pulmonary funcation in children with chronic renal failure on regular hemodialysis

ahmed mohamed abd el monem

In CRF patients, mechanical and haemodynamic changes couldoccur in the lung without obvious pulmonary symptoms and findings, andtheir effects could pave way to pulmonary function disorders, also RRTmay result in complications which may affect the lung directly or throughinterference of lung mechanics.A large number of pathological changes have been described in thelungs of uremic patients, such as; uremic pleuritis, pleural fibrosis,uremic pneumonia, interstitial fibrosis, pulmonary arteriosclerosis andthromboembolism, pulmonary haemorrhage, metastatic pulmonarycalcifications, and pulmonary infections.The most common pathological condition of the lungs in CRF ispulmonary edema, usually due to complication of fluid overload andabnormal permeability of the pulmonary microcirculation.In this study we aimed to identify the pulmonary function disordersin CRF patients and study the need for testing for them in certain patientsgroups.The study included 25 patients with different degrees of renalimpairment. Their age varied between 9 and 18 years. 11 were males and14 were females. It was carried out in the pediatric department, BenhaUniversity Hospital.They were subjected to : Basic laboratory investigations including CBC, blood gas analysis,BUN, creatinine, albumin and electrolytes. Estimation of GFR level.Summary 87 PFT including (flow volume loop curve), DLCo and lung volumes(TLC & RV).Patients were classified according to their GFR into 3 groups;GFR: