



INTISARI

Nefrotoksisitas merupakan efek toksik yang dapat timbul akibat penggunaan agen kemoterapi berbasis platina pada *Non-Small Cell Lung Cancer* (NSCLC). Penelitian mengenai prevalensi kejadian nefrotoksisitas dan faktor yang memengaruhinya belum banyak ditemukan di Indonesia. Penelitian ini bertujuan untuk mengetahui prevalensi kejadian nefrotoksisitas pascakemoterapi dan gambaran faktor risiko nefrotoksisitas pada pasien NSCLC.

Penelitian ini merupakan studi observasional retrospektif yang menggunakan rancangan *cross sectional*. Pengumpulan sampel dilakukan dengan teknik *total sampling* pada pasien yang dirawat inap untuk menjalani kemoterapi kanker dengan agen platinum di RSUP Dr. Sardjito selama periode 1 Januari 2014 s.d. 31 Desember 2017. Variabel yang dicurigai dapat memengaruhi kejadian nefrotoksisitas ditelusuri secara lengkap dan proporsinya ditentukan. Variabel-variabel tersebut dianalisis secara deskriptif.

Sebanyak 119 sampel memenuhi kriteria, yang terdiri dari 6 pasien dengan nefrotoksisitas dan 113 pasien tanpa nefrotoksisitas. Prevalensi nefrotoksisitas pascakemoterapi adalah 5,1%. Variabel yang dicurigai berkontribusi terhadap nefrotoksisitas adalah kreatinin serum prakemoterapi di atas normal (33,3%), BUN prakemoterapi di atas normal (18,2%), sisplatin dosis 70-89 mg/m² (15,8%), regimen sisplatin+vinorelbin (14,3%), hipoalbuminemia (11,8%), furosemid (9,5%), siklus kemoterapi pertama (7,5%), klirens kreatinin 10-49 mL/menit (6,5%), stadium IV (6,0%), usia lanjut (5,9%), dan merokok (5,9%). Prevalensi nefrotoksisitas pascakemoterapi pada pasien NSCLC di RSUP Dr. Sardjito termasuk rendah dengan 11 faktor risiko yang menyertainya.

Kata kunci: *Non-SmallCell Lung Cancer*, prevalensi, nefrotoksisitas, kemoterapi



ABSTRACT

Nephrotoxicity is a toxic effect that can arise due to use of platinum-based chemotherapy agents in Non-Small Cell Lung Cancer (NSCLC). Research on the prevalence of nephrotoxicity and the factors that influence it in NSCLC patients has not been found in Indonesia. This study aimed to determine the prevalence of post-chemotherapy nephrotoxicity and an overview of risk factors for post-chemotherapy nephrotoxicity.

This study was a retrospective observational study using a cross sectional design. Sample collection was done by total sampling in patients hospitalized to undergo cancer chemotherapy with platinum agents in Dr. Sardjito hospital during the period of January 1, 2014 s.d. December 31, 2017. Variables suspected of being able to influence the incidence of nephrotoxicity were thoroughly investigated and the proportion determined. Those variables were analyzed descriptively.

A total of 119 samples were consisted of 6 patients with nephrotoxicity and 113 patients without nephrotoxicity. The prevalence of post-chemotherapy nephrotoxicity is 5.1%. Variables suspected of contributing to nephrotoxicity were high serum creatinine level prechemotherapy (33.3%), high BUN level pre-chemotherapy (18.2%), cisplatin dose 70-89 mg/m² (15.8%), cisplatin+vinorelbine (14.3%), hypoalbuminemia (11.8%), furosemide (9.5%), first cycle chemotherapy (7.5%), creatinine clearance 10-49 mL/minute (6.5%), stage IV (6.0%), elderly (5.9%), and smoking (5.9%). Prevalence of post-chemotherapy nephrotoxicity in NSCLC patients at Dr. RSUP Sardjito is classified as low with eleven risk factors attached to it.

Keywords: Non-Small Cell Lung Cancer, prevalence, nephrotoxicity, chemotherapy