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ARAŞTIRMA / RESEARCH

Evaluation of Palliative Care Needs of Advanced Stage Cancer Patients Admitting to the Emergency Department

Acil Servise Başvuran İleri Evre Kanser Hastalarının Palyatif Bakım Gereksinimlerinin Değerlendirilmesi

Ezgi AYAR [1], Özlem UĞUR[2]

[1]Şehit Prof. Dr. İlhan Varank Eğitim ve Araştırma Hastanesi, İstanbul, Türkiye.
[2]Dokuz Eylül Üniversitesi, Hemşirelik Fakültesi, İzmir, Türkiye.

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Sorumlu Yazar/Corresponding Author:

Özlem UĞUR, Prof. Dr.
Dokuz Eylül Üniversitesi 15 Temmuz Sağlık ve Sanat Yerleşkesi Kampüsü Hemşirelik Fakültesi ,
35340, İnciraltı/İZMİR
E-posta: ozlem.ugur@deu.edu.tr
ORCID: 0000-0002-1020-9962

Ezgi AYAR, Hemşire
ORCID: 0000-0003-0896-8801

Abstract

Objective: This study aimed to evaluate the palliative care needs of advanced stage cancer patients who applied to the emergency department.

Material and Method: The research is descriptive and was conducted with 159 patients who met the selection criteria in the emergency departments of three public hospitals in Istanbul. The data for the study was collected using three tools: the Patient Information Questionnaire Form, the Palliative Performance Scale (PPS), and the Quality of Life in Palliative Cancer Care Patients (EORTC-QLQ C15-PAL) Scale.

Results: Patients frequently applied to the emergency department for pain (31.7%), dyspnea (16.2%), and nausea- vomiting (15.8%). In general, consultation was requested from 88.7% of the patients, and the most frequently consulted clinics were 49.8% internal medicine, 25.1% anaesthesia, 6.5% surgery and 6% chest diseases. The patients' emergency service visits resulted in 38.4% clinical admission, 32.1% discharge, 23.3% intensive care unit and 6.3% exitus. 67.2% of the patients had a PPS score of 70 or less. The patients' follow-up time in the emergency department was also determined to be a minimum of half an hour, a maximum of 5 hours, and an average of 1.9±1.2 hours.

Conclusion: The study found that 93% of the patients did not receive palliative care support. Considering this basis, it can be recommended to provide the necessary guidance for cancer patients who apply to emergency departments to receive palliative care support and to structure this step within the health system. Such a structure may contribute to the diagnosis of patients who need palliative care support.

Keywords: Emergency department, oncological emergency, palliative care.

Öz

Amaç: Bu çalışmada acil servise başvuran ileri evre kanser hastalarının palyatif bakım gereksinimlerinin değerlendirilmesi amaçlanmıştır.

Gereç ve Yöntem: Araştırma tanımlayıcı tipte olup İstanbul ilinde bulunan üç kamu hastanesinde 159 hasta ile gerçekleştirilmiştir. Çalışmada veriler Hasta Bilgilendirme Formu, Palyatif Performans Skalası ve Palyatif Bakım Alan Kanser Hastasının Yaşam Kalitesi (EORTC QLQ C15-PAL) skalası kullanılarak toplanmıştır.

Bulgular: Hastaların acil servise en sık başvuru nedeni ağrı (%31,7), dispne (%16,2) ve bulantı kusmaydı (%15,8). Başvuruların %88,7'sinden konsültasyon istenmiş; %49,8 dahiliye, %25,1'i anestezi, %6,5 cerrahi ve %6 oranında göğüs hastalıklarına danışılmıştır. Hastaların %38,4'üne klinik yatış yapılmış, %32,1'i taburcu olurken, %23,3'üne yoğun bakım yatışı gerçekleştirilmiş ve %6,3'ü ise ölmüştür. Hastaların %67,2'sinin Palyatif Performans Skalası puanı 70 veya altındaydı. Hastaların acil servisteki izlemleri minimum yarım ya da bir saat, maksimum 5 saat, ortalama 1,9±1,2 saat sürmüştür.

Sonuç: Araştırmada hastaların %93'ünün palyatif bakım bakım desteği almadığı saptanmıştır. Bu temelde ele alındığında acil servislere başvuran kanser hastalarının palyatif bakım desteği alması için gerekli yönlendirmelerin yapılması ve sağlık sistemi içine bu basamağın yapılandırılması önerilebilir. Böyle bir yapılanma palyatif bakım desteğine gereksinimi olan hastalarında tanılanmasına da katkıda bulunabilir.

