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INTRODUCTION

Patients generally experience deaths in the terminal phase, especially in the Emergency Department (ED), Intensive Care Unit (ICU), and inpatient rooms (Beckstrand et al., 2017). Patients need end of life care such as reducing symptoms and family support when entering the process of grieving (Gama, Barbosa, Vieira, 2012). Death is a psychological and physical event that affects not only the patient who experiences it but also the people around them, including health professionals (Gama, Barbosa, Vieira, 2012). Fear, anxiety, distress, and sadness can occur in families and health professionals when facing patients with death (Buglass, 2010). End of life care (EOLC) is an essential concept in palliative care (National Consensus Project for Quality Palliative care, 2009). A nurse is involved in the process of dying directly (Gastmans, 2012). The care delivered is the management of symptoms related to death and the psychological, social, spiritual

Nurses' Attitude Toward End of Life Care in Emergency Department and Intensive Care Unit In Rural Hospital

Abstract

Background: Death is a psychological and physical event that affects patients caring for, especially in Emergency Department (ED) and the Intensive Care Unit (ICU). Patients and families need the end of life care from a health professional, including nurses. Nurses need to have knowledge, skill, attitude, and interpersonal competencies to provide end of life care.

Objective: This study aimed to explored differences of attitudes towards dying care between ED and ICU ward nurses in a rural hospital.

Method: Variable in this study was the nurse’s attitude. This study used a quantitative comparative cross-sectional research design. The samples were 24 nurses from the emergency ward and 16 from the intensive care unit who were recruited by total sampling. Data were collected to use Frommelt Attitudes Towards the Care of the Dying Care Form B Indonesian version (FATCOD-BI).

Result: The results revealed that nurses’ attitudes toward caring for dying patients in the ED were 101.42±6.646 (30-150) on average, and in the intensive care unit was 106.44±7.633 (30-150) on average. Nurses in the ICU had a more positive attitude than the ED (p = 0.034). There are differences between the proportion of respondents based on gender, level of education, length of time working in the emergency ward, and ICU. The result showed gender, level of education, and range of time working could influence nurses’ attitudes towards caring for dying patients in the emergency ward and ICU.

Conclusion: There is a difference between nurses’ attitudes towards EOLC in the ED and ICU room at rural hospitals. Moreover, the ICU nurses have a more positive attitude than ED nurses.

Keywords: Caring; Dying patients; Emergency department; ICU; Nurse’s attitudes
Nurses are essential health care providers that provided caring processes in ICU, emergency room, and home. Therefore, nurses need knowledge and skills to offer effective EOLC. Also, attitude toward EOLC and interpersonal competencies need to be improved by nurses (Ali & Ayoub, 2010).

The ED and ICU have several similarities in characteristics of care. Firstly, ED and ICU received the patient who is in advanced illness. Moreover, both of them require specialized health care providers (doctors, nurses, assistants, etc.). Therefore, nurses in the ED and ICU need special skills or expertise. Secondly, ED and ICU have aim to life-saving in the terminal patient, so the resuscitation procedure is mostly applied. Therefore, the death process occurs in those rooms regularly. Thirdly, ED and ICU have an inappropriate environment for patients and families because it is no particular room for the family, so it affects the quality of EOLC (Beckstrand et al., 2017).

EOLC in the ED is a challenge for nurses because the ED is the first place to receive patients in the hospital setting (Decker et al., 2015). Decker et al. (2015) stated that it is several barriers to conduct EOLC in the emergency room, such as lack of time, low priority, lack of privacy, and unsuitable environment. Otherwise, in ICU, it has different characteristics and obstacles for applying EOLC. ICU is a place for patients with complicated medical conditions (Baliza et al., 2013). The study in ICU revealed that ICU has several obstacles to the provision of EOLC, including the lack of nursing staff, lack of communication between patients, doctors, and family members (Beckstrand et al., 2017).

A nurse can implement the EOLC, including giving attention and direction related to appropriate treatment, providing social support for patients and families, delivering interventions to reduce pain response, discussing the death process with patients, and listening to the client's wishes for end of life (WHO, 2014). Moreover, the principles of dying care are delivering a patient to a peaceful death (Gloss & Hospitals, 2017).

Nursing Interventions in EOLC supposed to be based on a positive attitude of caring for dying patients. A positive attitude of nurses in the care process can influence the effectiveness of EOLC (Gallagher et al., 2015). The results of the study stated that negative nurses’ attitudes, such as apathy, fear, and anxiety, could reduce the level of quality of care in dying patients (Grubb & Arthur, 2016). The attitude of nurses towards EOLC care is essential to explore as a reference and evaluation of the EOLC process given to clients in the emergency room and ICU.

