

Improvable Education in Palliative Care A Qualitative Research About Palliative Care Education From the Perspective of Young Physicians

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Abstract

Background

Due to i.e. demographic changes, an aging society and the increasing prevalence of non-communicable diseases, Palliative Care has become a relevant topic worldwide. The need for Palliative Care in Armenia is faced with inadequate care. (Undergraduate) education marks a major barrier to provide sufficient care and remains deficient. This research aimed to assess the current status of Palliative Care (undergraduate education) in Armenia and identify issues that need to be addressed.

Methods

Twenty Armenian first-year residents with different specializations were questioned in July – September 2016 regarding understanding/knowledge, experiences, self-perception of competence and expectations of Palliative Care and Palliative Care (undergraduate) education. These semi-structured interviews resulted in complete transcripts which were analyzed in a summarizing Qualitative Content Analysis subsequently.

Results

According to the interviews, Armenia's health care system lacked sufficient Palliative Care and Palliative Care (undergraduate) education. Some topics, included in different subjects, only partially provided a clear understanding of typical Palliative Care patients/symptoms, approaches of incurable patients and missing training on breaking bad news. Challenges included emotional difficulties, communication of diagnosis/prognosis, uninformed patients and feared consequences for patients, families and physicians. Self-confidence in treating incurable patients varied. Stated wishes included increasing availability and accessibility of Palliative Care and extension of education in all levels (undergraduate, postgraduate, specialization).

Conclusions

Missing education resulted in misconceptions and ignorance of common Palliative Care concepts, expandable confidence in such situations and widely individual, varying, non-standardized approaches towards incurable patients. Palliative Care education needs to be implemented and expanded in Armenia. This research may set a base for further exploration in this field. It can be assumed that these specific results are also applicable to Palliative Care Education in other countries of the Caucasus region and beyond.

Introduction

The demand for Palliative Care increases globally due to demographic changes, an aging society and increasing prevalence of non-communicable diseases (NCDs), accounting for 68% of worldwide deaths,(1). More than 40 million people each year would benefit from Palliative Care,(2), with 78% of these living in low and middle income countries, such as Armenia,(1, 3).

A lack of undergraduate education and training programs has been identified as major barrier to the integration and provision of Palliative Care within existing health care systems,(4, 5). Palliative Care undergraduate education should be considered a core element of health professionals' training,(6), but appears to be sporadically integrated within the Armenian medical curricula,(7). Thus, this research study assesses Palliative Care education status in Armenia. This status may be transferable to other low and middle income countries in Eastern Europe.

Background

Armenia and its healthcare system is confronted with political and economic challenges, including limited funding, a high rate of out-migration (esp. workforce migration) and poverty,(8). The publicly funded "Basic-Benefit-Packet" provides limited universal health coverage, but does not include Palliative Care, excepting the administration of opioids,(8, 9) – 80% of Armenia's health expenditure is privately financed by the population,(8, 10).

The current structures within health care provision impacts on end of life care. The majority of patients die at home, with elderly homes/home care limited and/or unaffordable. As a result, hospitals often provide long-term care. Within the hospital setting, patients often remain uninformed about their medical condition and information is directed to the family instead,(11).

NCDs, especially cardiovascular diseases and cancer, are the primary cause of death in Armenia. Approximately 60–70% of Armenia's end-of-life patients would benefit from Palliative Care,(9, 11). However, Palliative Care is a fairly new medical field in Armenia with limited implementation: formation of a Palliative Care task force, integration of few Palliative Care teams and adoption of a "long-term sustainable national strategy for Palliative Care for 2017–2019",(9, 12). Further, training packages have been developed and delivered, although there remains a lack of specialists, and as yet, no specific Palliative Care unit has opened,(7, 9, 12).

Besides challenging availability/accessibility of Palliative Care, lack of Palliative Care education and uninformed patients, remaining challenges include an uninformed public, widespread opiophobia and restrictive regulations on access to narcotics, limiting clinical availability: annually, only 3% of all patients in need, receive morphine,(9, 11–13).

