Abstract

Introduction

We conducted an observational study to evaluate the trends of AKI and its outcome seen in medical wards in a tertiary care referral hospital.

Methods

The study was a prospective observational study. It was conducted at Stanley Medical College. Data were collected from Medical wards in Government Stanley Hospital. Totally 102 patients of AKI were included in this study from January 2015 to August 2015. The main trends of AKI presentation and its outcome were assessed.

Results

Of 102 patients admitted, 42 had a sepsis-related diagnosis (42.41%). Among septic patients 37 (40.66%) were recovered from AKI; 5 patients (45.45%) were not recovered (P<0.7523); 17 patients (17.16%) had cardiovascular disease related AKI; 12 patients (12.12%) had developed AKI due to drugs and poisons, of which 8 patients (8.79%) were recovered and 4 patients (36.36%) were not recovered (P<0.0030).

For AKI stratified by RIFLE (risk of renal failure, injury to the kidney, failure of kidney function, loss of kidney function and end-stage kidney disease) category, 43.96% of patients belonged to the risk category, 30.77% to the injury category. Of 34 patients in failure category 23 (25.27%) were recovered 11 (100%) were not recovered (P<0.0388).

In patients belonging to recovered group, the over all mean serum creatinine values were 2.05 mg/dl, in non recovered group it is 3.42 mg/dl (P value is < 0.0173).

In patients of recovered group, the overall mean urine output values is 783 ml/day; in deterioration group, 445 ml/day (P value is < 0.0048).

CONCLUSIONS

1. Common causes of AKI in this study include, sepsis, cardiovascular diseases, drugs and poisons, and diarrhoeal disease in order of occurrence.
2. Among the patients who had AKI due to sepsis scrub typhus topped the list followed by leptospirosis and falciparum malaria.

3. Higher values of serum creatinine at admission and oliguria were the most significant factors that contributed to non recovery from acute kidney injury.