Anahtar Kelimeler: Acil servis, onkolojik aciller, palyatif bakım.

1. Introduction

A significant public health issue in Turkey and around the world is cancer, which is the second leading cause of mortality after cardiovascular illnesses. According to data from the International Cancer Agency (GLOBOCAN), 19,300,000 new instances of cancer were reported and 10,000,000 people died from cancer in 2020 globally (1). Cancer patients frequently visit the emergency department (ED) for symptom management rather than to have their underlying condition diagnosed and they require palliative care (2). The progression of the disease, which accounted for 53% of admissions to the emergency department, was followed by the effects of chemotherapy on 37.9%, infections on 7.4%, and radiotherapy on 1.7% (3). The rise in the number of cancer cases is a significant factor in the rise in the number of people applied to emergency departments for either the disease itself or complications from treatment. The goal of the emergency department is to find quick and accurate answers to patients' concerns in this direction. In studies examining the frequency of use of emergency departments by cancer patients, it was found that 5.2% of all patients had cancer (3-7). Interventions in palliative care aim to enhance patients' quality of life. As a result, palliative care (PC) and emergency department units of today are not quite on the same plane (8). Due to their acute discomfort and the intensity of the emergency department, cancer patients with complicated medical issues may find it challenging to communicate their care needs in the emergency department. Along with time constraints, barriers to emergency department personnel discussing palliative care issues with patients include lack of knowledge during the patient's follow-up, lengthy patient waits in the emergency department, requests for consultation from symptom-related units and the associated lengthy wait, and the focus on aggressive resuscitation (9). Although palliative care is important in the management of cancer symptoms, the holistic approach provided to both the patient and his family creates an environment of comfort and trust. Advanced cancer patients frequently visit emergency departments (3,6,7). As a result, integrating palliative care into emergency services for advanced cancer patients is critical (9,10). Although there have been many studies on the PC needs of cancer patients admitted to the emergency department in other countries, this issue has not been adequately addressed in Turkey, and there are few studies on the subject (5,9). In studies conducted in Turkey, the profiles, demographic characteristics, complaints, causes, frequency of admission, mortality and morbidity rates of cancer patients admitted to the emergency department were highlighted (3,4,7,11). The staging of cancer patients who were admitted to the emergency department was not considered in these studies, and there is no effective study on the palliative care needs of this group, the diagnosis, or the structuring of interventions for management. Patients with advanced-stage cancer are more likely to be admitted to the emergency department, and the reasons for admission are typically problems that can alter the patients' clinical course. In this context, it is necessary to integrate palliative care services into the care that cancer patients receive in the emergency department. This study aimed to evaluate the palliative care needs of advanced stage cancer patients who applied to the emergency department.

Study questions:

- What are the reasons diagnosed with cancer patients to apply to the emergency department?
- What is the palliative performance scale diagnosed with cancer patients?
- Do those diagnosed with cancer admitted to the emergency department have palliative care needs?

2. Materials and Methods

2.1. Study Design and Samples

This descriptive and cross-sectional study was conducted with advanced cancer patients who applied to the emergency departments of three public hospitals in Istanbul, Turkey, between April and August 2021. Since the number of patients diagnosed with cancer who applied to the emergency departments of hospitals is not known, the sample size was determined as 159 using the sample method of unknown universe, assuming 80% power, medium effect size and 0.5 significance level (10).

Patients with advanced stage cancer who are 18 years of age or older, can communicate in Turkish, have been diagnosed with cancer, have visited the emergency department at least once for cancer-related reasons, have good cognitive functions, can communicate, can cooperate with researchers, and are willing to participate were included in the study (6,9). The exclusion criteria of the study did not want to participate in the study, were newly diagnosed, and could not be contacted (4,6,9).

2.2. Data Collection Tools

The data for the study was collected using three tools: the Patient Information Questionnaire Form, the Palliative Performance Scale (PPS), and the Quality of Life in Palliative Cancer Care Patients (EORTC-QLQ C15-PAL) Scale.

2.2.1. Patient Information Form

There are 22 questions on the form about the patient's demographic characteristics, medical characteristics, whether there is a palliative care unit follow-up, the reason for applying to the emergency department, the duration of the emergency department follow-up, whether a consultation is requested, the outcome in the emergency department, and the hospital interventions (4,9,11,12).

