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Starting Early Palliative Care for Suspected Lung Cancer Patient: a Case Series from Resource-limited Setting in Indonesia

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ABSTRACT

In Indonesia, where lung cancer is often diagnosed at advanced stages, palliative care (PC) faces challenges like cultural and resource limitations. This study presents three cases of suspected lung cancer at Soehadi General Hospital. Despite the lack of specific lung cancer treatment services, a multidisciplinary approach, in line with the Ministry of Health guidelines, was initiated on the first day of hospitalization. Involving specialists, nurses, and spiritual support, the team addressed patients' physical and emotional needs. The cases highlight the importance of early palliative care, even in resource-limited settings, emphasizing its potential to enhance patient care and family support.

Keywords: Healthcare, Lung Cancer, Palliative Care, Patient Care, Quality of Life, Survival

INTRODUCTION

Lung cancer is a malignancy that is experienced by many people in Indonesia. It ranks 3rd in women and 5th in men. The number of cases of lung cancer is increasing, along with an increasing life expectancy and an increasing number of smokers at a young age. Unfortunately, of all diagnosed cases, around 80% are identified at an advanced stage. With a 5-year survival rate of only about 6%, most patients with advanced cancer die in hospital [1,2]. Literature studies found that the place where terminal cancer patients die is most often in their homes [3]. In cases of terminal illness such as lung cancer, patients and their families can experience a heavy emotional burden, which results in suffering and reduced quality of life (QoL) [2].

Palliative care (PC) is a form of holistic health services provided to all patients who experience a high health burden due to a serious illness or are at the end of their lives. Palliative care aims to alleviate suffering and improve QoL for both patients and caregivers [2,4]. According to the World Health Organization (WHO), palliative care can be given at any time throughout the course of the patient's illness [2,5,6]. Palliative care with an interprofessional collaboration approach plays an important role in providing services not only to patients, but also to their families and caregivers [7]. However, the implementation of palliative care

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in Indonesia has not been optimal, mainly due to the lack of adequate resources and knowledge [8]. Lung cancer patients generally receive palliative care only after standard therapy is judged to be ineffective or has failed [9]. Here we present cases of lung cancer treated in non-central lung malignancy health facilities with limited resources and the role of early palliative care (EPC).

CASE PRESENTATION

Presentation of the case series follows the guidelines prepared by Carey et al., 2003 [10]. We report 3 cases of lung cancer who were hospitalized after coming to the emergency department (ED) with complaints of severe shortness of breath. Soehadi General Hospital has supporting facilities for cytology and radiology examinations with contrast, but lung cancer treatment services (chemotherapy or radiotherapy) are not yet available because there are no thoracic oncologists. A multidisciplinary approach involving pulmonologists, oncologists, cardiologists, nutritionists, nurses, and spiritual support as part of palliative care as determined by the Ministry of Health of the Republic of Indonesia was carried out on 2 patients from the first day of hospitalization, while the last patient receives PC late after suspicion of lung cancer. All patient vital signs monitoring data during treatment are shown in Figure 1. This case series demonstrates the implementation of early palliative care in facilities other than oncology centers, starting from the time of diagnosis until the patient receives treatment at a cancer service center or until the end-of-life stage (Figure 2).

Case 1: A 57-year-old male patient, was referred to our emergency room with severe shortness of breath for 3 days. There is significant weight loss within 3 months (6 kg from 60 kg to 54 kg). There were no complaints of chest pain. The patient was referred from another hospital with suspicion of lung cancer and right pleural effusion from a chest x-ray. Follow-up examination of sputum cytology and CT scan revealed a mass in the right lung with pleural effusion and ascites presumably due to metastases. The pleural effusion was minimal so that pleural fluid was not collected, while the ascites fluid was drained by an internist. Treatment of the antibiotic combination gentamycin + cefotaxime because of suspicion of superimposed pneumonia. During patient care, we engage cardiologists and internists to treat the patient's physical symptoms, as well as spiritual support. After serious discussions from the multidisciplinary team including oncologists, the patient and his family understand the benefits of referral to a lung cancer treatment center at another hospital.

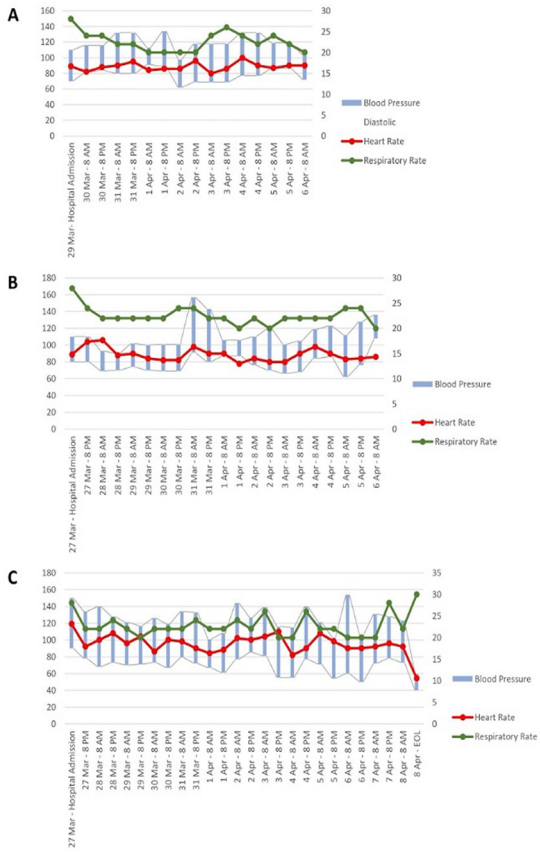

Figure 1: Daily Vital Sign Monitoring of case 1 (A), case 2 (B), and case 3 (C)

The outcome of this approach is that caregivers from cases 1 and 2 are satisfied and understand the next treatment plan, which requires referral to a health center for lung cancer treatment services. Case 3 caregivers are still in the denial phase and are in bereavement services.

