HLS

Pathology P.P

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1) 10 years old child with petechial hemorrhage, what is the disease?

a) Von-Willebrand disease
b) Accidental Aspirin
c) Disseminated intravascular coagulation
d) Hemophilia

2) Christmas(hemophilia B) disease is deficiency of?

a) Factor II
b) Factor IX
c) Factor X
d) Factor VIII

3) Which of the following combinations is CORRECT?

a) Spoon-shaped nails → vitamin B12 deficiency
b) Positive Coombs test → immune thrombocytopenic purpura
c) Supravital stain → Howell Jolly bodies
d) Mixing study - hemophilia testing
e) Parvovirus infection → pancytopenia

Ans:A,B,D

4) A patient was found to have mild anemia and abundant schistocytes. All of the following tests are important to explain the cause of schistocytes EXCEPT:?

a) History of violent exercise
b) History of food poisoning
c) Abnormal PT and PTT tests
d) High level of ADAMTS13
e) Presence of thrombocytopenia

5) A 4-year-old boy presents with recurrent joint pain involving the knees and hips. He had always bruised easily, and recently the parents had seen blood in his urine. A presumptive diagnosis of classic hemophilia (hemophilia A) is made, and coagulation blood tests are performed. Which of the following is the most likely set of findings of coagulation screening tests?

a) Normal bleeding time, platelet count, and thrombin time; prolonged PT and APTT.
b) Normal bleeding time, platelet count, thrombin time, and APTT; prolonged PT.
c) Normal bleeding time, platelet count, thrombin time, and PT; prolonged PTT.
d) Normal platelet count and thrombin time; prolonged bleeding time, PT, and APTT.
e) Prolonged bleeding time, PT, APTT, and thrombin time; decreased platelet count.

6) A 35-year-old woman presents with fever, fatigue, mucocutaneous bleeding, and changing neurologic signs. Laboratory examination reveals thrombocytopenia, anemia, and reticulocytosis, as well as increased concentrations of creatinine and urea nitrogen. Examination of a peripheral blood smear reveals many fragmented circulating red cells (schistocytes). The most likely diagnosis is:

a) Bernard-Soulier disease. (B) DIC.
b) ITP.
c) TTP.
d) von Willebrand disease.

Ans:D,C,C

7) A 25-year-old man has a lifelong hemorrhagic diathesis. The PT and bleeding time are normal, but the PTT is prolonged. The most likely cause of the bleeding disorder is:

a) A platelet functional disorder.
b) Factor VII deficiency.
c) Factor VIII deficiency.
d) Factor IX deficiency.
e) Von Willebrand disease

8) A 50-year-old man has been in the medical intensive care unit for septic shock for the past few days. He has now developed rectal bleeding, epistaxis, and gingival bleeding. DIC is suspected. Which of the following sets of results for a panel of screening tests is most consistent with this diagnosis?

a) Normal bleeding time, PT, APTT, thrombin time, and platelet count.
b) Prolonged bleeding time, PT, APTT, and thrombin time; reduced platelet count.
c) Prolonged PT and APTT; normal bleeding time, platelet count, and thrombin time.
d) Prolonged PT and APTT; reduced platelet count; normal bleeding time and thrombin time.
e) Prolonged bleeding time, PT, and APTT; normal platelet count and thrombin time.

9) A 14-year-old girl presents with prolonged bleeding from wounds and minor trauma and severe menorrhagia. Family history reveals that her father also has prolonged bleeding from wounds and minor trauma, as does her brother. Which of the following is the most likely mechanism of this patient's disorder?

a) Absence of platelet glycoprotein IIb-IIIa.
b) Antiplatelet antibodies reacting with platelet surface glycoproteins.
c) Deficiency of factor VIII.
d) Deficiency of factor IX.
e) Deficiency of vWF.

