Resilience studies show that residents can develop positive attitudes and effective strategies in the face of stress.¹³ Accordingly, despite the challenges, residents can view patient deaths as opportunities for learning, and often describe feelings of gratitude and satisfaction in providing quality end-of-

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life care.^{14,15} Prior research suggests that the degree of psychological distress students and residents feel around providing care for terminally ill patients decreases as training progresses.^{2,16} However, there is a dearth of medical literature that directly addresses how trainees learn to manage emotions, develop coping skills, or process their own grief when patients die. The aim of this study is to gain insight into medical resident experiences in caring for the dying. We explore the role of training level and use of support networks and coping strategies to manage their emotional reactions to patient deaths.

METHODS

Theoretical Perspective

The theoretical framework of this study is the compensatory model of resilience, in which compensatory and risk factors independently contribute to a specific outcome.¹⁷ As residents progress through training, several variables shape their experiences in caring for the dying.

Setting and Population

The United Arab Emirates (UAE) offers a unique opportunity to understand perspectives of resident physicians on their experiences with patient death. The country has advanced its healthcare and medical education infrastructure over several decades, but palliative care services lag behind considerably.¹⁸ Most of the end-of-life care is provided in the hospital by non-specialists, including medical residents. Medical education in the UAE is competency based and models the United States training structure, with similar resident roles and responsibilities.¹⁹ The duration of internal medicine residency training is 4 years, where first and second year trainees are considered junior residents and seniors are third and fourth year trainees. An additional fifth year of training allows graduates to complete board examinations, licensing, and job and fellowship applications. In this study, fifth year trainees are considered recent graduates of the residency program. We conducted focus groups with first through fourth year internal medicine residents and recent graduates from two large academic medical centers in the UAE. These hospitals were selected because they sponsor the largest internal medicine training programs in the country, and serve as oncology referral centers for the region. One of the hospitals has a comprehensive palliative care unit. Prior to participation, all residents completed rotations in general internal medicine and intensive care; senior residents also rotated through oncology, and approximately half of the senior trainees at one institution completed palliative care rotations. The program coordinator scheduled the focus groups and sent email invitations to all residents and recent graduates. Interested trainees, who responded to the program coordinator, were scheduled. Participation was voluntary and all respondents signed written informed consent.

No compensation was provided. Residents were grouped by year level to gain insight into potential changes in experiences and attitudes as they progressed through training. The study was approved by the Sheikh Khalifa Medical City institutional review board in Abu Dhabi, UAE.

Data Collection

The interview guide was developed following a comprehensive literature review, and iteratively revised by investigators with experience in palliative care (TH) and medical education (HI, TH). Three residency graduates, who did not participate in the focus groups, piloted the interview script for length and clarity. Questions aimed to explore residents' perceptions of, and reactions to, patient death, how these reactions evolved during training, and factors affecting this process.

We conducted nine focus group interviews from March 2019 through February 2020. One of the investigators (HI) conducted all interviews on site at each institution. The interviewer was a faculty member, who worked at both institutions and was known to the participants, but was not involved in resident assessment. We felt this was important to ensure that residents felt comfortable discussing a sensitive topic. Seven focus groups consisted of internal medicine residents, and two groups were comprised of recent graduates. Each group had 5 to 7 participants and lasted 50 to 80 min. The sessions were conducted in English, audio-recorded, transcribed verbatim by professional transcriptionists, and checked for accuracy and completeness. No additional notes were taken during the sessions. Transcripts were de-identified prior to data analysis, except for year level and gender. Data collection and analysis occurred concurrently and led to iterative adjustments of the interview guide (Appendix 1). When no new themes emerged and we had a sufficient understanding of the themes, theoretical saturation was reached and we stopped recruitment.²⁰

Data Analysis

Both investigators (HI, TH) conducted all data analysis manually. We first read through the de-identified transcripts, through a process of familiarization, to gain an overview. Next, each author independently performed a line-by-line open coding on the transcripts, generating initial codes. We then conducted thematic content analysis,²¹ whereby recurring concepts and patterns related to experiences with patient death and coping strategies were identified in the coded data. Through constant comparison, these patterns were categorized into themes.²² Discrepancies were resolved through in-depth conversations. Through consensus, a coding scheme was established and applied to all transcripts. We used the Standards for Reporting Qualitative Research checklist when writing our report.²³

The authors are both Western-trained physicians with experience in graduate medical education in the United States (HI) and UAE (HI, TH). TH is a palliative care specialist. We

were mindful of how our experience and training influenced our analysis. To minimize individual bias, we regularly engaged in discussion to share, confirm, and challenge each other's interpretations. Trustworthiness of the results was enhanced by including two different hospitals, interviewing two groups (residents and graduates), and having both authors participate in iterative data analysis. To enhance credibility, typed transcripts were sent to six of the focus group participants (10%) for confirmation. The results were also summarized and sent to five interested participants (10%) for member check, to verify whether inferences made by the research team were reflective of the focus group experience. Only minor textual corrections were returned.

RESULTS

All 73 internal medicine residents and recent graduates in the two institutions were invited to participate; 52 agreed (71%). Table 1 lists participant demographics. Five main themes were identified (Fig. 1), namely (1) emotions, (2) seeking and accepting support, (3) education and experience, (4) developing effective coping strategies, and (5) finding meaning. We also identified facilitating factors that supported this process, and barriers that caused a disruption or regression. Each theme is discussed below, with quotes from the residents to evidence our findings.

Theme 1. Emotions

The first theme is characterized by personal and professional struggling and heightened emotions when dealing with end-of-life issues. The residents described a myriad of emotional reactions to patient death, including guilt, anger, sadness, uncertainty, and hopelessness. One junior resident described:

“You become angry. You feel guilty that you missed something or maybe there was something more that could have been done for the patient. And you get depressed, because you didn't expect your patient to die. ... I feel like we don't know how to deal with these things.” (2nd year)

Table 1 Demographics of focus group participants (N = 52)

Characteristics	n(%N)
Gender	
Female	40 (76.9%)
Male	12 (23.1%)
Age*	27.7 (1.9)
Postgraduate year	
1	12 (23.1%)
2	12 (23.1%)
3	10 (19.2%)
4	11 (21.1%)
Graduates	7 (13.5%)

*Age is represented as mean (standard deviation of the mean)

By far, the most common emotion reported by the junior residents was guilt. A first year resident noted:

“Whatever happens, you feel guilty. Maybe there was something I should have added that I didn't? I feel guilty because I always feel like maybe I missed something, or maybe I didn't fight enough. Sometimes I feel guilty that I did not call the family earlier. But because I'm focusing on the medical treatment, I miss this part a lot of times.” (1st year)

Residents in all years of training acknowledged that senior residents and attending physicians were more capable of managing emotions related to patient deaths, but did not understand how this ability evolved. A first year resident described:

“Most definitely, our seniors are not as affected by patient deaths like we are. That's why I said that time will heal everything... When you see the way that they handle deaths, they just move on. But to you, it has much more impact.” (1st year)

Theme 2. Seek and Accept Support

To move forward from this emotional state, the trainees seek and accept support from others. Respondents emphasized the importance of peer and senior support, as well as reaching out to family and external networks, in helping them to deal with the aftermath of a patient's death. A first year trainee described:

“I spoke with my colleagues [after the death]. They began to tell me their stories. Talking to each other makes you feel that you're not alone. It's normal to feel like this. And they reassure you that you did everything you could have.” (1st year)

A senior resident concurred:

“I would always ask help from others, even seniors... I didn't think that it would be a big problem to discuss the case or my feelings about it. And I found a lot of support from people around me.” (3rd year)

One junior resident discussed the importance of family in helping her deal with difficult situations. She explained:

“You've had the worst night ever, with multiple codes, multiple deaths, multiple ICUs. What's the first thing you do at 8 am after those tough nights? I usually call my mother... I don't tell her about the deaths because she gets worried and afraid. So, I just gossip with her.” (2nd year)