Method

Using a predetermined set of open-ended questions, the interviewer analyzed semi-structured interviews of first year medical residents. A series of questions were conducted in relation to EAPC's (European Association for Palliative Care) recommendations for an undergraduate Palliative Care curriculum to address six thematic complexes: basics of Palliative Care, pain and symptom management, psychosocial and spiritual aspects, ethical and legal issues, communication as well as teamwork and self-reflection,(14). The interview guideline can be found attached as additional files (Additional File 1). Questions explored information on understanding / knowledge, experiences, self-perception of competence and expectations of Palliative Care / Palliative Care (undergraduate) education. This research was approved by the Ethics Committee of the Uniklinik RWTH Aachen (EK063/16; date: May 2nd, 2016). COREQ (COnsolidated criteria for REporting Qualitative research) and SQUIRE 2.0 (Standards for QUality Improvement Reporting Excellence) checklists can be found attached (Additional File 3, Additional File 4).

Intervention

Interviews were conducted in July and September of 2016 in Yerevan. AT arranged the contact to the interviewees who were visited during their working hours or contacted for a separate appointment. Participants needed to have about one year of working experience, work as residents in Armenia, speak English or have a translator present. All gender and postgraduate specializations were included. An informed consent clarified the purpose of the study, procedures, risks, benefits and confidentiality. The interviewer CH, a female German medical student and corresponding author, performed all interviews in English, partially with the help of translators. The participants knew about the researchers profession and interests in the findings. Trainings of the interviewer were held individually by FE. Field notes were taken but not included in the analysis. Findings were not returned to the participants and no interview was repeated.

Analysis

All interviews were audiotaped, anonymized and transcribed with the software f4transkript by CH. To reduce a large amount of interview material, Philipp Mayring's approach of a "summarizing Qualitative Content Analysis" was used,(15, 16). The research material comprised complete transcripts of all interviews (n = 20). Initially, 25% of the material was used to develop a first category system and coding guideline. To revise this category system, five different interviews were analyzed and coded using the software MAXQDA (Version 12). This revised category system, including main-, sub- and sub-sub-categories, was applied to the whole research material. All information was coded by the interviewer. After a first coding, the material was reworked a second time, comparable statements were recorded handwritten and summarized in the results. Double naming of contents was only counted once.

Results

The analysis of the entire research material resulted in eight main-categories:

1. Personal medical career
2. Palliative Care (in Armenia)
3. Personal factors and experiences in Palliative Care
4. Palliative Care education
5. Communication
6. Pain and symptom management
7. Multidisciplinary approach
8. Wishes and hopes for Palliative Care in Armenia

This publication focused on categories 1–5 and 8 in order to best answer the concrete research question concerning the doctors' perception of Armenia's Palliative Care and Palliative Care education conditions. Sub-categories were marked in bold. The entire category system can be found in the supplemental material (Additional File 2).

Sociodemographic characteristics and personal medical career (Table 1)

Table 1
Participants' sociodemographic and medical career characteristics

Variable	Interviewees (n = 20)
Gender (%)	13 (65%)
Female	7 (35%)
Male	
University (%)	18 (90%)
Yerevan State Medical University	2 (10%)
Armenian Medical Institute	
Postgraduate specialization (%)	1 (5%)
Allergology and Rheumatology	2 (10%)
Anesthesiology	3 (15%)
Cardiology	1 (5%)
Dermatology	1 (5%)
General practitioner	2 (10%)
Internal Medicine	4 (20%)
Neurology	1 (5%)
Oncology	3 (15%)
Pediatrics	1 (5%)
Radiology	1 (5%)
General surgery	
Additional working experience (%)	3 (15%)
Ambulance Service	1 (5%)
Master of Public Health	

Twenty-one medical residents with eleven to thirteen months of work experience participated in the interviews. One interview was subsequently excluded due to the length of work experience. The respondents worked in eleven different departments and graduated in 2015 from Yerevan State Medical University (YSMU) or the Armenian Medical Institute. The YSMU respondents equaled 4.5% of all YSMU graduates in 2015. Average length of the interviews was 47 minutes (range, 19–74) – four interviews were completely, two partly, translated into English.

