

Original Article: Prevalence of Abnormal Thrombophilia Profile in Chronic Kidney Disease

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ABSTRACT Objective: To determine the prevalence of altered thrombophilia in chronic kidney disease. Study Design: Descriptive retrospective study Place and duration of study: The study was conducted at Isra University hospital from June 2019 to December 2020 Material and Methods: 150 patients of stage 3, 4 and 5 of chronic kidney disease were enrolled in the study. Patients with stage 1 and 2 chronic kidney disease and on anticoagulation treatment were excluded from study. Stages of chronic kidney disease were classified according to KDIGO criteria. Thrombophilia screening for Antithrombin-III, protein C, protein S, Lupus anticoagulant and Activated Protein C was performed on coagulation analyzer. Findings were recorded and data were analyzed by SPSS version 25 Results: Fifty Seven out of 150 patients were positive for thrombophilia screening with Antithrombin-III deficiency in 28.3%, Protein C deficiency in 7.9%, Protein S deficiency in 3.3%, Lupus anticoagulant in 6.6% and activated Protein C resistance in 2.0%. Out of 43 Antithrombin-III deficient patients, 53.4% (n=23) were on hemodialysis. Out of 12 Protein C deficient patients, 58.3% (n=7) were on hemodialysis. Out of 10 patients with lupus anticoagulant, 60% (n=6) were on hemodialysis and out of 3 patients with Activated Protein C resistance, 33.3% (n=1) were on hemodialysis. Conclusion: In this study, Antithrombin-III deficiency was most common finding in CKD and thrombophilia was most common in stage 5 chronic kidney disease and lupus anticoagulant was common finding in relation to hemodialysis. More studies are needed to define true significance of thrombophilia screening in all stages of CKD patients.