2.2.2. Palliative Performance Scale (PPSv2)

Anderson and colleagues developed the Palliative Performance Scale (PPSv2) in 1996 to assess the patient's movement status, activity and disease symptoms, self-care, nutrition, and consciousness level. The scale was created for the evaluation of healthcare professionals. Its rating level ranges from 0 to 100 with increments of 10 points. On the scale 0 points equal death, 10 points indicate a completely dependent patient, and 100 points indicate a patient who does not need special care and is capable of carrying out daily tasks (13). Patients with a PPS score of 70 or lower should receive support for palliative care, it has been concluded (14,15). Diagnosing palliative care needs should begin after a person receives a cancer diagnosis. People should be diagnosed and their needs should be questioned. In this period, after patients are diagnosed, they find themselves in the treatment period without adequately questioning their needs and needs during the process. The PPS scale was used to diagnose this.

2.2.3. Quality of Life in Palliative Cancer Care Patients (EORTC-QLQ C15-PAL) Scale

The QLQ-C15-PAL is a general core QOL assessment tool that accompanies various cancersubtype–specific questionnaires. The QLQ-C15-PAL consists of 15 questions: 2 multi-item functional scales (physical and emotional functioning), 2 multi-item symptom scales (fatigue and pain) along with 5 single-item symptom scales (nausea/vomiting, dyspnea, insomnia, appetite loss, and constipation), and 1 final question referring to overall QOL. Patients rated each question/item on a numeric scale from 1 (not at all) to 4 (very much), except for overall QOL, which was rated from 1 (very poor) to 7 (excellent) (15). Grönvold and colleagues (2006) developed this scale to be used in patients receiving palliative care, by selecting 15-items from the 30-item scale. It was determined that the item-total score correlations ranged between 0.70 and 1.00, and the alpha values of the subscales ranged between 0.40 and 0.83. The validity and reliability study of the scale was conducted in Turkey, and it was determined that Cronbach's alpha value ranged between 0.93 and 0.98. The majority of the scale's subscale dimensions had low to moderate correlations with others (29). There were moderate correlations between the fatigue sub-dimension and the physical sub-dimension (-0.41), as well as between the insomnia sub-dimension and the emotional sub-dimension (-0.53). Weak correlations were found between the nausea/vomiting sub-dimension and the loss of appetite sub-dimension (0.31), as well as between the insomnia sub-dimension and the pain sub-dimension (0.22) (16). The scale is a four-point Likert scale that ranges from 1-nothing to 4-a lot. Considering the scores obtained from the sub-dimension, the functional status is progressing well as the score from the physical sub-dimension increases or the score from the emotional sub-dimension decreases (15,16).

2.3. Collection of Research Data

The data of the study were collected by the researcher through face-to-face interviews with the patients and their relatives. During the data collection process, information on the medical diagnosis for which the patient was treated, the stage of the disease and metastasis status, and the presence of a chronic disease were taken from the patient file.

2.4. Data Analysis

The data were analyzed in a computer environment using appropriate statistical methods in IBM SPSS V25 program. Diagnostic and socio-demographic characteristics of the patients, reasons for using emergency services, and interventions applied in the emergency department to patients experiencing pain/dyspnea/general condition disorders and nausea/vomiting were evaluated according to the EORTC QLQ-C15-PAL scale. Their distributions are given as numbers and percentages. In the study, PPSv2 and EORTC QLQ-C15-PAL Scale minimum-maximum, mean, standard deviation and percentage values are presented. Additionally, correlation testing was used to determine the relationship between the results of the Palliative Performance Scale and the EORTC QLQ-C15-PAL Scale. The significance level was determined as $p<0.05$.

2.5. Ethical Considerations

Ethical approval was obtained from the Non-Interventional Research Ethics Committee of the relevant university (number: 2020/28-21). Institutional permission was granted by the hospital where the study was conducted. The participants were informed about the study. Verbal and written consent was obtained from the participants.

3. Results

In the study, 50.9% were women and 65.4% were aged 46 and over. 37.7% of the patients could do this with their own help, while 93.1% did not receive palliative care support from any institution (Table 1).