Table 2 displays all headings of the main- and sub-categories which are shown in detail in the results.

Palliative Care (in Armenia) (Table 2)

Residents described typical Palliative Care patients as those with cancer. Some equated oncological patients and Palliative Care, others described Palliative Care patients with various diseases (e.g. chronic, non-oncological diseases like cardiological or neurological). Pain was frequently named as the primary symptom, few mentioned other symptoms e.g. emotional stress and bedsores.

Interviewees frequently focused on Palliative Care patients' needs and rights (Table 3). Often named was the importance of managing pain and symptoms. Residents identified emotional support and their positive attitude to be helpful.

Table 3
Characteristics of the sub-category "Needs and rights of a Palliative Care patient"

Sub-category	Sub-sub-category	Example
Needs and rights of a Palliative Care patient	Support (spiritual / emotional / psychological / social / accepting diagnosis / daily tasks and activities)	<i>"Palliative Care means that besides the pills and drugs it needs to be, they should give them also psychological support, rehabilitation support, physiotherapy. Besides the main drug healing." (Interview 11)</i>
	Treatment (pain and symptom management / life-supporting)	<i>"It's for the people who have no cure, so you just try to alleviate their symptoms and their pain" (Interview 4)</i>
	Improvement of the quality of life	<i>"Basically, to put the person in the best position possible and give them comfort in their last days." (Interview 14)</i>
	Truthful approach	<i>"In my opinion being truthful to the patient is the best way to go." (Interview 2)</i>

Explained differences of Palliative Care from “usual care” included Palliative Care as long-term treatment with death as a result and symptomatic instead of healing therapy – a few accentuated not to make a difference between Palliative Care and non- Palliative Care patients. All interviewees talked about the influence on their lifetime: patients who are in their end-of-life period, suffer from incurable diseases or have a reduced lifetime. Individuals named “prolonging life” as a purpose of Palliative Care (“*We can't radically treat their disease, so you just have to prolong their life.*” (Interview 2)).

The knowledge about the existence of Palliative Care in Armenia was fragmented: some respondents reported no knowledge; others identified hospices, commercial Palliative Care services (home care) and inclusion of Palliative Care in oncology departments (such as Muratsan hospital, Mikaelyan hospital and Malatia medical center). Some highlighted the lack of Palliative Care facilities. Few reported the quality and development of Palliative Care in Armenia as insufficient.

Identified medical and cultural characteristics included the withholding of information from patients and the important role of family, neighbors and friends. Few stated that family/friends take over the tasks of psychologists, others identified psychologists as an important group in the care of Palliative Care patients and considered them an important part of multidisciplinary teams. Caring for end-of-life patients at home was assessed as a common habit, financial barriers to access healthcare (Palliative Care) were discussed. These characteristics lead to challenges for patients without family or friends. Explanations of Spiritual Care equaled religion and information on existence differed.

Personal factors and experiences in Palliative Care (Table 2)

Some residents described their experiences in a private context: families care for patients at home, lack of communication with patients, no availability of Palliative Care facilities/home care. In a professional context a number of interviewees reported no experience, few mentioned patients during work (e.g. emergency department/ambulance).

Regarding the behavior in front of patients, confident appearance was often considered important. Some specified this to be necessary, no matter if they were confident or not. Regarding feelings and emotions, opinions varied. Some described to exclude emotions at work, others imparted a caring, empathic approach. Many respondents explained difficulties during the care of Palliative Care patients, explicitly emotional difficulties (being stressed, nervous, anxious) or sadness, but also due to the complexity of care. Some excluded Palliative Care as an option for their medical career. Others discussed satisfaction or their neutral approach without emotionality towards Palliative Care patients (Table 4).

