




## Nutritional Support in Palliative Care: The Dietitian's Critical Role

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### ABSTRACT

Palliative care is an approach aimed at improving the quality of life for patients and their families by identifying, assessing, and treating pain and other physical and psychological problems early in individuals struggling with serious illnesses, and preventing and alleviating disease-related problems. The effective functioning of the palliative care model greatly depends on the importance of a multidisciplinary team approach. Dietitians, as part of the healthcare team formed to meet the physical, psychological, and social needs of patients, play critical roles in initiating nutrition therapy, evaluating its effectiveness, monitoring progress, and creating nutrition plans for addressing disease-related nutritional problems. It is well known that failure to provide adequate nutritional support in palliative care negatively impacts the effectiveness of medical treatment and quality of life, leading to increased morbidity and mortality rates. Therefore, especially during the palliative care process, the active role of dietitians in the multidisciplinary team is crucial in improving the quality of life for palliative care patients and enhancing the effectiveness of medical treatment.

**Keywords:** Nutritional support; palliative care; nutrition; dietitian.

### Palyatif Bakımda Beslenme Desteği: Diyetisyenin Kritik Rolü

#### ÖZ

Palyatif bakım; ciddi hastalıklarla mücadele eden bireylerde ağrı ile diğer fiziksel ve psikolojik problemleri erken tanıyıp, değerlendirip, tedavi ederek, hastalıklarla ilişkili problemleri önlemek ve rahatlatmak yoluyla, hastaların ve ailelerinin yaşam kalitesini düzeltme yaklaşımıdır. Palyatif bakım modelinin etkin bir şekilde işlemesi için multidisipliner bir ekip çalışmasının önemi büyüktür. Hastaların fiziksel, psikolojik ve sosyal ihtiyaçlarını karşılamak üzere bir araya gelen sağlık çalışanlarından oluşan ekipte yer alan diyetisyenlerin beslenme tedavisinin başlatılması, etkinliğinin değerlendirilmesi, izlenmesi, hastalığa bağlı oluşan beslenme sorunlarına yönelik beslenme planlarının yapılması gibi önemli görevleri bulunmaktadır. Palyatif bakımda yeterli beslenme desteğinin sağlanamamasının tıbbi tedavinin etkinliğini ve yaşam kalitesini olumsuz yönde etkileyerek morbidite ve mortalite oranlarını artırdığı bilinmektedir. Bu nedenle özellikle palyatif bakım sürecinde, diyetisyenlerin multidisipliner ekipteki etkin rolü, palyatif bakım hastalarının yaşam kalitelerini iyileştirmede ve tıbbi tedavinin etkinliğinde büyük öneme sahiptir.

**Anahtar Kelimeler:** Beslenme desteği; palyatif bakım; beslenme; diyetisyen.

### INTRODUCTION

Palliative care is an approach that aims to improve the quality of life for patients and their families by identifying, assessing, and treating pain and other physical and psychological problems early, and preventing and alleviating problems associated with life-threatening diseases (1). Unlike traditional patient care models, it is a healthcare model with uniquely structured and specific care objectives (2). In recent years, advances in diagnostic and treatment strategies have extended the life expectancy of individuals, but despite the increased lifespan, a patient population has emerged who, although living longer, lose their functional abilities and quality of life during the disease process, and particularly experience many symptoms, such as pain, intensely (3). This population has special care needs, which are addressed by palliative care. Initially, palliative care focused on cancer patients, but over time, it has expanded to include individuals with chronic diseases such as cerebrovascular diseases, neurodegenerative diseases, human immunodeficiency virus (HIV)/ acquired immune deficiency syndrome (AIDS), congestive heart failure, chronic obstructive pulmonary diseases (COPD), diabetes, Alzheimer's, etc (4). The goal of palliative care is to alleviate pain and other symptoms caused by the while enhancing the individual's quality of life, with sensitivity to their social and

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cultural beliefs and values. Most patients receiving palliative care have multiple complex symptoms and issues arising from the advanced stages of their illnesses. The primary goal of palliative care is to manage and alleviate these symptoms (5).