Table 1. Distribution of Patients' Sociodemographic and Diagnostic History Characteristics

n: 159	**n**	**%**
Gender		
Female	81	50.9
Male	78	49.1
Age		
Between 18-25	6	3.8
Between 26-35 arası	29	18.2
Between 36-45	20	12.6
46 and above	104	65.4
Education level		
Primary school	38	23.9
Middle school	22	13.8
High school	47	29.6
University	52	32.7
Working status		
Not working	98	61.6
Working part/full time	55	34.6
Self-employment	6	3.8
Financial situation		
Income less than expenses	79	49.7
Income equals expense	77	48.4
Income more than expenses	3	1.9
Disease stage		
Stage 3	60	37.7
Stage 4	99	62.3
Metastases presence		
Yes	84	52.8
None	75	47.2
Diagnosis		
Oncological	121	84.7
Hematological	38	15.3
Treatment form		
Chemotherapy	73	45.9
Radiotherapy	1	0.6
Chemotherapy and radiotherapy	65	40.9
Other	20	12.6
Performance status		
Can do their daily work	62	39.0
Can do their daily work with assistance	60	37.7
Cannot do their daily work	37	23.3
Status of receiving palliative care		
None	148	93.1
Yes	11	6.9
Status of receiving home care services		
No	122	76.7
Yes	37	23.3
Status of receiving financial support		
No	89	56.0
Yes	70	44.0

As seen in Table 2, patients frequently applied to the emergency department for the following reasons: pain 31.7%, dyspnea 16.2%, and nausea- vomiting 15.8%. In general, consultation was requested from 88.7% of the patients, and the most frequently consulted clinics were 49.8% internal medicine, 25.1% anaesthesia, 6.5% surgery and 6% chest diseases.

Table 2. Distribution of Reasons for Patients' Emergency Department Application

Patients' Emergency Department Application	**n**	**%**
Reasons for emergency department application		
Pain	82	31.7
Dyspnea	42	16.2
Nausea - Vomiting	41	15.8
General condition disorder	18	6.9
Weight loss - Loss of appetite	16	6.2
Abdominal distension	13	5.0
Palpitation	11	4.3
Fever	8	3.1
Weakness	8	3.1
Seizure	7	2.7
Others (cough, bleeding, chest tightness, fracture, bradycardia, ascites)	16	3.6
Was consultation requested?		
No	18	11.3
Yes	141	88.7
Clinics where consultation is requested		
Internal diseases	107	49.8
Anesthesia	54	25.1
Surgical	14	6.5
Neurology	12	5.6
Pulmonology	13	6
Gynecological diseases	6	2.8
Cardiology	6	2.8
Other (ENT and orthopedics)	3	1.4
Emergency department outcome		
Clinical hospitalization	61	38,4
Discharged	51	32,0
Intensive care hospitalization	37	23.3
Exitus	10	6.3
Interventions applied in the Emergency Department		
Radiological interventions	74	46.5
Blood product transfusion	11	6.9
Catheterization	40	25.2
Surgical procedures	2	1.3
Oxygen support	52	32.7
Other	76	47.8
- Arterial blood gas	232	41.2
- Blood and urine examination	74	13.1
Electrocardiogram	24	4.3
Intravenous hydration		
- Intubation	18	3.2
- drug therapy (paracetamol, strong and weak opioids, emergency drug use, antiemetics, bronchodilators, proton pump inhibitors, corticosteroids, antiepileptics, anticholinergics, electrolyte stabilizers, NSAIDs, antibiotic therapy)	222	41.9

*Patients selected more than one option

NSAID: Non-steroidal anti-inflammatory drugs

According to Table 2, the patients' emergency service visits resulted in 38.4% clinical admission, 32.1% discharge, 23.3% intensive care unit and 6.3% exitus. The patients' follow-up time in the emergency department was also determined to be a minimum of half an hour, a maximum of 5 hours, and an average of 1.9±1.2 hours. Arterial blood gas 47.8%, radiological interventions 46.5%, drug therapy 41.9%, blood and urine tests 41.2%, and oxygen support 32.7% were the most commonly used interventions on patients.

When we look at the extent of interventions provided to cancer patients who applied to the emergency department, 15.9% of the patients with pain complaints were weak opioids, 11.4% paracetamol and 0.4% strong opioid use were identified. Bronchodilator was applied to 8.2% of the patients and intubation was applied to 6.7% of the patients who came with dyspnea. Any antiemetic was given to 26.2% of the patients who complained of nausea and vomiting, and intravenous hydration was given to 16.9%. Electrocardiogram (ECG) recording was performed on 15% of the patients who presented with a complaint of general condition disorder, and emergency drug use was performed on 16% of the patients (Table 3).