Moreover, the concept of EOLC in rural hospitals is an essential issue because rural hospitals have unique services and have limited access and infrastructure (Bakitas et al., 2015). However, according to Rainsford et al. (2017) illustrates that EOLC in rural hospitals is still lack of article that discussed this issue. Based on the background that has been stated, it is interesting to explore nurses 'attitudes towards the end of life and to compare nurses' attitudes in the ED and ICU in rural hospitals.

**METHOD**

A quantitative study is applied in this study and used a comparative descriptive survey method. This study utilized a cross-sectional approach (Polit & Beck, 2009). In this study, researchers used a comparative analysis (comparison) to distinguish or compare nurses' attitudes towards EOLC in ED and ICU.

The sampling technique used in this study is a non-probability sampling. The sampling method in this study is total sampling with a total number of 40 respondents consisting of 24 nurses in ED and 16 nurses in the ICU at two rural hospitals in Jember. The research data was taken from December 2018 to January 2019. Nurse attitude toward EOL utilized the FATCOD-BI questionnaire (The Frommelt Attitudes Toward Care of The Dying Care Form B (FATCOD-B) Indonesian Version). The FATCOD-B questionnaire consisted of 30 statement items. The FATCOD-B instrument consists of favorable and unfavorable statements. The statement items included in the favorable statement are items number 1, 2, 4, 16, 18, 20, 21, 22, 23, 24, 25, 27, and 30 (A‘la, 2016). The favorable statement has a score of 1 (strongly disagree) and a score of 5 (strongly agree) and the other items included in the unfavorable statement. The Likert scale started from 1 (strongly agree) until 5 (strongly disagree) is used. The total score is between 30 and 150. The higher score described that is more positive the attitude toward the end of life care (Tait et al., 2015). The Frommelt Attitudes Towards Care of The Dying Care Form B
(FATCOD-B) Indonesian version has been tested for reliability by A’lia (2016) using Cronbach’s alpha. The results of the reliability test were 0.86. The validity range of each statement item is 0.651-0.713. FATCOD-BI used two domains in its discussion, namely Domain I (Positive attitude towards caring for dying patients domain) and Domain II (Perception of patient care based on family and patient domains). FATCOD-BI used two domains in its discussion, namely Domain I (Positive attitude towards caring for dying patients domain) and Domain II (Perception of patient care based on family and patient domains). Domain I of FATCOD-BI consists of item number 1, 2, 3, 5, 6, 7, 8, 9, 11, 13, 14, 15, 17, 26, 29, 30. Domain II of FATCOD-BI consists of item number 4, 10, 12, 16, 18, 19, 20, 21, 22, 23, 24, 25, 27, and 28 (Henoch et al., 2013).

The Ethical Committee of Faculty of Dentistry, University of Jember, has approved this research with numbers 237 / UN25.8 / KEPK / DL / 2019. Before filling out the questionnaire, the respondent received informed consent. Moreover, patients have the autonomy to choose to participate in the research process.

Data analysis using SPSS 20. The T-test is used to analyze the comparison of nurses’ end of life attitude in ED and ICU because the data are normally distributed. Furthermore, to see the difference in the proportion of respondents’ characteristics in ED and ICU nurses, researchers used the Chi-square test.

RESULTS
Table 1 explained that the average respondent’s age working in ED was 32.25 years. Otherwise, in the ICU, the average was 34.88 years. The independent t-test results found that there was no difference in the average age (p-value > 0.05). Moreover, The proportion of male nurses in ED (n = 15, 62.5%) was more than women (n = 9, 37.5%). However, in ICU, the proportion of females is more than male. Chi-square test showed that there was a difference in the proportion of gender in ED and ICU (p-value <0.05). Also, in education level, it showed that it was a difference in the proportion in ED and ICU with a p-value of 0.046 (p-value <0.05). Nevertheless, it was no homogeneity in gender and level of education proportion (p-value >0.05).

