

A 23-year-old male felt puffy, weak, and tired for several months. He suddenly noticed his urine had a red to brown discoloration and the volume was minimal. He went to the emergency room of a nearby hospital and the following data were obtained upon examination and testing:

Hematology:

Serum sodium	125 mEq/L
Serum potassium	6 mEq/L
Serum creatinine	2.6 mg/dL
BUN	24.0 mg/dL
pH (arterial)	7.32
Hematocrit	25%

Urinalysis:

Appearance	Red to brown
Specific gravity	1.025
Blood	Positive
Glucose	Negative
Protein	Mild

Renal Function Tests:

GFR (glomerular filtration rate)	40 mL/min
RBF (renal blood flow)	280 mL/min

1a. What is the disorder of this individual?

1b. What situation(s) predispose an individual to this disorder?

2. Define hyponatremia and hyperkalemia.

3. What is the cause of the hyponatremia and hyperkalemia?

4. Why is there blood in the urine?

5. How do the renal function tests for this individual compare to normal?

6. What caused the puffy feeling?

7. What type of treatment does this person need?

8. Is this person a candidate for kidney dialysis? Explain your answer.