Table 3. Distribution of Interventions Used in the Emergency Department for Patients with Complaints of Pain, Dyspnea, General Condition Disorder, and Nausea-Vomiting

Interventions Used in the Emergency Department for Patients with	**n**	**%**
Pain Complaint		
Blood, Urine Examination	101	41.2
Weak Opioid	39	15.9
Paracetamol	28	11.4
Electrocardiogram	24	9.8
Itravenous hydration	10	4.1
Antiemetic	10	4.1
Proton Pump Inhibitor	9	3.7
Anticholinergic	7	2.9
Nonsteroidal Anti-Inflammatory Drugs	7	2.9
Strong Opioid	1	0.4
Dyspnea Complaint		
Blood, Urine Examination	60	40
Electrocardiogram	30	20
Bronchodilator	17	8.2
Intubation	10	6.7
Corticosteroid	10	6.7
Intravenous hydration	8	5.3
Gen. Condition Disorder		
Blood, Urine Examination	15	20
Electrocardiogram	12	16
Emergency drug	8	10.7
Intubation	4	5,3
Intravenous hydration	33	44
Nausea- Vomiting		
Blood, Urine Examination	21	32.3
Antiemetic	17	26.2
Intravenous hydration	11	16.9
Paracetamol	7	10.8
Proton Pump Inhibitor	5	7.7
Electrocardiogram	3	4.6
Strong Opioid	1	0.4

*Patients selected more than one option

According to the distribution of PPSv2 results, PPS scores of 24.5% of the patients were 80 points, 8.2% had 90 points, and none of the patients had PPSv2 scores of 100 points (n=0). Patients with a PPSv2 score of 70 or less were determined to benefit from palliative care. In general, it has been determined that patients require assistance and care.

When the scale score distribution in Table 4 is examined, it is discovered that the majority of the patients 66.7% had pain, difficulty sleeping 77.3%, and a decreased appetite 71.1%. The mean scores of the patients from the scale sub-dimensions were 8.1±2.80 for the physical sub-dimension, 7.02±1.43 for the emotional sub-dimension, 6.79±1.24 for the fatigue sub-dimension, and 5.89±1.21 for the global health sub-dimension. The scale's mean total score was discovered to be 44.50±6.66 (Table 5).

4. Discussion

The symptoms caused by the disease and the treatment are frequently the reason that cancer patients apply to the emergency department. Patients' symptoms could endanger their lives and increase mortality rates. Palliative care plays an important role in the fight against cancer by providing a comforting and trusting environment for both the patient and his family.

In our study, it was found that pain was the most common symptom in cancer patients coming to the emergency department. Pain was found to be the most common admission to the emergency department in a study conducted by Yaylaci and colleagues (4), with 22.2%, and dyspnea was found to be 30% in a study conducted by Kocak and colleagues. In a study conducted in the United States by Caterino and colleagues (17), it was discovered that the most common complaints of cancer patients who presented to the emergency department were pain in 62.1%, shortness of breath in 34.4%, and nausea and vomiting in 31.3%.

The average waiting time for the emergency department was determined as three hours, which is consistent with the literature (11,18,19). In a cohort study conducted in New York by Verhoef et al. (19), patients were subjected to numerous diagnostic tests (83% blood tests, 63% diagnostic imaging), and the average wait time in the emergency department was three and a half hours. According to Güney's (11) research, the average wait time in the emergency department is four hours. These interventions prolong patient wait times in the emergency department and increase the risk of infection in advanced cancer patients whose immune systems are

Table 4. Distribution of Patients' Responses to the EORTC QLQ-C15-PAL Scale

EORTC QLQ-C15-PAL Scale	**None**		**Little**		**Quite**		**Lot**	
	n	**%**	**n**	**%**	**n**	**%**	**n**	**%**
1. Do you have difficulty taking a short walk outside the house?	12	7.5	68	42.8	37	23.3	42	26.4
2.Do you need to spend most of the day sitting or lying down?	4	2.5	55	34.6	49	30.8	51	32.1
3. Do you need help with eating, dressing, washing and using the toilet?	36	22.6	51	32.1	29	18.2	43	27
4. Did you have shortness of breath?	79	49.7	47	29.6	18	11.3	15	9.4
5. Did you have pain?	0	0.0	53	33.3	66	41.5	40	25.2
6. Did you have trouble sleeping?	3	1.9	33	20.8	74	46.5	49	30.8
7. Have you felt weakness?	2	1.3	19	11.9	54	34.0	84	52.8
8. Has your appetite decreased?	7	4.4	39	24.5	44	27.7	69	43.4
9. Have you had nausea?	28	17.6	87	54.7	19	11.9	25	15.7
10. Have you constipated?	21	13.2	89	56.0	25	15.7	24	15.1
11. Have you tired?	0	0.0	13	8.2	68	42.8	78	49.1
12. Did your pain interfere with your daily activities?	0	0.0	8	5.0	42	26.4	109	68.6
13. Did you feel nervous?	0	0.0	11	6.9	30	18.9	118	74.2
14. Did you depressed?	6	3.8	36	22.6	13	8.2	104	65.4

