

Haematology, Oncology, Rheumatology MCQs

20. Which of these is not a cause of a macrocytosis?

- a) hypothyroidism
- b) chronic alcohol intake
- c) phenytoin
- d) reticulocytosis
- e) B12 and folate deficiency

21. Which is not a cause of a microcytic anaemia?

- a) anemia of chronic disease
- b) thalassemia
- c) sideroblastic anaemia
- d) iron deficiency
- e) chemotherapeutic drugs

22. Which is a neurological sequelae of prolonged B12 deficiency?

- a) subacute degeneration of the spinal cord
- b) peripheral neuropathy
- c) higher center dysfunction
- d) all of the above
- e) none of the above

23. Which of these below is not a microangiopathic hemolytic anaemia?

- a) TTP
- b) Hemolytic uremic syndrome
- c) HELLP
- d) ITP
- e) DIC

24. Regarding TTP and HUS, which statement below is false?

- a) they are probably of the same pathological entity
- b) they both usually present with neurological abnormalities
- c) they both cause a hemolytic anaemia
- d) they both cause a thrombocytopenia
- e) they both have normal coagulation

25. Which statement is false?

- a) In both hemophilia A and B the INR will be normal
- b) In both hemophilia A and B the APTT will be abnormal
- c) Hemophilia A is more common than B
- d) The desired treatment of Hemophilia B is administration of Factor IX
- e) The desired treatment of Hemophilia A is the administration of cryoprecipitate

26. Which agent/s can be used to treat bleeding with von Willebrand's disease?

- a) desmopressin
- b) factor VIII concentrate
- c) factor IX concentrate
- d) platelet transfusion
- e) A and B

27. Which is not a common precipitant of sickle cell crises?

- a) hot weather
- b) dehydration
- c) infection
- d) high altitude
- e) all of the above are precipitants

28. Which statement is false regarding Disseminated Intravascular coagulation?
- a) pts usually present with hemorrhage
 - b) microthrombi/emboli are seen in some patients
 - c) replacement of clotting factors if the patient is bleeding has been shown to improve outcome
 - d) treatment of microthrombi with systemic heparin has been shown to improve outcome
 - e) all of the above are true statements
29. Which laboratory abnormality would you not expect to see in DIC?
- a) decreased platelet count
 - b) high fibrinogen level
 - c) prolonged INR
 - d) elevated FDP
 - e) elevated D dimer
30. Which of these commonly used drugs does NOT cause platelet dysfunction?
- a) aspirin
 - b) penicillins
 - c) phenytoin
 - d) verapamil
 - e) tricyclic antidepressants
31. Which agent is not in cryoprecipitate?
- a) factor VIII
 - b) factor IX
 - c) fibronectin
 - d) von willebrand factor
 - e) fibrinogen
32. In which disease is there a high incidence of Philadelphia chromosome?
- a) CLL
 - b) CML
 - c) Polycythemia rubra vera
 - d) AML
 - e) ALL
33. Which statement is true regarding secondary polycythemia?
- a) the erythropoietin level is elevated
 - b) there is hepatosplenomegaly
 - c) pruritus is not a feature
 - d) it is usually secondary to states of low oxygen tension
 - e) the WBC and platelet counts are normal
34. Which is not a feature of tumour lysis syndrome?
- a) hypercalcemia
 - b) hyperkalemia
 - c) hyperuricemia
 - d) hyperphosphatemia
 - e) lactic acidosis
35. What number of WBC would you expect to see in a tap of a septic joint?
- a) <200
 - b) 200-4000
 - c) 2000-50000
 - d) 5000 – 150000
 - e) nil

36. What number of WBC would you usually expect to see in a tap of an inflamed joint with gout?

- a) <200
- b) 200-4000
- c) 2000-50000
- d) 50000-150000
- e) nil

37. Which organism is not thought to be associated with Reiter's syndrome?

- a) yersinia
- b) campylobacter
- c) salmonella
- d) e coli
- e) chlamydia

38. Which is TRUE of Reiter's syndrome?

- a) the arthropathy usually occurs at the time of the acute infectious process
- b) the arthropathy usually involves 2-3 joints
- c) there is usually associated uveitis
- d) antibiotics are usually part of the treatment regimen
- e) all of the above are true

