Original article

DETERMINING BNP AND NT PRO-BNP IN PATIENTS WITH THE ACUTE CORONARY SYNDROME

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Acute coronary syndrome represents a group of different clinical conditions resulting from an acute ischemia or myocardial necrosis caused most frequently by an acute coronary lesion formed by a rupture of atherosclerotic plaque in the coronary artery with a concurrent thrombosis, inflammation, vasoconstriction and micro-embolization.

Acute coronary syndrome can manifest as an unstable angina pectoris, an acute myocardial arrest with or without a ST elevation or as sudden cardiac death.

Determination of heart damage markers in the serum is particularly important to confirm the diagnosis of acute myocardial arrest without a ST elevation. Each increase in cardio specific enzymes signifies myocardial necrosis and meets the conditions for making the diagnosis of an acute myocardial arrest. Larsen et al. tested the importance of BNP, and Bazzino at al. of NT pro–BNP in patients with acute coronary syndrome (ACS). A high level of natriuretic peptides indicated a high risk of cardiac complications.

Our aim was to evaluate the importance of efficient determination of biochemical markers in ACS patients, importance in making the diagnosis, evaluation of treatment depending on the severity of clinical signs, as well as in the stratification of risk for coronary relapse.

The paper is a review of the importance BNP and NT pro-BNP as the new approaches in the diagnosis and treatment of ACS patients.

The goal was to show that the markers of heart function have a role in ACS settings. Furthermore, the study assessed the severity of clinical picture, complications and possible coronary relapses. Further studies will present some more elaborate data on their importance in risk stratification and decision-making in further management of these patients. *Acta Medica Medianae 2016;55(4):21-27.*

Key words: Acute Coronary Syndrome, Biochemical Markers, Natriuretic Peptides, BNP, NT pro-BNP