	1	2	3	4	5	6
15. How would you rate your overall quality of life in the past week?	33 20.8	29 18.2	19 11.9	19 11.9	27 17.0	31 19.5

EORTC-QLQ C15-PAL: Quality of life in Palliative Cancer Care Patients

Patient Information Questionnaire Form, the Palliative Performance Scale (PPS), and (EORTC-QLQ C15-PAL: Quality of life in Palliative Cancer Care Patients) Scale.

Table 5. Distribution of Patients' Responses to the EORTC QLQ-C15-PAL Scale

Scale and Sub-Dimensions	n	Minimum	Maximum	X	Std
Physical Sub-Dimension	159	3.00	12.00	8.1069	2.809
Emotional Sub-Dimension	159	3.00	8.00	7.0252	1.431
Fatigue Sub-Dimension	159	3.00	8.00	6.7925	1.243
Global Health Sub-Dimension	159	3.00	8.00	5.8931	1.214
Scale Total Score	159	30.00	57.00	44.5031	6.666

EORTC-QLQ C15-PAL: Quality of life in Palliative Cancer Care Patients already suppressed. Patients' blood and urine tests can be checked at regular intervals with palliative care unit follow-up, allowing the situation to be detected early and the appropriate intervention to be implemented without the need for application to the emergency department (9, 20, 21). Literature data are compatible with our study.

In our study, 93% of patients did not receive palliative care support. Patients' emergency department visits are common in this context, and studies have shown that patients' palliative care support reduces the number of emergency department visits while improving patients' quality of life (2). There are no studies in Turkey on the diagnosis of palliative care needs in cancer patients admitted to the emergency departments. Palliative care should be integrated into emergency departments, which are considered the heart of a hospital and have the first emergency hospital entrances. Our finding is similar to Işıkber's study (3).

We believe that the majority of consultations are internal medicine because palliative care is not a speciality in Turkey and is integrated into the internal medicine unit, therefore a consultation with the palliative care unit cannot be sought. Many studies have been conducted on the integration of palliative care into the emergency department in other countries, but this issue has not received enough attention in Turkey (3,9,20,22). Richards et al. (9) conducted a study to develop a scale for use in the emergency department to assess the palliative care needs of cancer patients who presented to the emergency department. The devised scale was used to assess the patient's needs for palliative care when cancer patients were admitted to the emergency department by emergency medical staff. As a consequence of the study, it was shown that the established scale could quickly identify the palliative care requirements of cancer patients and that cancer patients who sought treatment at the emergency department assisted medical professionals in managing their treatment and care. In a study conducted in the United States by Kistler et al. (21), emergency service health personnel were asked to consult cancer patients with palliative care, and the palliative care team evaluated the patient and determined the appropriate treatment. As a result of the research, early referral of patients to palliative care was carried out.

When the outcomes of patients in the emergency department were examined, it was discovered that clinical hospitalizations were the most common. Early detection of symptoms that reduce patients' quality of life, as well as palliative care support and palliative care initiated by the emergency services, can improve these patients' quality of life (20, 21).

According to studies, patients who receive adequate palliative care support have fewer emergency department visits and hospitalizations (20-23). Based on these findings, it is predicted that increasing the quality of life of patients with adequate palliative care support in Turkey will reduce the frequency of emergency department visits.