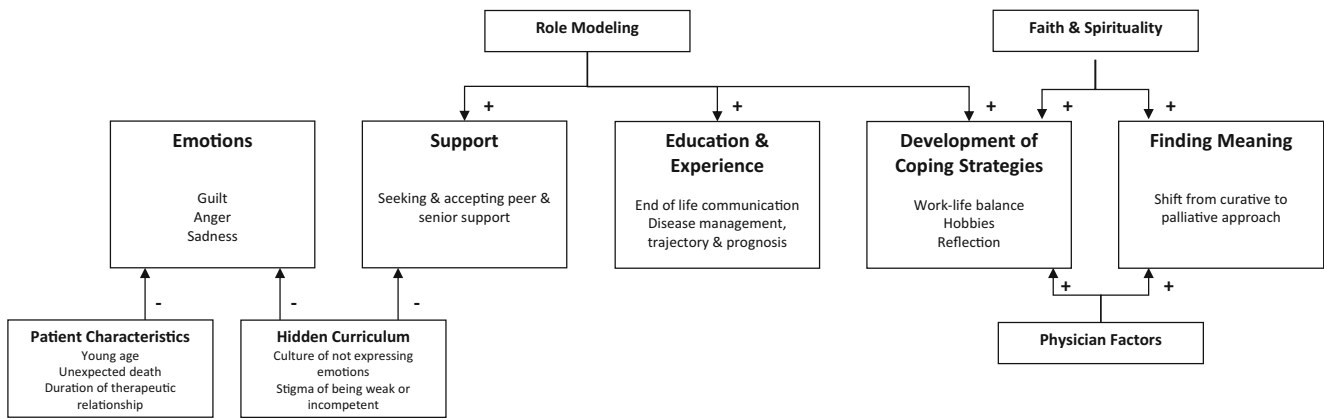


Figure 1 Transformational growth model of residents' experiences with death and dying.

Theme 3. Education and Experience

Education and experience impact the residents' reactions to patient death. Most of the juniors admitted that they felt unprepared to manage terminal patients. One resident stated:

“Most of our patients are elderly with serious medical conditions... We don't really have much teaching about how to manage them medically or how to communicate with them and their families about end-of-life issues. We just make our way through it on our own.” (1st year)

After a patient's death, many junior residents also had lingering questions about the appropriateness of the care they provided. One resident remarked:

“I still remember my first patient who died. I keep thinking is there something I missed? Is there something I could have done or shouldn't have done? For some, I wonder if I could have done something to prevent the death. And for some, I wonder if I could have done more to make the patient more comfortable.” (2nd year)

Gaining a better understanding of the natural progression of disease and improving their skills in end-of-life symptom management and communication allayed much of the anguish and uncertainty that accompanied patient death. A graduate explained:

“When I was a junior, it was very hard. We cried a lot. Maybe now I understand the diseases better. I try to mentally focus on the medical part. This is all scientific. This is all disease progression and it is expected...I remember as a senior, managing a couple of patients and trying my best. I was really concerned about them. But I never got sad when they passed away, because I

always told myself that this is how the disease progresses... I know they're dying.” (Graduate)

Theme 4. Develop Effective Coping Strategies

The residents all recognized the importance of managing their emotions around death and dying. One senior noted:

“It's not sustainable if you stay sad for every patient who dies. You can't survive as a physician like that. You have to develop a way of dealing with it.” (4th year)

Self-reflection, self-care, and finding work-life balance were the most common coping strategies reported by our residents. Several trainees described the importance of reflective practice through journaling. One resident illustrated:

“I keep a journal. I write about how I felt in that moment. Because it's a feeling you have to express. Keeping it inside is not healthy. I sometimes go back and read them, but after a long time has passed by.” (2nd year)

Many residents described self-care techniques, including exercise and finding work-life balance. They consciously put their work aside and engaged in other activities and roles, such as socializing with friends or playing video games. One resident described:

“You also develop some techniques to deal with it, take my mind off of the situation. I go read about something or watch some videos or just try to distract myself. The more deaths that I saw, the more I developed these techniques.” (3rd year)

Theme 5. Finding Meaning

Many of the senior residents and graduates described shifting their focus to the educational and personal value in caring for

terminal patients. This often involved reframing their role as a physician from curative to one of providing comfort and dignity at the end of life. One senior summarized:

“As a junior, you start with a goal to treat everyone that you can, and they shouldn’t die. But after four years, you realize that you can’t save everyone. So now you focus on goals. If he’s palliative and he died peacefully, then you’ve done something good. You gave him some dignity and prevented harm.” (4th year)

Another resident explained:

“When I was an R1 [first year resident], I used to get depressed for months when a patient died. But then as I progressed, I learned to focus on trying to help and support the family more, and to make the patient comfortable, and to provide the best care that I can.” (4th year)

Facilitators and Barriers

We identified several factors, which directly or indirectly influenced how residents managed emotions related to patient death.

Facilitating Factors. Role Modeling. The residents reported that they learned end-of-life care and communication skills mainly through observing senior residents and attending physicians. A junior resident described:

“I’ve seen a lot of seniors sit with the families, talk to them. They hug them. They are really supporting the families. Especially if there is a code, in the process, I see the senior support the family.” (1st year)

Through observation, many trainees also learned coping strategies. As one resident explained:

“You learn from your consultants [attending physicians]. As a first year resident, you see your seniors and consultants. It affects them... but they are more mature and more professional in dealing with it. So with time, you passively learn from them how to deal with it without being sad for weeks.” (1st year)

Faith and Spirituality. Many residents emphasized the importance of their faith and spiritual beliefs in helping them manage emotions after a patient’s death. One senior resident noted:

“Our religious beliefs are important. We are Muslims, and we realize that every human is going to die. One

day, we are going to die. And that’s how you accept it.” (4th year)

A junior resident noted how her faith helped allay any fears or guilt about the appropriateness of patient management:

“How do you cope with it... it’s difficult to cope actually, but we just pray for that patient...so, I think that makes us feel a bit more at peace. That we did all we could. And so, the outcome is not in our hands anymore.” (2nd year)

Physician Characteristics. The trainees recognized that the perception and impact of grief affects individuals in different ways. A senior resident reflected:

“I think it depends on the physicians themselves. It depends on how they see death in their minds. You can see that death affects family members in different ways. Some accept that this was an old demented man and death was expected, while some don’t accept it. I think it is the same for physicians. ... I think whether we’re affected by patient deaths or not depends on how we generally view things.” (4th year)

Barriers. Hidden Curriculum. Although most respondents reported a supportive environment, a few residents did not feel comfortable openly expressing their emotions or seeking support from others. The residents also admitted that they rarely sought support from their attending physicians. One senior resident described:

“When I was an R1 [first year resident], I felt like I was under so much pressure to prove that I was a good resident. I wouldn’t talk about anything that made me uncomfortable. I would talk to my colleagues at my own level, but not my consultants [attending physicians].” (3rd year)

Patient Characteristics. All respondents agreed patient deaths were more emotional and impactful when the patients were younger, when there was a prolonged therapeutic relationship, or when the death was unexpected. One senior resident tearfully recalled an unexpected patient death that occurred earlier in her training. She admitted that despite her faith and coping skills, she still found this death emotionally disturbing:

“When I go back and think of that scenario that affected me the most, I cannot think of anything that would have prepared me for that. Even if I had end-of-life training, I still would not have felt good about it. Even

though I am Muslim and feel that all people will die and this is God's wish, but we should do our maximum, especially for young patients." (4th year)

DISCUSSION

Our study highlights an evolving and transformative process of learning and growth that medical residents undergo as they manage the complex emotions inherent in patient death. From an initial stage of heightened emotions, residents reach out to colleagues and external support networks. They build clinical confidence through learning about disease progression, symptom management, and end-of-life communication skills. And they work on developing effective coping strategies. Ultimately, trainees can find meaning in providing quality care to terminal patients and their families. Consistent with the compensatory model of resilience,¹⁷ several factors can facilitate this transformation, such as spirituality and role modeling, while other factors, including the hidden curriculum, can disrupt the progression. We believe that this is not a linear process, but dynamic and recursive, whereby new experiences can cause the residents to pass through the phases several times, as they build resilience and strive to enhance their sense of purpose and find meaning in their role. Our findings have several implications for education institutions to better support residents in dealing with patient death. First, programs can implement multi-pronged and longitudinal strategies, including academic programs to improve end-of-life communication and symptom management skills, as well as interventions to improve coping skills. Faculty development is important to assist teaching faculty in role modeling self-care and reflective practice. Several studies have shown that clinical rotations in palliative care wards have improved resident knowledge, communication skills, and palliative care self-efficacy.^{24,25}

