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**Title:** Correlation between spirometry, six minute walk test and HRCT characteristics of patients with interstitial lung diseases in a tertiary care center in Sri Lanka

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**Body:** Background High Resolution Computed Tomography of Chest (HRCT) is a robust tool in the diagnosis of interstitial lung diseases (ILD), but its role as a tool of assessment of functional disability in ILD has not been assessed in Sri Lanka. Objectives To find out the correlation between spirometry, six minute walk test and HRCT characteristics of patients with ILDs Methods Study was done in chest unit, General Hospital, Kandy (GHK) from 1/ 2011 to 12/2011. Ethical clearance was granted by Ethical Committee of GHK. Patients with suspected ILDs on chest radiography and showed restrictive lung defect on spirometry underwent HRCT scan of the chest. Pathological findings of HRCT (parenchymal nodules, fibrosis, ground glass and mosaic perfusion) were given a score using the scoring system used by Ziora et al (Ann Agric Environ Med 2005, 12, 31–34). Six minute walking test was performed. Correlations were analyzed using Pearsons and Spearmans correlation coefficient. Results Twenty one patients {5 (23.8%) males, 16 (76.2%) females} with ILD were studied. There was a significant positive correlation between resting saturation and forced vital capacity (FVC) ( $r = 0.52$ ,  $p = 0.02$ ), resting saturation and forced expiratory volume in 1 second (FEV1) ( $r = 0.549$ ,  $p = 0.012$ ), six minute walk distance and FVC ( $r = 0.505$ ,  $p = 0.023$ ). There were no correlations between HRCT scores with spirometry, and six minute walk test parameters. Conclusion Although there was a correlation between spirometry and six minute walk test, pathological distribution described by HRCT showed no correlation with spirometry or six minute walk test in patients with ILD.