

ABSTRACT

AIM OF THE STUDY:

The aim of this study is to compare and correlate the salivary and serum creatinine levels in patients with chronic kidney disease.

METHODOLOGY:

The study consisted of 50 individuals with stage 4 and stage 5 chronic kidney disease. In the study population out of 50 individuals, 34 were males and 16 were females. Based on their estimated GFR, 31 patients were classified into stage 4 CKD (GFR: 15–30 mL/min) and 19 patients into stage 5 CKD (GFR: <15 mL/min). Patients with stage 4 CKD were only under medical management without dialysis. Among 19 patients with stage 5 CKD patients, 12 were undergoing haemodialysis and 7 were undergoing peritoneal dialysis along with medical management. The 2ml of saliva and 2ml of blood samples were collected from the study subjects.

The samples (saliva and serum) were centrifuged and assayed immediately in automatic analyser using creatinine estimation kit by Jaffe kinetic reaction. The data obtained from the study were statistically analysed.

RESULTS :

The result shows that there is a significant correlation between salivary creatinine and serum creatinine in stage 4 and stage 5 CKD subjects with a statistically significant p value of $p < 0.000$.

CONCLUSION :

Correlation was obtained between salivary creatinine and serum creatinine in stage 4 and stage 5 CKD subjects and thus saliva can be used as a non-invasive alternative to serum for creatinine estimation.

Key Words: Chronic Kidney Disease, Salivary Creatinine, Serum Creatinine.