P13 SHORT-TERM EFFECTS OF BRANCHED-CHAIN AMINO ACIDS ON LIVER FUNCTION TESTS IN CIRRHOTIC PATIENTS

Pisit Tangkijvanich¹, Varocha Mahachai², Supeecha Wittayalertpanya³, Vilailuk Ariyawongsopon², Sachapan Isarasena²

¹Department of Biochemistry, ²Department of Internal Medicine and ³Department of Pharmacology, Faculty of Medicine, Chulalongkorn University, Bangkok 10300, Thailand

ABSTRACT

A randomized study was conducted in 29 ambulatory cirrhotic patients to determine the short-term effects of branched-chain amino acids (BCAA) on nutritional status, biochemical liver function tests and caffeine clearance. Each patient received a 4-week period of isonitrogenous and isocaloric regimens, either a standardized diet contained 40 gm protein with supplementation of BCAA 150 gm daily (group I) or only a standardized diet contained 80 gm protein daily (group II). At the end of treatment, only group I showed significant improvements in transaminase levels as well as the caffeine clearance test compared with those of the pre-treatment levels. Nonetheless, significant improvements in nutritional parameters and additional liver function tests were not yet detected. We conclude that the short-term nutritional supplementation of BCAA is well tolerated and leads to improvement in hepatic metabolic capacity assessed by the caffeine clearance test.

Acknowledgement: We would like to thank Thai Otsuka Pharmaceutical Co. for providing Aminoleban-EN.