European Respiratory Society
Annual Congress 2013

Abstract Number: 5407

Publication Number: 1518

Abstract Group: 11.2. Pleural and Mediastinal Malignancies

Keyword 1: Pleura **Keyword 2:** Lung cancer / Oncology **Keyword 3:** Biomarkers

Title: Elevated survivin is associated with a reduced survival in patients with malignant pleural effusion

Dr. Didem 31966 Görgün didem_gorgun@yahoo.com MD [1], Dr. Pinar 31967 Yildiz pinary70@yahoo.com MD [1], Dr. Funda 31968 Secik fsecik@hotmail.com MD [1], Dr. Kenan 31969 Midilli pinary70@yahoo.com [2] and Dr. Vakur 31970 Akkaya pinary70@yahoo.com [3]. [1] Pulmonology, Yedikule Chest Disease and Surgery Training and Research Hospital, Istanbul, Turkey ; [2] Department of Clinical Microbiology, Istanbul University, Cerrahpasa School of Medicine, Istanbul, Turkey and [3] Internal Medicine, Istanbul University, Istanbul School of Medicine, Istanbul, Turkey .

Body: We aimed to show the prognostic value of survivin levels in malignant pleural effusion (MPE). METHODS: Fifty-one MPE patients were included in our study prospectively. We demonstrated that by quantifying survivin expression with enzyme-linked immunosorbent assay (ELISA) in the 51 effusion. The correlation between survivin level and survival in MPE were analyzed. RESULTS: Survivin level was 41.75 ± 76.20 in patients with MPE. There was no correlation between survivin level and age, sex, location, fluid pH, glucose, protein, albumine and ADA level while there was significant moderate correlation with fluid LDH ($r=0.49$; $p<0.001$). Elevated levels of survivin was related to reduced overall survival in Kaplan-Meier analysis. Survivin levels can distinguish patients who had poor prognosis (median survival 75 days, n=24) and those who had good prognosis (median survival 219 days, n=27, $p=0.03$) in MPE. Cox regression analysis was carried out for significant factors influencing survival. Survivin level, fluid LDH level and tumor type were included as independent factors. Only survivin level was retained as significant in backward elimination likelihood ratio test. In conclusion, elevated survivin levels is associated with poor survival in MPE. Our results suggest that survivin may be used as a prognostic marker in MPE.