Table 4

Characteristics of the sub-category "Behavior in front of patients" and "Feelings and emotions towards (Palliative Care) patients"

Sub-category	Sub-sub-category	Example
Behavior in front of patients	Impart confidence	<i>"But I am trying to look confident. Not about, I'm not sure if I feel like that but I am trying to look confident, so the patient will be more calm." (Interview 17)</i> <i>"If I am saying something seriously, I should say it confident because you know, if you are saying not so confident, if you are not sure that, of your diagnosis it could makes much worse. I am trying to be sure in my diagnosis to do the best to understand the situation and after that I could be confident. But if I am not sure in the diagnosis, of course I am not confidence and I am trying to find other ways of treatment and to help the patient." (Interview 13)</i>
	Cold, rational, neutral approach	<i>"Doctors should be able to judge like the situation and deal with it. Like keep too much emotion out of it." (Interview 3)</i> <i>"I didn't want to use this word but oncologist, chemotherapists must be coolblooded." (Interview 12)</i>
	Behavior similar to a friend	<i>"I think useful that the patient must feeling that you care about him. [...] Patient must feeling your care [...]. Emotion, I think it is very important for patient" (Interview 7)</i>
	Respectful approach	<i>"I am trying to be gently and honestly with that patient because they need to use their time that they have to live." (Interview 13)</i>
Feelings and emotions towards (Palliative Care) patients	Difficult / hard	<i>"It probably going to be very hard for me like I might have many sleepless nights [...]" (Interview 4)</i>
	Resistance / no contact wished / emotional / sad	<i>"I feel sad at this time because I am, I think that I am a little bit emotional for doctor [...]that's why it will be better, for me, when I will not take part in the treatment of the oncological and other [Palliative Care] patients [...]" (Interview 22)</i> <i>"I am trying to do my best for that patients because it is my work but if we are speaking honestly for me sometimes it takes so much energy and after that I feel completely empty, that's why it will be better, for me, when I will not take part in the treatment of the oncological and other [Palliative Care] patients." (Interview 13)</i> <i>"It's difficult to work with them." Question: "What is difficult?" "With emotions. With me this is, emotions. With the emotions." (Interview 11)</i>
	Neutral	<i>"I realized that he will die and I don't think about that. It's not came me, my emotional status in hospital is stop." (Interview 9)</i>
	Nervous / fearful / stressful	<i>"I don't feel comfortable because sometimes they ask me and then I am getting so nervous. [...] But when they ask me those questions I am just getting nervous and they can read on my face how I am at that time embraced and like thinking how I am going to do that." (Interview 17)</i> <i>"But Palliative Care it's very traumatic for me." (Interview 22)</i> <i>"When [the patient] entered second time to the hospital and he couldn't recognize [me] and it was very hard for [me...] Especially it was stressful because [I] knew him, [I] saw him at first when he was very healthy, look very health." (Interview 6 (translated))</i> <i>"So, [I] didn't went to Oncology center because of that fears." (Interview 18 (translated))</i>
	Helpful	<i>"Palliative Care can help me to treat my patient in high quality." (Interview 12)</i>

Most interviewees outlined their tasks in being responsible for helping, healing or caring, including medical treatment (pain and symptoms), giving emotional attention, transferring positive emotions, being a person of trust and more. Some saw their duty in "fighting death". Since residency programs are seen as education, some residents highlighted their role of being students, not doctors, which partly leads to different competencies and delimitation of tasks and a personal role understanding without experience.

Demands for support were addressed to supervisors, completed by colleagues, family and friends. Most respondents reported no knowledge of- or non-existing psychological support. Some would appreciate others would reject support (particularly psychological).