| Characteristic of Respondent | ED (N=24) | ICU (N=16) | P-value |
|-----------------------------|-----------|-----------|---------|
| Ages (Mean±SD)              | 32.25±6.045 | 34.88±3.810 | 0.132* |
| Gender                      |           |           |         |
| Male                        | 15        | 8         | 0.045** |
| Female                      | 9         | 7         |         |
| Level of Education          |           |           |         |
| Nursing Diploma             | 13        | 10        |         |
| Nursing Bachelor            | 1         | 4         |         |
| Nurse Profession            | 10        | 2         |         |
| Work Experience             |           |           |         |
| <5 years                    | 8         | 3         | 0.003** |
| 5-10 years                  | 13        | 7         |         |
| 10-15 years                 | 3         | 4         |         |
| >15 years                   | 0         | 5         |         |
| Religion                    |           |           |         |
| Muslim                      | 24        | 16        |         |
| Non-Muslim                  | 0         | 0         |         |
| Marriage status             |           |           |         |
| No married                  | 5         | 2         | 0.071b  |
| Married                     | 19        | 14        |         |
| Experience in caring for dying patient | 21 | 16 | 0.003** |
| Yes                         | 3         | 12.5      |         |
| No                          |           |           |         |
| Training experience in caring for dying patient | 14 | 12 | 0.080b |
| Yes                         | 10        | 4         |         |
| No                          |           |           |         |

Nurses in ED who have less than five years experience amounted to 8 people, 5-10 years there were 13 people, and 10-15 years amounted to 3 people. While in the ICU room, there are no nurses who have work experience of fewer than five years. Chi-square test results between the length of work and workplace variables (emergency room and ICU) showed that there was a difference between the number of nurses working in the emergency room and ICU based on the length of work with p-value 0.003 (p-value <0.05). In the emergency room, some nurses are just starting to enter the workforce so that their experience is <5 years. While in the ICU room, there are no nurses who have work experience <5 years, and there are nurses who have been senior or have worked for >15 years.

All nurses are Muslim (100%), and there are five unmarried emergency nurses and 19 married nurses, while 16 nurses who worked in the ICU; all of them were married. Nurses who have experience dealing with dying patients are 37 people (92.5%),
and the number of nurses who have no experience dealing with dying patients is three people (7.5%). Three nurses who have never dealt with patients near death are working in the emergency room. All nurses who worked in the ICU (N = 16) had faced patients dying. The number of nurses who had attended the training of patient care before death 16 people consisting of 14 nurses in the emergency room and four nurses in the ICU room. Whereas, who had never received training in dying care patients consisted of 10 emergency nurses and 12 ICU nurses. Overall, more nurses have never attended training than those who have ever participated in the training.

**Tabel 2. The difference in the nurse’s attitude toward EOLC (N=40)**

| Variable                             | FATCOD-BI |     |     |     |     |
|--------------------------------------|-----------|-----|-----|-----|-----|
|                                      | ED Mean   | SD  | ICU Mean | SD  | Total Mean | SD  | P-Value |
| Domain I (Positive attitude towards caring for dying patients domain) | 53,13     | (6,924) | 54,00 | (4,050) | 53,48 | (5,896) | 0,618  |
| Domain II (Perception of patient care based on family and patient domains) | 48,29     | (5,162) | 52,44 | (5,151) | 49,95 | (5,491) | 0,017* |
| FATCOD BI Total                      | 101,42    | (6,646) | 106,44 | (7,633) | 103,43 | (7,393) | 0,034* |

*have differences

Table 2 described the nurses' attitudes towards EOLC in the ED and ICU at rural hospitals. Overall the average attitude in the ICU (106.44) is higher than in the ED (101.42). Furthermore, according to the FATCOD-BI domain, the domain I described that attitude toward EOLC in ICU (54.00) was higher than in the ED (53.13). Domain II also showed that the attitude toward EOLC in ICU (52.44) was higher than in the emergency room (48.29). Moreover, Table 2 described that there is a difference between nurses' attitudes towards EOLC in the ED and ICU with a p-value=0.034 (p <0.05). However, if it was tested in each domain, domain I showed no difference attitude with a p-value=0.618 (p> 0.05), and domain II showed a different attitude between nurses in ED and ICU with a p-value=0.017 (p <0.05).

**Discussion**

The results showed that there were nurse's attitude differences in ED and ICU towards EOLC. The attitude of nurses in the ICU was more positive rather than in the ED. Based on each domain, the results showed a difference in domain II (Perception of patient care based on family and patients). Tripathy et al. (2017) stated that in the ICU, most family members had a contribution for EOLC, especially supportive care. This study also revealed that families often discuss with nurses and always appreciate the role of nurses in the ICU (Tripathy et al., 2017).