According to the EORTC QLQ C15-PAL scale results applied to the patients, the majority of the patients had pain, difficulty sleeping, tiredness, a decreased appetite, and constipation issues. Kandarian et al. (20) conducted a randomized controlled pilot study with only the palliative care team for advanced-stage cancer patients admitted to the emergency department in New York. When advanced-stage cancer patients apply to the emergency department, the emergency services staff requests a consultation with the palliative care team. Following the patient's evaluation, inpatient or outpatient follow-up and treatment are initiated based on the patient's condition and the palliative care team's recommendation. As a result of the study, data were obtained indicating that patients' palliative care follow-ups began in less time, their physical and emotional health quality improved, and their visits to the emergency department decreased (20-22). It has been determined that providing patients with palliative care services reduces hospitalization and brings the patient to a more comfortable state (20). It is expected that a similar application in Turkey will improve patients' quality of life, provide pain control, and reduce other symptoms (anorexia, sleep problems, fatigue, and constipation).

According to the PPSv2 we used in our study, it was determined that patients with a scale score of 70 and below should receive palliative care support. 67.2% of patients in the study had a PPS score of 70 or less, and none of the patients had a PPSv2 score of 100. Due to the COVID-19 pandemic, changes were made to the structure and service areas of hospitals during our research, and the number of palliative care units required by cancer patients was reduced while services to COVID-19 patients were increased. As a result, there were delays in the follow-up of patients in need of palliative care, and they were unable to obtain adequate support. Studies have shown that regular palliative care support can improve patients' quality of life (19-20, 23-24).

In a study conducted in the United States by Caterino et al. (17), it was discovered that weak opioid use was preferred in patients with mild, moderate, and severe pain who applied to the emergency department with complaints of pain; it was also determined that antiemetic treatment was used in patients with nausea and vomiting (17,24). In our study, it was determined that the use of strong opioids was at the lowest level. This is because, according to the European Association for Palliative Care (EAPC) report, it is emphasized that physicians are hesitant to prescribe opioids due to legal procedures due to fear of physical or psychological dependence on strong opioids (25). Studies carried out abroad found that weak opioid and paracetamol group medications could not sufficiently control pain in cancer patients. They have symptoms of nausea and vomiting, lack of appetite, and weight loss along with an increase in the intensity of their pain, which lowers their quality of life. The quality of life and palliative performance scores of patients with advanced cancer will rise as long as the pain is adequately controlled. It is also thought that the frequency of admission to the emergency department of cancer patients will decrease as patients receive regular palliative care support (26-28).

Although palliative care services are offered in Turkey not only in palliative care units but also in oncology services the rate of not receiving palliative care follow-up may be due to the inadequate integration of these services into the health system as well as the lack of adequate information about palliative care. However, because they are unaware of the service they receive and because it is not called palliative care, patients and their relatives believe that they do not receive palliative care services. It is envisaged that by creating a separate emergency service for cancer patients, the burden on other emergency services will be reduced and patients will receive appropriate treatment and care from health personnel with sufficient knowledge and equipment.

This study was conducted in cancer patients who applied to the emergency department and in the specified hospitals. This is the limitation of the study. Another study limitation is the presence of the COVID-19 pandemic during the data collection process and therefore the numerical scarcity of cancer patients who applied to the emergency department.

5. Conclusion and Recommendations

As a result, it was determined in our study that the majority of the patients had pain, difficulty sleeping, and decreased appetite, the physical conditions of the patients who did not receive palliative care follow-up and the reasons for contacting the emergency department were mostly dyspnea and general condition disorder in patients with PPSv2 scores ranging from 0 to 70. In this context, it is critical that emergency departments maintain a communication network with palliative care units and home care services, and that all necessary information is provided. The quality of life of advanced cancer patients in Turkey can be improved by increasing the number of palliative care units to a sufficient level of services.

6. Contribution to the Field

This study was designed to determine the symptom burden, needs and procedures of cancer patients who applied to the emergency department. It is thought that the findings obtained from the study will benefit the rapid diagnosis of the palliative needs of cancer patients, the rapid structuring of the necessary consultations and the making of the interventions.

Ethical Aspect of the Research

Ethical approval was obtained from the Non-Interventional Research Ethics Committee of the relevant university (number: 2020/28-21). Institutional permission was obtained from the hospital where the research was conducted. Participants were informed about the study and their written and verbal consent were obtained.

Conflict of Interest

This article did not receive any financial fund. There is no conflict of interest regarding any person and/or institution.

Authorship Contribution

Concept: EA, ÖU; **Design:** ÖU; **Supervision:** ÖU; **Funding:** None; **Materials:** None; **Data Collection/ Processing:** EA; **Analysis/Interpretation:** EA; **Literature Review:** EA; **Manuscript Writing:** EA, ÖU; **Critical Review:** ÖU.

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