The understanding of diagnosing dying needed to be specified by distinguishing between death and dying which was partly related to the language barrier. Individuals described symptoms, appearances and their confidence which was, if existing, related to knowledge and experience. Many respondents described the meaning of "death" with biological understanding or as the result of something. Frequently, "death" was classified as a part of lifecycle but also related to feelings like fear, uncertainty and the question "why".

Palliative Care Education (Table 2)

Palliative Care undergraduate education and Palliative Care education were mainly reported to be non-existent, but partly integrated into other subjects, e.g. Oncology class or the optional Bioethics course. Mostly, the term Palliative Care itself and no content was explained. Reported study contents mainly included disease related topics and pain management. In connection to Palliative Care, psychological, social and emotional support and euthanasia were mentioned by few. Some stated existing education on communication and breaking bad news, others reported opposite, same with education on diagnosing dying. Generally, main teaching methods included lectures and seminars, in parts completed by observation of experienced doctors, group discussions and practical education, which was rated between deficiency and availability. Besides university education, additional sources of knowledge included books, journals and online resources for self-study.

The majority of interviewees received no postgraduate Palliative Care education. Learning from supervisors was a main part of residency education, which partly included training on communication (of breaking bad news). The importance of learning due to patient contact was stated by many.

Lacking specific Palliative Care education programs, reported influences of education relate to knowledge from different subjects: some noticed missing influence on their confidence, abilities, skills and knowledge in Palliative Care. Others considered that without addressing directly, no knowledge on Palliative Care would be transferred at all. Some explained an improvement of the personal approach towards patients with life-limiting diseases due to education. Individuals evaluated practical experiences in patient care and observation of supervisors to be more important than university or residency education.

Communication (Table 2)

Telling a diagnosis (of dying), was determined not to be part of their job by most. Still, requirements were identified (Table 5).

Table 5
Mentioned requirements for telling a diagnosis to a patient

Requirements for telling a diagnosis
Certainty of the patients' future death
Appropriate surrounding (i.e. quiet atmosphere)
Preparation of the patient beforehand
Invitation of company
Understandable communication of the situation

Difficulties in communication were related to residents' emotional impact and the manner of telling a diagnosis/prognosis to the family instead of the patient, which was explained to be common in Armenia. Reasons for this included personal consent, believe that the truth was too hard for a patient or fear of trouble with families. A number of interviewees disagreed with this procedure and demanded for an informed patient which led to internal conflicts between common practice and their personal approach.

Described effects of conversation with families included difficulties of acceptance, blaming others for the disease and great commitment for the patient. According to some, bad news lead to patients being traumatized, helpless, stressed, considering suicide and not accepting.

Many supported the avoidance of using the word "death". Some accepted using "death" in a conversation with relatives but not with patients. This avoidance was justified because patients would be shocked, lose hope and the respondents would feel personally discomforted.

Only some reported of experience in telling the prognosis. Asking for it was described to be common in Armenia. Some reported of relatives who demand to withhold a prognosis from the patient. Instead of focusing on a prognosis, alternatives included focusing on the treatment, cure, the patient's present life, fighting the disease and bringing hope. Some emphasized that consequences and expressions of diseases differ, which results in an impossibility of prognosis telling. If communicating prognosis, the approaches varied between talking around it, telling percentages of possible deaths, explaining the current situation and doctors' assessing the patients' condition before telling/not telling a prognosis. Experience, a personal approach and intuition would influence the handling.

No respondent felt completely confident in communication, some felt mainly confident, others not confident at all. Influencing factors for higher self-confidence included education and knowledge (on diseases, possible therapies, patient related factors), work/personal experiences, patient contact, role as a doctor and the sense of doing the right thing/helping and giving hope. A number of interviewees felt more self-confident in the conversation with the family than with patients: families were identified to act tougher and know their relative better than physicians; feelings of patients challenged the residents. Others found it easier to talk with patients due to better acceptance and cope of their health situation.