### **The Importance of Nutritional Support in Palliative Care**

The prevalence of malnutrition is very high in palliative care patients. Gastrointestinal system problems, which are often seen as a result of illness, are among the most important issues that cause weight loss in these patients (6). Nausea, vomiting, esophagitis, stomatitis, dry mouth, reduced taste sensation, early satiety, diarrhea, and constipation are commonly seen in palliative care patients. These symptoms lead to a decrease in food intake and impaired absorption (7). When adequate nutritional support is not provided during the palliative phase, energy and protein balance deteriorate rapidly, leading to malnutrition, infections, and associated complications. Prolonged malnutrition results in impaired tissue function, delayed wound healing, immunosuppression, increased infection risk, reduced muscle, respiratory, and cardiac functions, prolonged hospital stays, and an increase in morbidity and mortality (8). Nutritional support provides energy support and helps in developing resistance against infections, minimizing muscle mass loss and pressure ulcers, allowing patients to maintain some degree of control, helping to preserve the sense of normalcy, and improving the patient's quality of life and sense of well-being (9). Numerous studies have highlighted the importance of nutritional support in palliative care (10-13). In a study examining the impact of nutritional status on the quality of life in palliative care patients, it was observed that well-nourished patients had higher scores in physical function, emotional health, and energy/vitality subdomains (10). Ruggeri et al. (2020) observed in their study evaluating the effect of nutrition on survival in cancer patients receiving palliative care that patients who received enteral nutrition support due to dysphagia had an average survival time extended by 22.1 weeks (11). Lundholm et al. (12) showed that nutritional support was a factor influencing survival in cachectic palliative care patients with solid tumors, with patients receiving nutritional support having longer survival times, improved energy balance, and increases in body fat percentage and maximum exercise capacity. Obling et al. (2019) conducted a study involving palliative chemotherapy for gastrointestinal cancer patients, in which those receiving home parenteral nutrition showed an increase in lean body mass compared to the control group, and it was also reported that nutritional support significantly contributed to the patients' quality of life (13).

### **Nutritional Support Objectives**

One of the primary and most important goals of nutritional support is the improvement of the quality of life (10). Nutritional approaches for palliative patients may vary depending on whether the patient is receiving treatment or is in a condition where treatment is no longer possible. This distinction is primarily determined by the indications for nutritional approaches and the expected survival prognosis. If patients are receiving active treatment, the

goal of nutritional support is to maintain the patient's general condition, thereby improving their tolerance to medical treatments. In the group of palliative patients receiving treatment, the primary objective of nutritional approaches is to improve quality of life and enable the continuation of treatment within its natural course. It has been observed that improving the quality of life in these patients can contribute positively to the treatment process (14). On the other hand, in patients who are not receiving active treatment and have no possibility of receiving treatment, the main goal of nutritional approaches is to delay early death due to malnutrition and extend the expected lifespan. In these patients, nutritional support should be evaluated based on factors such as the patient's nutritional status, habits, preferences, desires, and the expectations of the patient and their relatives. In this situation, quality of life is often considered a secondary goal (15).

### **Palliative Care Team**

In order to provide palliative care support effectively, a well-organized structure and efficient collaboration are required within the team. The palliative care team is made up of experienced and trained healthcare professionals and other specialists, who come together with a shared understanding of working towards common goals. The members of the team may vary depending on the needs of the patient (16). Palliative care team members typically include doctors, nurses, dietitians, physiotherapists, social workers, and psychologists. Doctors usually specialize in areas such as anesthesiology, oncology, and general medicine (16,17). Additionally, religious officials provide spiritual care and guidance to the patient (18,19). Family members or caregivers of the palliative care patient are also an important part of the palliative care team (20). The presence of healthcare professionals from different specialties within the team is crucial for managing complications related to illness and addressing the patient's concerns. As the number of professionals observing the patient from their specific areas of expertise increases, the patient's quality of life improves as well (21,22). A review aiming to explore when and how dynamic palliative care teams' function effectively, it was suggested that the ideal size of a palliative care team should range from 5 to 10 members, while it was argued that exceeding 20 professionals in the team might reduce its efficiency (23). Having professionals with diverse training, experience, and perspectives ensures that the best possible care is provided for the palliative care patient. Although the differences among team members might lead to conflicts, it is emphasized that a patient-centered approach within the palliative care team is essential for achieving success (24,25).

