

SAQ 1

You are the duty consultant. A 30 year old patient is being brought in by the paramedics as a priority 1 patient (ETA 5 mins). He was found hanging by his friend at home. Initial rhythm was PEA. The paramedics have been working on the patient for 55 mins and the patient has not regained circulation. You have been informed that patient is intubated and there is an IO access in.

1. How will you generally prepare for the patient arrival (4marks)

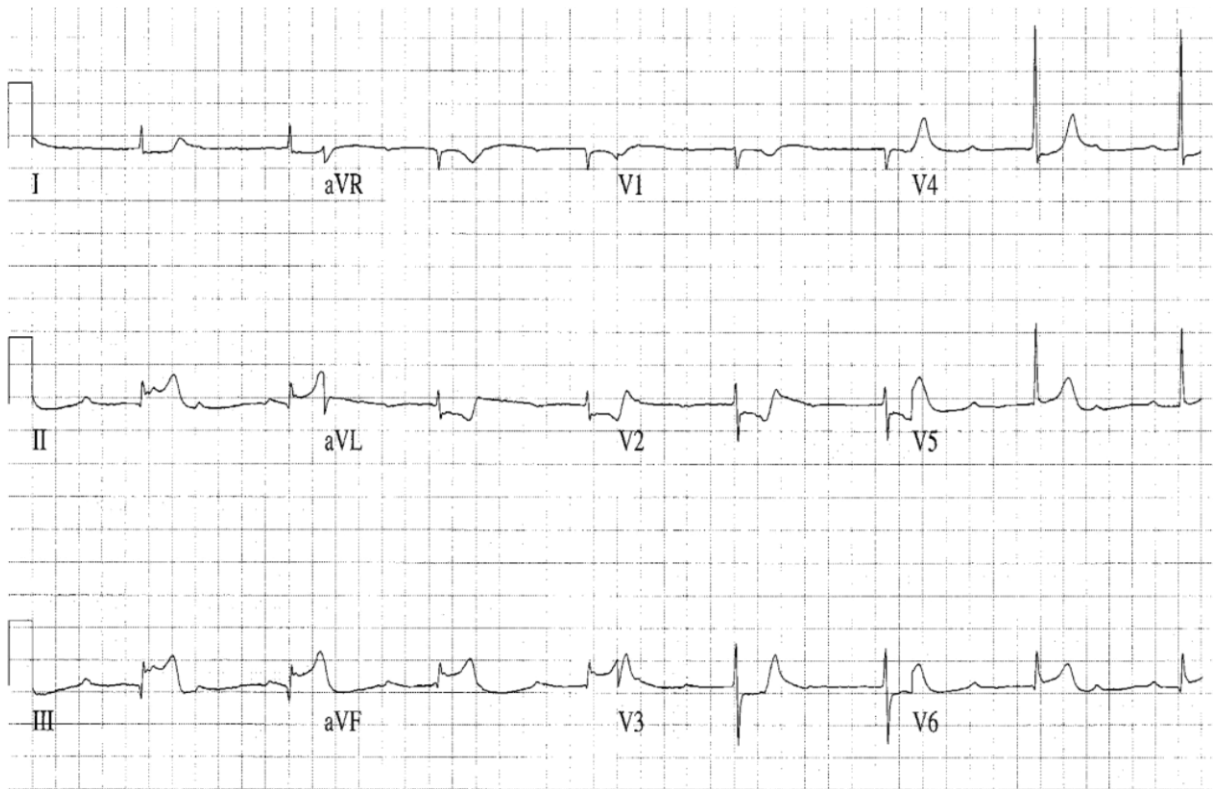
2. A decision was made to call off the resuscitation attempt immediately after patient arrival. Describe what next steps you will take (6marks)

SAQ 2

A 60 year old male presents to you Emergency Department complaining of chest pain for the last 2 hours. He has no known medication history and does not take any regular medications.

His ECG on arrival is below.

