The Activity of Superoxide Dismutase, Catalase and Glutathione Peroxidase Enzymes in Metabolic Syndrome Women

Publons ID	37933352
Wos ID	WOS:000216716900002
Doi	
Title	The Activity of Superoxide Dismutase, Catalase and Glutathione Peroxidase Enzymes in Metabolic Syndrome Women
First Author	Winarsi, Hery; Wijayanti, Siwi P. M.; Purwanto, Agus;
Last Author	
Authors	Winarsi, H; Wijayanti, SPM; Purwanto, A;
Publish Date	2012
Journal Name	MAJALAH KEDOKTERAN BANDUNG-MKB-BANDUNG MEDICAL JOURNAL
Citation	6
Abstract	The low endogenous antioxidant status induced development of metabolic syndrome (MetS) condition. The aim of this research was to explore superoxide dismutase (SOD), catalase (Cat), and glutathione peroxidase (GSH-PX) plasma activity on metabolic syndrome women plasma. Respondents were thirty women with blood glucose level >normal, body mass index >25 kg/m(2), hypertrigliceridemic, low level cholesterol-high-density lipoprotein (HDL), the age >40 years and live in Purwokerto. Respondents' selection was started by a survey at internist polyclinic of Margono Soekarjo General Hospital Purwokerto. They were motivated and given an explanation about aim of the research, their diseases and development risk who were willing to be respondents were asked to sign the informed consent. Then, their body weight, height and blood pressure were measured. Their blood sample of 2 mL were taken intravenously and tested for blood glucose, triglyceride and HDL levels. Plasma was tested for the activities of SOD, Cat and GSH-PX enzymes. Presented data was mean + standard error. The antioxidant status of MetS women were 379.3 Unit/mg protein, 6.42 Ul/mL, 804.9 nmol/g protein respectively, and malondialdehyde (MDA) level was 2,943.4 pmol/mL. Therefore, they need food enrich antioxidant. In conclusions, peroxidase antioxidant status was similar shown by low SOD, catalase and glutathione peroxidase enzyme activity.
Publish Type	Journal
Publish Year	2012
Page Begin	7
Page End	12
lssn	0126-074X
Eissn	2338-6223
Url	https://www.webofscience.com/wos/woscc/full-record/WOS:000216716900002
Author	Dr Ir HERY WINARSI, M.S