



ORIGINAL RESEARCH PAPER

General Medicine

A SUCCESSFUL TREATMENT OF SUSPECTED ACUTE KIDNEY INJURY BY FORCED ALKALINE DIURESIS IN CASE OF SNAKE BITE

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ABSTRACT

snake bite is one of few toxins/poisons for which we have readily available antidots. Snake bite is a preventable public hazard. With known complications, acute kidney injury is a common complication in haemotoxic snakes.

INTRODUCTION

Role of FAD in preventing the Acute Kidney Injury :

Forced alkaline diuresis will decrease the passive reabsorption from the proximal renal tubules, thereby increasing the clearance of many nephrotoxic contents such as haemorrhagins, myoglobin's because of rhabdomyolysis from cellulitis, help in preventing the acute tubular necrosis caused by these agents.

AKI is defined as an abrupt (within 48 hours) absolute increase in the serum creatinine concentration of ≥ 0.3 mg/dL from baseline value measured after admission in our hospital or

percentage increase in the serum creatinine concentration of $\geq 50\%$ above baseline after snake bite; or

urine output less than 0.5 mL/kg per hour for more than 6 hours.



METHOD FOR FORCED ALKALINE DIURESIS :

Inj. Frusemide 20 mg iv bolus
 Followed by
 Inj sodium bicarbonate 40 meq in 500 ml of normal saline over 30 min.
 Followed by
 Another 40meq of inj. Sodium bicarbonate in 500 ml of ringer lactate over 30min
 followed by
 Inj KCL 20meq in 500ml of D5 over 90min.
 Inj. Mannitol 100cc over 30min 19/05/22
 12 pm Hb: 11.5 Urine microscopy- NAD
 6 pm Hb: 7.5 Urine microscopy- 200-300RBCs
 CK -1539 U/L. LDH- 559 U/L
 20/5/22
 Urine Microscopy - NAD

Urine Examination (20-May-2022 01:37) - (1905221086-CENTRAL LAB - IPD)

*Patient Name : KALUBHAI (24/M)
 Sample Parameters*

*Sample Material : Urine
 Container : Plain
 Quality of Sample : Good*

*Quantity : 20
 Colour : Reddish
 Appearance : Clear
 Albumin : Trace
 Sugar : NIL
 Pus Cells : 30-40
 Red Blood Cells : 200-300
 Crystals : not seen
 Casts : not seen*

General Details

CASE STUDY

A 52 year old male pt admitted to new civil hospital surat on 19/05/2022 at 12pm with alleged history of snake bite at farm possibly viper group .After arrival in ward . Pt was vitally stable having ptosis And swelling at bite area.

No convulsion , no bleeding from local site , no hematuria (clear urine after catheterization) .There were no any signs of hematuria or bleeding from any orifice .Initially pt was treated for envenomation , Whole blood clotting time is <20 min and inj ASV and Neostigmine- atropine given.

Respiratory effort reduced and single breadh count is < 10 so prophylactic intubation done. At around 6 pm, patient developed hematuria and urine output was less than 0.5ml /kg/hr and CK , LDH and urine routine microscopy done comes abnormally high. In the present study, effect of crumb rubber as fine aggregate replacement on the compressive strength of concrete having mix proportions of 1:1.31:1.14 was investigated. The percentages of replacements were 0%, 10 % , 20% and 30% by weight of fine aggregate. Tests were performed for compressive strength or all replacement levels of crumb rubber at different curing periods (7-days & 28-days).

CONCLUSIONS

acute kidney injury due to snake bite can be prevented effectively by timely forced alkaline diuresis. However further case series is Required for affirmation

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