N202 Unit I

Class Preparation Assignment – Sepsis Case Study

Patient Story

73-year-old man is brought to the emergency department via ambulance after being found unresponsive by his wide.

Assessment: Opens eyes but does not follow commands. Skin is warm & flushed. Lungs are clear bilaterally. Abdomen is benign with normoactive bowel sounds. Trace edema is noted in the bilateral lower extremities. A large wound is found on the right arm – erythema, moderate amount of yellow drainage (wife states this is from a gardening accident that happened a few days prior).

Vital Signs: HR 114, BP 96/52, RR 24, T 101.5, SpO2 96% on RA

Labs:

WBC	19.2	Na	144	Procal	0.6
Hgb	16	K	4.9	Lactate	2.9
Hct	44	Glu	135		
Plt	249	Cr	1.4		

Questions:

1. **What assessment findings from the information above require follow-up by the nurse? Give rationale for your choices.**

The following assessment findings require follow-up by the nurse… opens eyes but does not follow commands, skin warm & flushed, bilateral trace edema, large wound on R arm (erythema, yellow drainage), WBC 19.2 (↑), lactate 2.9 (↑), HR 114 (↑), BP 96/52 (↓), T 101.5 (↑), RR 24 (↑).

Mental status, skin appearance, large wound with erythema & yellow drainage, WBC 19.2, HR 114, BP 96/52, temp 101.5, RR 24 are all triggering signs of infection.

Lactate 2.9, HR 114, & RR 24 are all signs of increased risk of respiratory failure due to decreased tissue perfusion = decreased oxygen.

2. **The nurse recognizes that based on the patient's history and diagnosis, he is currently at risk for complications, especially sepsis, respiratory failure and AKI.**

Options:

Septic shock
Fluid Overload
Respiratory Failure
Hypertensive Crisis
Coronary Vessel Occlusion
Acute Kidney Injury

Story Progression

The patient is transferred to a stepdown unit. The admitting nurse is reviewing orders for cultures and antibiotics. The patient is receiving IV fluids at 150 mL/hr after receiving two 500 mL NS bolus in the emergency department.

Assessment: Awake but confused – complaining of pain in right arm. Voided 500 mL of dark amber urine.

Vital Signs: HR 100, BP 104/88, RR 22, T 101, SpO2 97% on 2L NC

3. **Use an X for the nursing action identifying if that task is indicated, contraindicated, or nonessential.**

Nursing Action:	Indicated	Contraindicated	Nonessential
Start antibiotics prior to initiating other orders		X	
Obtain blood cultures prior to initiating other orders	X		
Change arm dressing every 2 hours			X
Administer pain medication	X		
Measure intake & output every 1 hour	X		
Apply soft restraints to prevent falls		X	

4. **When considering the patient's ongoing fluid responsiveness and organ perfusion, what assessments would be a priority for the nurse to continue to monitor? Provide at least two with rationale.**

A priority assessment to evaluate fluid responsiveness and organ perfusion would be blood pressure. Starting with a blood pressure of 96/52 indicates the need for fluid replacement to increase the blood pressure so adequate perfusion is happening. That is why two 500mL boluses were given and in response to blood pressure increased to 104/88.

Another priority assessment would be to evaluate intake and output. Monitoring I&Os every hour ensure fluid overload does not become an issue while fluid replacement is ordered. Along with a stable output indicates adequate organ perfusion, especially to the kidneys avoiding an AKI.