

Retrospective analysis of inpatients in a recently established palliative care center

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Abstract

Aim: The present study makes a retrospective analysis of the records of patients admitted to a recently established district state hospital palliative care center for treatment.

Material and Methods: The records of the first 252 patients treated as inpatients in a recently established palliative care center between November 2015 and April 2017 were reviewed retrospectively.

Results: The study included 252 patients who were treated between the specified dates following the date of establishment. The mean age of the patients was 74 (18–103) years; 56.8% were male and 43.2% were female. The mean length of hospital stay was 15.2 days. Of the total, 134 (53.1%) patients required analgesics; 219 (86.6%) received dietician support; 73 (28.9%) received psychologist support; and 205 (81%) received physiotherapist support. Of the patients, 75.4% were discharged with full recovery, 15.4% were transferred to the intensive care unit and 9.2% died.

Conclusion: Palliative care has recently gained importance as a multidisciplinary approach. The authors believe that the establishment of such centers in district hospitals will reduce overcrowding in the larger centers, and will allow patients to access this service closer to their place of residence.

Keywords: Palliative care; pain; multidisciplinary approach

INTRODUCTION

Palliative care involves multidisciplinary care and treatment, and is aimed at preventing the onset of symptoms, relieving the patient's complaints and providing the best possible quality of life to patients with life-threatening diseases (1). Palliative care is an interdisciplinary approach that relies on the cooperation of specialists from different occupational groups. A multidisciplinary team is composed of a physician, a nurse, a physiotherapist, a psychiatrist/psychologist, a faith worker, a social services specialist, a dietitian and volunteers (2). The number of palliative care centers has increased substantially in the last decade, having been established in various university hospitals and in hospitals affiliated with the Ministry of Health. In the present study, a retrospective review is made of patients who were monitored and treated in the palliative care

unit of a recently established district state hospital.

MATERIAL and METHODS

The medical charts of 252 patients who received inpatient palliative care in the palliative care center of our hospital between November 1, 2015 and April 1, 2017 were reviewed retrospectively. Patients over 18 years of age were included in the study. Patients under 18 years of age were excluded from the study. The first hospitalization of patients with consecutive hospitalizations was evaluated. Patients whose data could not be accessed or missing data were excluded from the study. The reason for admission, mean length of hospital stay, therapies administered, and mortality and morbidity rates were investigated.

Board of ethics approval for this study was obtained from the ethics commission of Adiyaman University. Approval no: 2019/5-8. Approval date: 26.06.2019. This study is retrospective and therefore no consent form.

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Statistical Analysis

Descriptive statistics included mean, standard deviation, median, minimum, maximum, frequency, and ratio.

RESULTS

The study included 252 patients who were treated between the specified dates after the date of establishment. The general characteristics and demographic data of the patients are presented in Table 1. The mean age of the patients was 74 (18–103) years, and 56.8% were male and 43.2% were female. The mean length of hospital stay was 15.2 days. Of the total, 134 (53.1%) patients

required analgesics; 219 (86.6%) received dietician support; 73 (28.9%) received psychologist support; and 205 (81%) received physiotherapist support (Table 2). Furthermore, 42 (16.6%) patients had hypoalbuminemia. 60 patients (23.8%) developed decubitus ulcers, requiring daily wound dressing and positional support so as to prevent the development of new ulcers. A total of 134 (53.2%) patients received analgesia support in the present center. In terms of outcomes, 75.4% were discharged with full recovery, 15.4% were transferred to the intensive care unit following a deterioration in general condition and 9.2% died in the palliative care center.