Case 2: A 50-year-old female patient, came with complaints of shortness of breath and chest pain for 3 days. The patient has a history of post-radical mastectomy right mammary carcinoma and is currently undergoing a chemotherapy protocol. Shortness of breath is felt, especially when lying on the right side. Chest pain VAS 4-5 and comes from the right chest. Chest x-ray showing right pleural effusion. Pleural fluid collection revealed clear yellow pleural fluid. CT scan and pleural

fluid cytology showed adenocarcinoma. To relieve symptoms, the patient received injected steroids and diuretics. The addition of NSAID injections aims to reduce patient complaints of pain. We assessed that the patient did not need opioids because the pain was mild. We diagnosed a patient with malignant pleural effusion due to suspected metastases from breast carcinoma. The patient's hospital treatment was carried out for 8 days before the patient was discharged, and her complaints improved. After receiving explanations from the multidisciplinary team, including oncologists, the patient and her family agreed to be referred to a hospital with more complete facilities for biopsies and treatment.

Case 3: A 45-year-old woman came to our emergency room because of severe shortness of breath for 2 days and lower abdominal pain; she was undergoing treatment for pulmonary TB in the 2nd week. Chest X-ray shows minimal pleural effusion. There were no complaints of abnormal bleeding from the vagina. During treatment, we did not give painkillers because the complaint of abdominal pain was intermittent with unknown etiology. Further investigation with a CT scan found cervical, kidney and lung masses suspicious of metastases. We immediately engage a multidisciplinary team and provide spiritual support upon suspicion of malignancy. However, the patient died peacefully shortly after completing the radiological examination. After we involved a multidisciplinary medical team and spiritual support, the patient's family accepted the patient's death.

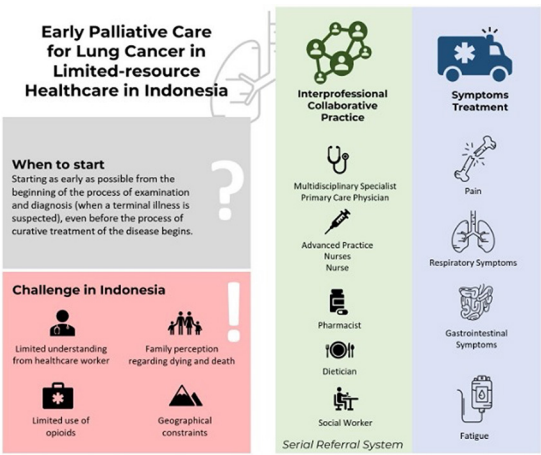

Figure 2. Implementing Early Palliative Care in Indonesia [2,7–9,11]

DISCUSSION

This case report demonstrates the advantages of involving other specialists (oncologists, radiologists, cardiologists, and pulmonologists) in initial palliative care. Integration of palliative care from the start of diagnosis can help patients and families navigate difficult times and plan and prepare for effective and efficient ongoing care. This palliative care program aims to improve patients' QoL, optimize health financing, increase satisfaction with oncology care, and provide psychological and spiritual support, regardless of illness [2,4,5]. A meta-analysis involving more than 2500 adult patients showed that early palliative care in cancer cases improves the patient's QoL [12].

In Indonesia, palliative care was first developed in 1992 in Surabaya. However, until now, palliative care in Indonesia is still very limited and only available in a number of government hospitals in big cities. Obstacles faced in palliative care are the limited knowledge of health workers regarding palliative care, limited access to opioids, and geographic problems [8]. Other obstacles that arise from society are the lack of education about palliative care, the desire for curative treatment, and taboos when it comes to death.

Primary care is the front line of community-based health services that interact the most with patients. In Indonesia, primary care is generally provided at community health centers (Puskesmas) or regional hospitals with limited facilities and resources. Patients with terminal illness, advanced chronic disease or end-of-life care generally live in a community environment, so primary care professionals must be able to identify and provide the services needed, including palliative care [4,13]. To bridge this need, the Ministry of Health of the Republic of Indonesia has issued technical guidelines for palliative therapy aimed at introducing and assisting in the distribution of these services in health facilities [14].

Regarding when the initiation of palliative care begins for patients is still being debated, and there is a lack of scientific evidence regarding this [2,12,13]. Meta-analysis regarding PC shows that EPC improves QoL of cancer patients compared to standard care. The initiation of EPC from each clinical trial is different, so there is no set time for starting therapy. However, there is one thing in common: palliative care begins at the same time

or around the time of diagnosis of cancer [12]. This is certainly different from the current paradigm of health workers in Indonesia, who view palliative therapy as being given when curative treatment is considered optimal and the prognosis is poor [8,12].

CONCLUSION

PC for lung cancer or metastatic patients can be started as early as possible since the patient comes to the emergency room with suspected lung malignancy. EPC can also be carried out in health centers with limited resources without a separate palliative unit. The application of PC from the start can help patients and caregivers deal with health conditions, alleviate suffering, and maintain or even improve QoL at the end of life. This can open up new insights regarding the implementation of early palliative care in Indonesia.

Ethics Approval and Consent to Participate: All participants and the doctor in charge of the patient have given consent to be involved in this case report.

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