Peranan Rasio De Ritis, IL-6, CRP, dan Rasio CRP Albumin Terhadap Luaran Klinis Pasien Covid-19 Di RS Universitas Indonesia = The Role of De Ritis Ratio, IL-6, CRP, and Albumin CRP Ratio on Clinical Outcomes of Covid-19 Patients at the University Indonesia Hospitals

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Abstrak

Transformasi Virus SARS-CoV-2 menghasilkan evolusi virus. Pemahaman mekanisme COVID-19 membantu stratifikasi risiko dan memperkuat manajemen COVID-19. Peningkatan 16 hingga 53% enzim hepar pada pasien dengan infeksi SARS-COV-2 diperlukan telaah terkait dengan SGOT, SGPT dan rasio De ritis. Rangkaian respon inflamasi pada infeksi COVID-19 melibatkan interleukin-6 (IL-6), C-reactive protein (CRP) dan albumin berkorelasi langsung dengan derajat peradangan. Rasio CRP terhadap albumin merupakan indikator baru status inflamasi yang lebih andal dibandingkan CRP atau albumin saja. Luaran buruk pada penelitian jika selama perawatan terdapat perawatan di ruang intensif, penggunaan ventilator mekanik dan atau kematian. Penelitian ini mencoba menganalisis parameter fungsi hepar dan inflamasi pada 48 jam awal perawatan dalam memprediksi luaran buruk pasien dengan COVID-19. Sejumlah 66 data pasien yang terdiri dari 16 data luaran buruk diikutsertakan pada penelitian. Median SGOT,IL-6, CRP, albumin, dan rasio CRP/albumin bermakna dibandingkan kelompok luaran tidak buruk. Titik potong optimal IL-6, CRP dan Rasio CRP/Albumin dalam menentukan luaran buruk sebesar 60,03 pg/ml, 32,5 mg/L dan 10,5. Model prediksi luaran buruk COVID-19 disusun dari parameter komorbid hipertensi, diabetes dan rasio CRP/Albumin

.....Transformation SARS-CoV-2 virus resulted in the evolution of the virus. Understanding mechanisms of COVID-19 contributed for risk stratification and strengthening the management COVID-19. Elevated liver enzymes 16 to 53% in patients with SARS-COV-2 infection requires more concern especially SGOT, SGPT and De ritis ratio. The series of inflammatory responses in COVID-19 infection involving interleukin-6 (IL-6), C-reactive protein (CRP) and albumin directly correlates with the degree of inflammation. CRP to albumin ratio is a new indicator of inflammatory status that more reliable than CRP or albumin alone. Poor outcome stated if during treatment there was intensive care unit treatment, use of a mechanical ventilator and/or death. This study tries to analyze whether liver function and inflammation parameters in the initial 48 hours of treatment can be used to predict poor outcomes in patients with COVID-19. A total of 66 patient data consisting of 16 poor outcome data were included in the study. Median SGOT, IL-6, CRP, albumin, and CRP/albumin ratio were significant compared to the non-poor outcome group. The optimal cut points for IL-6, CRP and CRP/Albumin ratio in determining poor outcomes are 60.03 pg/ml, 32.5 mg/L and 10.5. The prediction model for poor outcomes for COVID-19 is compiled from the comorbid parameters of hypertension, diabetes and CRP/Albumin ratio