Wishes and hopes for Palliative Care in Armenia

A general wish for extension of Palliative Care in Armenia was analyzed. The cohort demanded for increasing availability and accessibility: specialized facilities (hospices, hospital departments) and home care; high quality care with psychological, social and rehabilitative support; financial accessibility; expanded availability of pain medication. External influencing factors included policy changes, financial support and research. An improvement of education in Palliative Care was demanded: university education should start in an advanced academic year. Individuals emphasized the need of educated medical staff by implementing Palliative Care in postgraduate levels, Palliative Care specialization programs and Palliative Care residencies (abroad or in Armenia). Some wished for the expansion of existing Palliative Care education, more intensified practical education with patient contact and access to teaching material. Required contents comprised education on communication ("breaking bad news"), emotional/psychological support of Palliative Care patients/families, pain and symptom management, typical Palliative Care diseases and related problems, diagnosing dying and right approaches of incurable patients. Individuals wished for education of the population.

Discussion

The residents in this study echo the perception that Armenia lacks adequate availability and accessibility of Palliative Care, and specific Palliative Care undergraduate/postgraduate education,(7, 9). The educational gap may have led to misconceptions of the function of Palliative Care, impacted upon confidence in supporting patients with Palliative Care needs and limited the support available to patients.

The wide range of understanding Palliative Care suggested missing structured education: beyond pain, symptoms common in patients with advanced disease were not frequently explained (gastrointestinal symptoms, nausea, pulmonary symptoms, etc.). Misconceptions included “Palliative Care equals oncological care” or that the “goal of Palliative Care is to prolong life”, indicating a lack of experience, understanding and potentially supportive skills/abilities.

The limited knowledge on the existence and aims of Palliative Care matched the little availability and development of Palliative Care services,(9, 12). Characteristic appearances of caring at home, uninformed patients, importance of the family and limited accessibility (financial barriers) of Palliative Care corresponded with former research,(9, 11, 13). Varying understanding of Spiritual Care (“Spiritual care equals religion”) and Social Care might indicate a lack of availability and knowledge.

Individual approaches towards end-of-life patients and complexities regarding emotional involvement and difficulties were prevalent. Interestingly, these challenges are those amenable to being addressed by education, clarifying concepts of physicians’ tasks in end-of-life care. Previous research highlights the importance of practical and autonomous work for the improvement of capabilities in working with Palliative Care patients,(6). Residents frequently identified a need for knowledge and experience to increase self-confidence. However, being seen as “students” during residency might lead to perceived minor responsibility and independency. Since observing was a main studying method, changes in e.g. communication skills would be likely to take longer since supervisors probably did not receive any Palliative Care education.

A lack of structured education may also explain the varying, non-standardized approaches regarding the explanation of diagnosis and prognosis. *No resident* expressed confidence in their communication, even though the interviewees’ preferred to appear confident. The fear of consequences due to breaking bad news and inner conflicts between withholding information (culturally wanted) but personally wanting to address the patients’ questions, led to interviewees’ discomfort and contrasts with widespread opinions of patients’ autonomy,(17, 18). Knowledge on ethical concerns about communication and the patients’ autonomy should be forwarded. Little education on approaching a Palliative Care patient was contrary to needed mental support and structured communication.

The interviewees’ hopes and wishes expressed their dissatisfaction with the state of Palliative Care in Armenia which agreed with identified needed changes and challenges. Clearly, an expansion of Palliative Care education is wanted.

It may be assumed that discovered patterns of misconceptions, individual approaches as well as missing confidence in the care of incurable patients, are applicable to countries with a similar status of Palliative Care education or comparable historical background, (5, 7).

Limitation of the study and methodical critique

This analysis provided purely descriptive, non-representative statements and identified opinions of young doctors in Armenia which indicated tendencies. All data was conducted in 2016 – information given, referred to the health care/political/educational system in and before 2016. This publication excluded information about two categories (6. Pain and symptom management, 7. Multidisciplinary approach) since it aimed to focus on the current Palliative Care education state in Armenia and the special interest of communication.