1. What is your interpretation of his ECG ? (3 Marks)



2. The patient's blood pressure is 80mmHg. Outline the key steps in managing his hypotension. (4 Marks)

3. The cardiology team have advised you to commence the patient on a vasoactive agent to improve his blood pressure. List 3 appropriate inotropes / vasopressors and their dosing below. (3 Marks)

Q3

A two month old infant has been brought in following a brief seizure. She has had coryzal symptoms and high fevers for two days. She has no relevant past history and no allergies. On examination: HR 110, BP 80/45, Temp 39.7. There is no rash & no clear focus of infection but the child is ill-appearing and drowsy.

(1) What investigations are required?

Investigation	Justification

A lumbar puncture is performed

CSF white cell count

 Neutrophils 120 (nil)

 Lymphocytes 25 (<5)

CSF red cell count 200

CSF Protein 1.2 (< 0.4 g/L)

CSF glucose 0.4 (> 2.5 mmol/L)

(2) Interpret these results

Q4

A factory worker presents to your department with 3% body surface area burns to his hands & forearms from a 100% hydrofluoric acid solution.

1. What percentage of body surface area burns would be expected to be associated with systemic toxicity from this acid and how does it cause toxicity? (3 marks)

2. List 3 investigations that may be useful to help determine further management of this patient and describe the abnormality that may be detected.(3Marks)

3. Name the antidote used to treat hydrofluoric acid toxicity. (1 mark)

4. List 3 routes by which it may be administered & the dose typically used for each route. 3 marks.

Q5. This 32 year old male lost control of a high pressure injector and comes in with a wound on his left lower leg.



1. List three complications that are likely to occur within the next 48 hours (3)

SAQ 6

A 3 yr old child is brought into ED with a history of having ingested 'at least' 20 of her mother's iron tablets.

1a) List 2 clinical features of significant iron toxicity that are likely to be seen within the first 6 hrs after the ingestion.(2 Marks)

b) List 2 investigations that may be helpful in confirming that a patient has ingested iron tablets and when the abnormality is likely to be detected. (2 marks)

2) List 2 methods of decontamination that may be useful in the management of iron toxicity and their indications for use. (2 Marks)

3) Name the antidote used to treat iron toxicity and list 2 indications for its use: (2 marks)

SAQ 7

You receive a Priority One call from the ambulance service. A 6 month old baby has been found unresponsive by his mother. CPR is in progress. ETA 5 minutes.

a. Calculate the child's weight and show the formula used (2 Marks)

b. Complete the following table (4 marks)

	Dose calculation - show unit/kg	Dose to be given - show units
Adrenaline		
Cardioversion - unsynchronised		
Fluid bolus		
Dextrose		

c. The resuscitation of the child was unsuccessful. List your 4 management priorities following this incident. (4 Marks)

SAQ 8

A 34 yr old male presents to your Emergency Department following a fall off a bicycle. He complains of a painful shoulder.

a. List the most important positive and negative finding on the patient's x-ray (1 Mark)

Positive: _____

Negative: _____

b. List 4 key components of the clinical exam in this patient (4 Marks)

1. _____

2. _____

3. _____

4. _____

c. List 6 techniques for reducing a shoulder dislocation (3 Marks)

1. _____

2. _____

3. _____

4. _____

5. _____

6. _____

d. The patient's post reduction x-ray reveals a Bankart lesion and Hill-Sach's deformity. Define these abnormalities (2 Marks)

Bankart Lesion: _____

Hill-Sach's Deformity: _____



SAQ 9

A 24 yr old female presents to your Emergency Department with a pneumothorax.

a. Complete the following table listing 5 treatment options, their indication and give an advantage and disadvantage for each option (10 Marks)

	Treatment Option	Indication	Advantage	Disadvantage
1.				
2.				
3.				
4.				
5.				

SAQ 10

A 48 yr old male is brought to your Emergency Department following an intentional overdose. The ambulance crew report he has ingested 15 diltiazem 180mg XR tablets 2 hours ago.

His vital signs are:

HR 72 bpm

BP 138/67

RR 18

Sats 99% RA

Temp 36.7 °C

BSL 6.4

a. List 4 factors associated with significant toxicity following calcium channel blocker poisoning (4 Marks)

1. _____

2. _____

3. _____

4. _____

b. List clinical features associated with significant calcium channel blocker toxicity (3 Marks)

c. Several hours later the patient becomes agitated and hypotensive, BP 87/40. Outline a step-wise approach to the patient's hypotension (5 Marks)