Table 1. Demographic data of patients

	Min-Max	Median	Med.±s.s./n-%	
Age	18 - 103	74.32	74.32 ± 10.7	
Sex	male		143	56.8%
	female		109	43.2%
Days in hospital No	1 - 77	15.2	15.2 ± 9.2	
Disease			252	100%
malignancy			35	13.8%
alzheimer			17	6.7%
COPD			12	4.7%
chronic renal insufficiency			12	4.7%
chronic cardiac insufficiency			11	4.4%
parkinson			8	3.2%
cerebral palsy			2	0.8%
pneumonia			23	9.1%
femoral fracture			8	3.2%
cerebrovascular disease			84	33.3%
malnutrition and care patients			40	15.9%
Other informations				
hypoalbuminemia			42	16.6%
decubitus ulcer			60	23.8%
dietician support			219	86.6%
physiotherapist support			205	81%
psychologist support			73	28.8%

COPD: chronic obstructive pulmonary disease

Table 2. Nutrition types and analgesic types

nutrition types	252	100%
normal diet	78	31.0%
oral replacement	84	33.3%
nasogastric	45	17.9%
parenterally	24	9.5 %
PEG	21	8.3%
used analgesic types	134	100%
NSAI or paracetamol	88	65.7%
NSAI or paracetamol+ tramadol	28	20.8%
Fentanyl Patch	13	9.7%
Oral morphine	5	3.8%

NSAI: non steroid anti inflammatory, PEG: percutaneous endoscopic gastroscopy

DISCUSSION

The growing elderly population and the increasing prevalence of chronic diseases have increased the need for palliative care units and the services delivered to geriatric and oncologic patients (3,4). In developed countries, infectious diseases are being surpassed as the most common cause of death by heart disease, cancer and chronic diseases (4). Scientific advances have increased life expectancy and the chance of survival from cancer, although this has been accompanied by a rise in the prevalence of side effects associated with cancer therapy (4,5,6). Increases in the prevalence of cancer and survival rates have led to an increase in the need for palliative care. In a retrospective analysis by Yuruyen et al., 143 out of 319 patients (43.9%) admitted to a palliative care center were followed up with a diagnosis of malignancy (3). Similarly, Komaç et al., in a retrospective study of 256 palliative care patients, found that 86 (33%) patients had been admitted with a diagnosis of malignancy (4). In contradistinction to other palliative care centers in the country, the palliative center in the present study provided pain control and nutritional support to 36 patients (13.8%) that were admitted for cancer treatment.

Pain is the most common, and one of the most significant, symptoms experienced by adults and children requiring palliative care (7–9). The World Health Organization (WHO) recommends three-step ladder therapy for pain involving non-opioids, weak opioids and strong opioids, depending on the pain severity (10). In the present center, pain control was achieved using a ladder system. We consider that deficiencies in this regard will be eliminated with the introduction of oral morphine preparations onto the market. The management of pain using a team approach while providing psychosocial support contributes considerably to the treatment of patients that frequently present to the emergency rooms, and cancer patients in particular. A total of 134 (53.2%) patients received analgesia support in the present center.

Energy consumption in palliative care patients increases related to the primary disease and progressive weight loss occurs as a result of the increased energy demand if the required nutrients are not supplied (11). Malnutrition leads to a decrease in lean body mass, delays wound healing, impairs quality of life, increases in morbidity and mortality, and increases the length of hospital stay and healthcare costs (12). In the present center, the calorific needs of inpatients are calculated using a nutritional risk scale upon admission, and a nutrition program is developed accordingly. A total of 219 (86.9%) patients received support from a dietitian following admission.

Unfortunately, there is a paucity of data on the development of pressure sores in patients admitted to palliative care centers in Turkey. Decubitus ulcers develop in 9–13% of inpatients, in 40% of intensive care unit patients and in 66% of elderly patients undergoing surgery for hip fracture (13). The rates are higher in palliative care centers, where patients are more likely to be admitted with neurological disorders. The development of pressure sores increases the mortality risk, and can prolong the hospitalization of inpatients by 18–20 days (14–16). An analysis of the patient population identifies decubitus ulcers as one of the leading problems in palliative care centers. In the present study, 60 patients (23.8%) developed decubitus ulcers.

The goal of palliative care is to increase the quality of life of patients, and to ensure comfort and peace in the final stages of their lives (17–19).

The single-center and retrospective study design and the lack of randomization can be listed as limitations of the present study.

CONCLUSION

In conclusion, palliative care has recently gained importance as a multidisciplinary approach. The authors consider that establishing such centers in district hospitals will reduce overcrowding in the larger centers, and will give patients the opportunity to access this service close to their place of residence.

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

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