39. Which arthropathy is not typically migratory?

- a) viral
- b) acute rheumatic fever
- c) pseudogout
- d) SLE
- e) Gonococcal

40. What proportion of joint aspirates culture positive for gonococcal arthritis?

- a) 90 –100%
- b) 75-90%
- c) 50-75%
- d) 25-50%
- e) <25%

41. How should flexor tenosynovitis be managed?

- a) immobilize, NSAIDS
- b) immobilize oral antibiotics, NSAIDS
- c) regular hand exercises, ice, elevation
- d) steroid injections
- e) admit, IV antibiotics, consider surgical intervention

42. Which of these is not a risk factor for gout?

- a) alkalosis
- b) low dose aspirin
- c) diuretics
- d) psoriasis
- e) haemolysis

43. Which joint/s are typically spared in rheumatoid arthritis?
- DIP
 - PIP
 - MCP
 - Wrists
 - C spine
44. Which is not classically a monoarthritis?
- gout
 - pseudogout
 - sepsis
 - reiters
 - all of the above are usually a monoarthritis
45. Which of these is usually an oligoarthritis (2-3 joints), not a polyarthritis?
- reiters
 - gonococcal
 - RA
 - Rheumatic fever
 - Ankylosing spondylitis
46. Which is not true of pseudogout?
- joint aspirate show crystals that are positive birefringent
 - it is caused by calcium pyrophosphate crystals
 - the knee is the most common joint involved
 - treatment involves NSAIDs or colchicine
 - it is more common in the older age spectrum
47. Which is false with regards to olecranon and pre patellar bursitis?
- usually these are simply inflammatory
 - it is very uncommon for these to become septic
 - bursa aspiration is a safe and accurate way of differentiating them from a septic process
 - gm stain and culture is usually positive in a septic process
 - these bursitis's should be given prophylactic antibiotics
48. The usual organisms in septic arthritis in a healthy adult are?
- staph aureus, gonococcus
 - pseudomonas
 - salmonella
 - hemophilus influenzae
 - anaerobes

ANSWERS

- 20)C 21)E 22)D 23)D 24)B
 25)E 26)E 27)A 28)D 29)B 30)C 31)B 32)B 33)B 34)A 35)D 36)C
 37)D 38)B 39)C 40)D 41)E 42)A 43)A 44)D 45)C 46)D 47)E 48)A

1. All of the following statements are true EXCEPT
 - a) One bag of cryoprecipitate contains more fibrinogen than one bag of FFP
 - b) Heparin is a recognised treatment for certain types of DIC
 - c) Cefamandol may cause hypovitaminosis K
 - d) Desmopressin 0.3mcg/kg, subcutaneous bd is a recognised treatment for bleeding in uremic patients
 - e) The prothrombin time classically measures the extrinsic and common pathways of coagulation

 2. A blond Norwegian backpacker presents with shortness of breath. You note jaundice on clinical examination and FBC shows Hb 80, plt 250 and wcc 8. Reticulocytes 10%. The urine is negative for urobilinogen. The investigation most likely to elicit the cause for this presentation is
 - a) Direct Coombs test
 - b) Osmotic fragility test
 - c) Haptoglobin
 - d) Serum protein electrophoresis
 - e) Glucose-6-Phosphate dehydrogenase level

 3. All of the following statements regarding the properties of stroma-free Hemoglobins are true EXCEPT
 - a) The main side effect is hypertension, mediated through NO, endothelin and α_2 effects
 - b) They are significantly antigenic, and required ABO compatibility to be used safely
 - c) There is a tendency toward formation of Met-Hb due to the lack of Met-Hb reductase
 - d) A recent phase III trial was stopped early due to excess mortality in the treatment group
 - e) They have a markedly increased affinity for O₂ than cellular Hb

 4. The commonest presentation of childhood Non-Hodgkins lymphoma is
 - a) Fever
 - b) Night Sweats
 - c) Fatigue
 - d) Painless lymphadenopathy
 - e) Abdominal pain

 5. The proportion of febrile neutropenic patients with active infection is
 - a) 30%
 - b) 40%
 - c) 60%
 - d) 80%
 - e) 90%

 6. All of the following are preferred treatments in tumour lysis syndrome EXCEPT
 - a) 0.9% saline to maintain urine specific gravity around 1.010
 - b) Alkalinisation of the urine, HCO₃ 1mL/kg over 1 hour
 - c) IV calcium gluconate 10mL in 100mL D5W over 1 hour + resonium K 20gm pr
 - d) Dialysis
 - e) Insulin 0.1u/kg/hr + D10W 5mL/kg/hr
1. A
 2. B
 3. B
 4. D
 5. D
 6. C