Our residents reached out to peers and external support networks to help manage work-related stress. Support is an important resource in reducing or preventing moral distress, burnout, and compassion fatigue in healthcare professionals.²⁶ In a study of palliative care nurses, support from colleagues, family, and friends helped improve emotional well-being.²⁷ Many residents, however, lack the experience and confidence to counsel their colleagues after a distressing patient care event.¹² Workshops in peer debriefing can provide trainees with the skills and tools to support their colleagues and begin the healing process in the immediate aftermath of a patient's death.¹²

Our findings are consistent with several other studies, in which trainees rarely sought or received support from faculty after a patient's death.^{28,29} In addition to the emotional impact, many trainees expressed ambiguity and uncertainty about their medical management after a patient's death, and wanted help to make the death a learning opportunity. In a study of family medicine residents, those who questioned their medical management had more anxiety and negative feelings towards end-

of-life care than residents who felt more certain about their medical practice.³⁰ Research suggests that real-time debriefing and supportive discussions can be effective in addressing resident emotions after a patient's death.³¹ Faculty members should engage their residents in timely debriefing after patient deaths to answer any unresolved clinical management concerns. Further, it is important for faculty to recognize that residents are learning from their actions and words. Positive role modeling has been shown to be a key enabler to effective self-care.³² Rather than allowing trainees to rely on a haphazard set of coping mechanisms, faculty could use these "teachable moments" to role model reflective practice, professionalism, and self-care. Moreover, it is notable that self-reflection and finding work-life balance were the most common coping methods adopted by our trainees. In studies of oncology doctors and nurses, self-reflection was associated with decreased stress and burnout, and helped to facilitate resilience.^{27,33} Programs that focus on self-awareness and reflection can help trainees to develop effective coping strategies.

We are pleased that the clinical learning environment in our hospitals allowed residents to express their grief and support each other. Despite educational activities and initiatives to support physicians, studies have shown that implicit influences of institutional culture and values on the learner, the hidden curriculum,³⁴ can teach trainees to avoid or deny their emotions.³⁵ For example, in a survey conducted in Australian hospitals, almost a quarter of medical students who cried in response to an emotional event faced negative social consequences, including being ridiculed.³⁵ In this regard, curricular developments alone are not sufficient. Residency programs must also ensure that the learning environment provides a safe space for trainees to express their emotions and supports resident professional and emotional growth.

It is not surprising that individual physician and patient characteristics both influenced resident responses to patient death. Stress process models that focus on caregiving routinely consider patient factors and caregiver characteristics to explain why stressors disproportionately affect some caregivers more than others.³⁶ As found in other studies, deaths that elicited stronger emotional reactions in our residents were those that were unexpected, occurred in younger patients, and were in patients with whom the residents had a longer and closer relationship.²⁸ For the physicians, personal factors, such as gender and culture, can affect individual perceptions and reactions to stress.³⁷ Professional development to help faculty recognize and support residents in need is essential.

Our findings should be interpreted in the context of some limitations. First, participants were a small group of internal medicine residents from two institutions, limiting generalizability. Respondents were primarily women, though this reflects the female-predominant resident demographics in our hospitals. Though the focus group methodology was intended to give participants a safe space to share, the group setting may have hampered openness. Finally, context must be taken into consideration. Culture and religion can impact perceptions of death

and dying.³⁸ Although the UAE population is diverse and multicultural, religious and cultural values of our predominantly Arab and Muslim resident population may have influenced their attitudes and reactions towards patient death.

CONCLUSIONS

Understanding the complex phenomenon of caring for dying patients from the medical residents' perspective is critical to creating educational innovations and policies that support trainees. Longitudinal and multifaceted interventions that improve clinical skills and also work to foster reflective practice and self-care can help residents to better manage their emotions around patient death and to, ultimately, find meaning in providing quality end-of-life care to patients and their families.

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Declarations:

Conflict of interest: The authors declare that they do not have a conflict of interest.

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