### **Role of the Dietitian**

Dietitians within the palliative care team are also an important part of the team, bringing their specialized training and experience. In palliative care patients, it is crucial to prevent malnutrition, stop the deterioration of nutritional status, improve metabolic conditions, regulate inflammation and the acute-phase response, promote anabolism, and ensure the patient's comfort and well-being (26-28). The dietitian plays a key role in providing

this support. Although there is insufficient data in the literature regarding the specific role of dietitians in palliative care, there is a lack of large-scale research on the dietitian's presence and contributions to the treatment process within the palliative care team (29). Nutritional care, however, is still an area that is not given sufficient attention when compared to medical diagnosis and treatment. The insufficient nutrition education in university curricula for healthcare professionals and the lack of understanding regarding the importance of nutrition as a key component of medical treatment contribute to the reduced focus on nutritional care. Yet, the secondary consequences of inadequate nutrition not only negatively affect the success of treatment but also lead to higher treatment costs (30). Research has shown that nutritional care provided to individuals at risk of malnutrition has a positive impact on both the patient's quality of life and the reduction of hospital healthcare costs (31). The Effect of Early Nutritional Therapy on Frailty, Functional Outcomes and Recovery of Malnourished Medical Inpatients Trial (EFFORT) in Switzerland also demonstrated that improving nutritional care reduces healthcare service costs (32).

A dietitian, as part of the palliative care service that requires a multidisciplinary approach, is responsible for the patient's nutrition. The primary responsibilities of the dietitian include initiating nutritional therapy, evaluating its effectiveness, monitoring progress, and developing nutrition interventions and plans to address nutrition-related issues caused by illness (26). In addition to the fundamental duties of the dietitian within the palliative care team, it is also important for the dietitian to adopt a solution-focused approach to nutritional problems. Providing nutritional support to a palliative care patient can present various challenges (27). In advanced stages of illness or during periods of treatment-related side effects such as nausea, anorexia, or fatigue, reduced food intake and unintended weight loss in the patient can create various concerns for the family and may even lead to conflicts with the patient (28). In such situations, it is important for the dietitian to provide the necessary nutritional information to both the family and the patient, and to address any unrealistic expectations the family may have regarding the benefits of nutrition (33). Forcing a patient to eat during this phase may not necessarily lead to a longer life or a sense of strength. In fact, this could cause discomfort for the patient instead of providing enjoyment from eating. Additionally, forcing the patient to eat can increase the risk of aspiration, which may worsen the patient's condition (34). The dietitian, as part of the palliative care team, should be aware of this and inform the patient's family or caregiver that pressure should not be applied regarding food intake. Instead, the dietitian should emphasize that the focus should be on offering foods that the patient prefers and that can help ensure their comfort (35).

It is also crucial for dietitians to manage the symptoms caused by the illness that affects the patient's nutritional status. If the patient is able to consume food orally, oral nutritional support should be provided based on the symptoms. In particular, gastrointestinal symptoms should be carefully assessed, and the nutrition plan should be tailored accordingly. In cases of diarrhea, increased fluid

intake and small, frequent meals are recommended. For constipation, the consumption of fruits and vegetables that the individual enjoys may be suggested. In addition, it should be explained to the patient's relatives that sugary, salty, and fatty diet restrictions applied to individuals with chronic diseases in the late palliative phase will not be appropriate (33,35,36). Along with the nutritional plan, caregivers should be provided with guidance on how the eating environment should be set up. For elderly patients, creating an enjoyable eating environment can positively affect food intake. Serving meals in small portions and preparing food in an appealing way can help create a mealtime atmosphere that the patient will enjoy (37).

One of the important responsibilities of the dietitian within the palliative care team is to be involved in planning the nutrition process for patients who will receive enteral or parenteral nutritional support (38). In patients who are unable to consume food orally, nutritional intake is provided through artificial nutrition and hydration (39). Artificial nutrition and hydration therapy is a medical procedure that requires a doctor's prescription and is based on solid scientific evidence (40). The dietitian, in collaboration with other team members, must develop the appropriate nutrition treatment plan for patients receiving artificial nutrition, taking into account factors such as the primary illness, other adjunctive/co-adjunctive treatments, medications, comorbidities, and prognosis (38).

## CONCLUSION

Providing nutritional support in palliative care is crucial for supplying energy to patients, preventing infections, minimizing muscle mass loss and pressure ulcers, and enhancing the patients' quality of life. Therefore, the active role of dietitians within the palliative care team, including monitoring patients' nutritional status and creating nutrition plans to address symptom control, is of significant importance. However, there is insufficient data in the literature regarding the specific role of dietitians in palliative care, and no large-scale studies have been conducted on the contributions of dietitians to the treatment process within the team. In this context, developing guidelines that highlight the role of dietitians in palliative care, as well as conducting more scientific research in this area, could help healthcare professionals better understand the importance of nutrition in the treatment process. This would also contribute to the development of more holistic approaches to patient care. Ultimately, this could lead to an improvement in the quality of life for palliative care patients, increase the effectiveness of medical treatments, and help reduce treatment costs.

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