



Clinical value of surfactant protein-A in serum and sputum for pulmonary tuberculosis diagnosis

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ABSTRACT. The aim of this study was to explore the diagnostic and differential diagnosis value of surfactant protein-A (SP-A) in the serum and sputum for pulmonary tuberculosis. A total of 101 patients with pulmonary tuberculosis, 85 healthy volunteers, and 30 chronic obstructive pulmonary disease (COPD) patients were divided into pulmonary tuberculosis group, healthy control group, and COPD group, respectively. SP-A was determined in the serum and sputum in the three groups by enzyme-linked immunosorbent assay. The expression of SP-A in serum was significantly higher ($P < 0.05$) in the pulmonary tuberculosis group than in the healthy control and COPD groups. There were no differences in the SP-A expression in the sputum among the three groups. There was no significant effect of gender, age, tubercle bacillus antibodies, tuberculin purified protein derivative trial, leukocyte count, neutrophilic granulocyte, lymphocyte percentage, or lung cavities on SP-A levels in serum or sputum for the pulmonary tuberculosis group ($P > 0.05$). The detection of SP-A in serum and sputum was shown to be of great value for the diagnosis and differential diagnosis of pulmonary tuberculosis, and therefore merits further investigation.

Key words: Tuberculosis; Pulmonary; Sputum; Surfactant protein-A; Diagnosis