Ans:C,B,E

10) A 55-year-old woman with chronic pancreatitis undergoes coagulation screening tests before surgery. The PT and PTT are found to be prolonged. Given the following choices, which of the following is the most likely reason for the abnormal coagulation test results?

a) Congenital inherited bleeding disorder.
b) Fat malabsorption and vitamin K deficiency.
c) Glutamate deficiency due to impaired digestion of dietary protein.
d) Nutritional vitamin C deficiency.
e) Post-pancreatitic carcinoma of the pancreas

11) An 80-year-old woman presents with recent onset of primary hemostatic (mucocutaneous) bleeding. Questioning reveals that she has been maintaining a “tea and toast” diet for the past 4 months. Her gums are hemorrhagic and spongy in consistency, and gingival bleeding is evident. Perifollicular hyperkeratotic papules, each surrounded by a hemorrhagic halo, are scattered over the lower extremities, and each papule surrounds a twisted, corkscrew-like hair. A nutritional deficiency is suspected. Deficiency of which of the following nutrients is most likely related to the findings in this patient?

A) Vitamin A.
B) Vitamin B12.
C) Vitamin C.
D) Vitamin K.
E) Protein 10.

12)A female patient presents to the emergency room with a chief complaint of dark patches on her tongue; multiple small, red dot-like structures on her skin; and a large, bluish bruise developing after she bumped into the back of a wooden chair! What should the physician suspect?

A) Hemophilia.
B) Epstein-Barr viral infection.
C) Thrombocytopenia.
D) Allergic response.
E) Iron deficiency anemia.
Ans:B,C,C

13) Which of the following combinations is WRONG?

a) Defective SLAM protein - infant onset HLH
b) t(11;14) cyclinD1-IgH - mantle cell lymphoma
c) (11;14) cyclinDI-IgH - plasma cell myeloma
d) BCR-ABL mutation - chronic myeloid leukemia
e) PDLI expression - Hodgkin lymphoma

14)A 5-year-old child presents with cervical lymph node enlargement, histology shows expansion of the paracortical areas with resulting atrophy of the follicles and the paracortical areas show the presence of immunoblasts with fine chromatin and prominent nucleoli, your diagnose?

a) Bacterial infection
b) Burkitt lymphoma
c) Vaccine
d) Follicular lymphoma
e) Allergy reaction

15)Which of the following causes paracortical hyperplasia?

a) Rheumatologic diseases
b) Toxoplasmosis
c) Vaccination
d) HIV infection
e) Lymph nodes that are adjacent to cancer

Ans:A,C,C

16)Which of the following can cause reactive lymphadenopathy + granuloma?

a) Cat-Scratch disease
b) Acute Non-specific Lymphadenitis
c) Chronic Non-specific Lymphadenitis
d) Hemophagocytic Lymphohistocytosis

17)We call it severe Neutropenia when neutrophils count is lower than:

a) 500/mm3
b) 1500/mm3
c) 250/mm3

18)What is decreased in Hemophagocytic lymphohistiocytosis?
a) Perforins
b) T-cells
c) Cytokines

19)breast cancer, she had radiotherapy and after weeks she comes with anemia and pancytopenia, her blood film show needle like structures inside the WBCs, choose the right statement:

a. The leukemic cells are lymphoid in origin
b. she had good prognosis
c. Ring structure in RBCs is common characteristic in her case
d. she has increased risk of infection
e. Folate levels are low

Ans:A,A,A,D

20)Description of Hodgkin:

a) Reactive cells are more than monoclonal cells.
b) Involves multiple sites.
c) Extra-nodal involvement is common.

21)Which of the following favors the diagnosis of classic Hodgkin lymphoma?

a) Contiguous pattern of spread
b) Extra-nodal disease
c) Expression of CD20
d) Presence of popcorn cells
e) Negative role of EBV in pathogenesis

22)One of the following lymphomas does NOT have an association with oncogenic microorganisms?

a) Follicular lymphoma
b) Adult T-cell leukemia/lymphoma
c) Burkitt lymphoma
d) Hodgkin lymphoma
e) Extra-nodal marginal zone lymphoma

23)Tumor associated with hemolytic anemia:
a) Small lymphocytic lymphoma (SLL)
b) Acute lymphoblastic leukemia (ALL)
c) Diffuse large B-cell lymphoma.