Moreover, Beckstrand et al. (2017) stated that there are many obstacles experienced by emergency nurses in applying EOLC. These obstacles will affect the attitude of the nurses in the ED towards EOLC. Some of these obstacles are family who contacts the nurse frequently to ask about the patient's condition. At the same time, nurses also have to take care of other patients, and another obstacle is the emergency room design that does not allow for the privacy of patients with dying or grieving family members. Therefore, it will affect the attitude of nurses and perceptions of dying patient care based on family and patients. The difference in nurses' attitudes toward EOLC in ED and ICU is also influenced by the lack of time for dying in the emergency room, low priority, lack of privacy, and an inappropriate ER environment (Decker et al., 2015). Nurses cannot apply EOLC in one patient only because many patients need help quickly and appropriately. Otherwise, in rural hospitals, the quantity of specialized nurses is a central problem. Nurses also seldom discussed with patients and family about the feelings because of the lack of privacy in ED (Decker et al., 2015). Barriers and obstacles in EOLC can affect the ability of nurses to communicate with patients and families regarding EOLC (Gurung & Timalsina, 2018). Moreover, The results of this study were supported by previous research, which states that the nurse's work environment can influence nurses' attitudes towards EOLC (Kassa & Murugan, 2014).

Homogeneity test in the characteristics of respondents between nurses in the ED and ICU showed that religion, age, marital status, experience caring for dying patients, and the experience of receiving dying care training was homogenous. However, sex, work experience, and level of education were no homogeneous, or there are differences in proportions between nurses in the ED and ICU. Based on these results, gender, education level, and work experience factors might influence
nurses' attitudes towards EOLC. Furthermore, based on previous research, gender is one of the factors that influence a nurse's attitude towards EOLC. According to Yaqoob et al. (2018), there was a relationship between gender and the attitude of nursing students towards EOLC. Other studies also revealed that women are considered to have a more positive attitude towards caring for dying patients than men (Lancaster et al., 2017). In addition, feminism could affect the attitude of caring for dying patients (A'la et al., 2018; Dunn et al., 2005).

Work experience may affect attitude toward EOLC and affect the differences of nurses in the ED and ICU. The result showed that Nurses in the ICU have more extensive working experience compared to emergency room nurses so that they can influence attitudes towards EOLC. Also, these results were supported by previous studies. In Turkey, the result showed that there were differences in attitudes between groups of nurses who worked from 2 years to 5 years and groups from 5 years to 10 years (Ozcelik et al., 2018).

Education level has also could influence nurses' attitudes towards EOLC. According to Dunn et al. (2005), who analyzed nurses' attitudes in Sweden, found that education level is the best predictor of positive attitudes in caring for dying patients (Lancaster et al., 2017). Another study in Iran also revealed a significant relationship between education level and attitudes towards death (Ali & Ayoub, 2010).

Balung and Kalisat hospitals are hospitals located in rural areas or peripheral hospitals in Jember Regency. In rural areas, there are many emergency cases, so that rural hospitals are the first referral for local communities, even though human resources and facilities are still incomplete and under the standard. This situation may increase the risk of death of patients both in the ED and ICU due to delays in the referral of patients who are in an emergency and require prompt, appropriate, and adequate health facilities (Green et al., 2017). Therefore, the positive attitude of nurses towards EOLC in the ED and ICU in rural hospitals is needed to improve the quality of service to patients. The development of EOLC in rural hospitals also needs to be developed both in the ED and ICU. A positive attitude towards EOLC in the ED nurses and ICU nurses could be an initial step in the development of EOLC services in rural hospitals.

According to researchers, the differences in nurses' attitudes towards EOLC in the ED and ICU may be caused by the environmental factor in both areas. In the ED, the patient lacked privacy so that affecting EOLC services. Otherwise, in the ICU, the time for caring is 24 hours, and in general, patient in ICU is treated for a long time. For further research, it needs to examine the relationship between sex, education level, and also the experience of working nurses with nurses' attitudes towards EOLC because it can be factors that influenced attitude toward EOLC.

CONCLUSION
There is a difference between nurses' attitudes towards EOLC in the ED and ICU room at rural hospitals. Moreover, the ICU nurses have a more positive attitude than ED nurses. The proportion of characteristics respondents based on sex, education level, and length of work was no homogeneous. Therefore, it could be a factor in differences of attitude toward EOLC. The development of EOLC in rural hospitals can begin with improving attitudes of caring for dying patients through training or refreshing knowledge to nurses. However, this study still has limitations because it was conducted on heterogeneous samples. For further research, it needs to examine the relationship between sex, education level, work experience with nurses' attitudes towards EOLC to heterogeneous samples.

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