Low dose oral theophylline effects on HS-CRP in stable COPD patients

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Abstract

Background: Low dose theophylline may have some anti-inflammatory effects on COPD patients. This study was conducted to determine the effect of oral low dose theophylline on serum CRP level in patients with stable COPD.

Methods: In this double blind randomized clinical trial study, 50 patients (25 in experimental and 25 in placebo group) were enrolled into the study by randomized blocking method. Serum HS-CRP using ELISA method was measured before and after the study. Data was analyzed using t-test and paired t-test.

Results: There was no significant difference in gender, age, smoking and spirometry variables before study between two groups. Serum HS-CRP level remained the same between two groups before and after the intervention.

Conclusion: More studies with large sample size needed to find anti-inflammatory effect of theophylline on macrophages and neutrophils and their derivative inflammatory materials in COPD patients.

Keywords: chronic obstructive pulmonary disease (COPD), HS-CRP, theophylline.
ve outcomes in stable COPD patients. Prospects for new drugs for chronic obstructive pulmonary disease.

References