Ans:A,A,A,A

24)Low grade neoplasm:

a) Mycosis fungoides
b) DLBC lymphoma
c) Primary myelofibrosis

25)Mismatch:

a) Thymus – Tax
b) SLL – BCR
c) Burkitt – c-MYC

26)Richter transformation occurs in patients with:

a) Peripheral T-cell lymphoma
b) Small lymphocytic lymphoma
c) Follicular lymphoma
d) Burkitt lymphoma
e) Hodgkin lymphoma

27)BCl2 positive has nothing to do with:

a) Burkitt lymphoma
b) DLBCL
c) Follicular lymphoma
d) SLL/CLL

Ans:A,A,B,A

28)Mantle cell lymphoma:

a) Extra-nodal
b) Common in young patients
c) Centrocytes are focal

29)Cd19+ with CD5 -, what is the tumor?

a) Hodgkin lymphoma
b) Hairy cell leukemia
c) Plasma cell myeloma

30)What is the genetic translocation in promyelocytic leukemia?
a) T(8:21) RUNX
b) T(15:17) PML-RARA
c) T(9:22)

31)True about Bence Jones proteins?

a) Heavy chains found in blood
b) Free light chains found in blood
c) Free light chains found in urine
d) Heavy chains found in urine

Ans:A,B,B,C

32)Which of the following is a CORRECT combination for the pathogenesis of diseases?

a) (JAK-STAT) pathway – CML
b) Warburg metabolism – SLL
c) (TGF-B) - primary myelofibrosis
d) (RANKL) – B-ALL
e) (IL-11) – Hodgkin lymphoma

33)82-year-old with pancytopenia, blasts are less than 1%, neutrophils are hypo-segmented and megakaryocyte are small, choose the right statement:

a) Patient must have chemotherapy
b) The disease causes bone lytic lesions
c) T(12:21) is common here
d) Increased risk of transformation to AML

34)All of the following represents correct examples of targeted therapy in hematolymphoid neoplasms EXCEPT:
a) Daclizumab (anti CD25)- Sezary syndrome
b) Imatinib (anti bcr/abl) – CML
c) ATRA - acute promyelocytic leukemia
d) Enasidenib (anti IDH)
e) Vemurafenib (anti BRAF)- hairy cell leukemia

Ans:C,D,A

35)Patients with Hand Shuller Christian disease have all of the following EXCEPT?

a) Skull bony lesions
b) Exophthalmous
c) CDla expression
d) Diabetes insipidus
e) Pulmonary nodules

36)Flow cytometry study is NOT useful in diagnosis of?
a) Acute myeloid leukemia
b) Langerhans cell histiocytosis
c) B-acute lymphoblastic leukemia
d) Paroxysmal nocturnal hemoglobinurea

37)The following features are common in plasma cell myeloma EXCEPT:

a) Presence of tangible body macrophages
b) Early onset anemia
c) Bence-Jones protein
d) Osteolytic lesions
e) Serum and urine M-protein

Ans:E,B,A

38)Which of the following won't be helpful with thrombopoietin receptor mutation:
a) Imatinib.
b) JAK2 inhibitor
c) Stem cell transplant

39) t(15,17) is associated with all of the following except:

a) Splenomegaly
b) Cleaved nuclei
c) Needle-shaped structures
d) Promyelocytes
e) Treated with all-trans retinoic acid

40)Patient with Hemoglobin 19g/dl (very high) and she has Jak2 mutated gene and Low erythropoietin, on bone marrow biopsy we found that Blast count almost 40% of the cells, your diagnose?

a) She has Bcl2 translocation
b) She has a rare complication of Myeloproliferative syndrome
c) Bone marrow would show fibrosis
d) Phlebotomy would alleviate the disease

41)Which of the following combinations is CORRECT?

a) Eosinophilia - chronic rheumatologic diseases
b) Paracrotical hyperplasia - benign B-cell proliferation
c) Neutrophilia - myelodysplastic syndrome
d) Basophilia - polycythemia vera
e) Leukemoid reaction- good response to imatinib

Ans:A,A,B,D

42)Basophilia + blasts < 5%:

a) CML
b) PV
c) CLL

Ans:A

43)Description of Hodgkin?

- Reactive cells are more than monoclonal cells