Limitations of the study included a cohort selectivity since the mediation of interviewees was conducted through several instances including supervisors who potentially advised to participate in the research. During the interviews, a quiet environment without interruption was intended but not always given due to i.e. colleagues present. Due to the presence of translators, the openness and relationship between interviewer and respondent might have been affected, but also improved the residents’ ability to express themselves better in their mother tongue compared to English. Partly, English conducted interviews lacked understanding of terms (Spiritual Care, death/dying) and needed explanation might have influenced the impartiality of the doctors. Previous questions regarding education (communication, pain, etc.) might have affected answers regarding wishes/hopes for Palliative Care.

The semi-structured approach secured relevant content and the opportunity to widen the range of opinions. Continuous consultations were held with AT to interpret cultural differences. Limitations regarding the analysis included the use of only one coder (tried to be compensated by scanning the material twice). The development of the category system and the coding guideline were supervised by a second researcher.

Conclusion

This research presents a wide range of information on Palliative Care education in Armenia and Armenian young doctors’ knowledge, understanding and self-perceived confidence in Palliative Care. This analysis sets a base for further exploration and contributes to the world-wide assessment of the need of Palliative Care (undergraduate) education. Palliative Care education in all levels should be introduced in Armenia. A nationwide study about the self-evaluated confidence of residents, who received Palliative Care education, could follow. This research may be used for further argumentation to develop Palliative Care (education) in Armenia. Discovered results may be applicable to Palliative Care Education in other countries of the Caucasus region and beyond.

List Of Abbreviations

PC
Palliative Care
NCD
Non-communicable diseases
EAPC
European Association for Palliative Care

Declarations

Ethical approval and consent to participate: Prior to every interview, all interviewees signed an “Informed Consent Form for Participants”, stating the purpose, risks, benefits and confidentiality of the research as well as participation and withdrawal regulations. The Informed Consent Form may be available from the corresponding author on request and original signed forms are stored at the Department of Palliative Care of RWTH Aachen University. In order to protect the anonymity of the participants, the signed informed consent forms as well as the transcripts will only be made available in exceptional circumstances.

The Ethical Committee of Uniklinik RWTH Aachen approved the research beforehand (EK063/16; date: May 2nd, 2016). All methods used were performed in accordance with the Ethics approval and the informed consent as well as along the Standards for Quality Improvement Reporting Excellence (SQUIRE 2.0: revised publication guidelines from a detailed consensus process) and a COREQ-checklist (Consolidated Criteria for Reporting Qualitative Studies).

Consent for publication: All participants and authors gave their consent for publication by signing the informed consent form for participants.

Availability of data and materials: All data is stored at the Department of Palliative Medicine of RWTH Aachen University as well as partially with Dr. med. Carolin Hagedorn (carolin.hagedorn@rwth-aachen.de). The datasets used and analyzed are not publicly available due to protection of participant’s statements and identities but are partially available from the corresponding author on reasonable request.

Competing interests: The authors declare that they have no competing interests.

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Authors’ contributions:

CH was the main researcher who identified all participants, transcribed and analyzed all data from Armenia. CH also drafted the article. AT supported the research on site, was the contact person to the interviewees and added background information of PC in Armenia. AT also revised the draft. SM is supporter of the research idea and international expert on Palliative Care education. SM had a notable share in the linguistic design of the manuscript as well as structure and clarity. FE was the research initiator and originator as well as a supporter of the analysis. FE provided contact to AT and SM. FE also revised content and linguistics of the manuscript. All authors read and approved the final manuscript.

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Tables

Due to technical limitations, table 2 is only available as a download in the Supplemental Files section.

Supplementary Files

This is a list of supplementary files associated with this preprint. Click to download.

- [Additionalfile1.pdf](#)
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