



**MBBS THIRD PROFESSIONAL**  
**MODEL QUESTIONS FOR ANNUAL 2009**  
**Special Pathology**  
**(Multiple Choice Questions)**

- Q.1 A 58 -year-old man died after an episode of severe chest pain that radiated to the back. Autopsy showed an intimal tear in the aortic wall 5cm from the aortic valve with intramural aortic hematoma. Elastic tissue fragmentation is noted in the aortic wall. What is the major risk factor predisposing to this condition:**
- a) Hyperlipidemia
  - b) Cigarette smoking
  - c) Alcohol consumption
  - d) Hypertension
  - e) Defects in lipid metabolism
- Q.2 A patient who is a known case of hypertension and coronary artery disease complains of severe chest pain radiating to left arm, while admitted to the CCU for worsening angina. The pain does not subside with sublingual nitroglycerine. ECG shows ST segment elevation. The registrar institutes thrombolytic therapy within 20 minutes of onset of symptoms. What is the most likely outcome if successful thrombolysis is achieved in this patient:**
- a) More than 80% of the myocardium at risk will be salvaged
  - b) Myocardial death will be prevented
  - c) More than 50% of the myocardium at risk would be salvaged
  - d) Reperfusion injury would be minimized
  - e) Complete infarction of the myocardium at risk
- Q.3 Four months following a dental surgery a 65-year old man develops flu-like symptoms with fatigue and weight loss. Chest auscultation reveals an aortic murmur and Echocardiography shows calcific stenosis of the aortic valve with large vegetations. A blood culture in this patient is likely to be positive for:**
- a) Staphylococcus aureus
  - b) Group B beta hemolytic streptococci
  - c) Staphylococcus epidermidis
  - d) Streptococcus viridans
  - e) Gram negative bacilli
- Q.4 Bone marrow examination of a patient presenting with severe anemia and jaundice reveals increased number of normoblasts and a reticulocyte count of 10%. Bilirubin is 8mg/dl and predominantly unconjugated. If the patient has no hemoglobinuria or hemoglobinemia, what is the most likely cause of anemia:**
- a) Iron deficiency
  - b) Cobalamine deficiency
  - c) Intravascular hemolysis
  - d) Aplastic anemia
  - e) Extravascular hemolysis

- Q.5 A traveller from Europe is given antimalarial prophylaxis before he travelled to Pakistan. He presented to a local hospital with lethargy, anemia and jaundice. Urine routine examination shows hemoglobinuria. A peripheral smear shows bite cells and membrane-bound precipitates in red blood cells which stain as dark inclusions on cresyl violet staining. What enzyme deficiency is likely to be present in this patient:**
- a) Phosphofructokinase
  - b) Glucose 6-phosphate dehydrogenase (G6PD)
  - c) Alpha 1 antitrypsin
  - d) Glutathione reductase
  - e) Glutathione peroxidase
- Q.6 A patient presents with weakness, pallor and repeated episodes of fever and chills 2 months after he recovered from an episode of viral hepatitis. Blood CP shows pancytopenia. Bone marrow biopsy shows fatty infiltration of marrow with marked hypocellularity. The findings are most consistent with a diagnosis of:**
- a) Myelodysplastic syndrome
  - b) Acute leukemia
  - c) Aplastic anemia
  - d) Non Hodgkin's Lymphoma
  - e) Chronic leukemia
- Q.7 A 30-year-old female presenting with insidious onset of shortness of breath associated with dry cough is found to have bilateral hilar lymphadenopathy with pulmonary infiltrates. Bronchoscopic biopsy shows non-caseating granulomas with giant cells containing Schaumann bodies and asteroid bodies. These features are most consistent with a diagnosis of:**
- a) Tuberculosis
  - b) Silicosis
  - c) Interstitial pneumonitis
  - d) Sarcoidosis
  - e) Fungal infection
- Q.8 A 45-year-old woman presents with anemia and fatigability. She has mild jaundice on clinical examination. Blood CP shows a raised MCV of 105fl and leucopenia. Peripheral smear shows macrovalocytes and hypersegmented neutrophils. Schilling test for absorption of orally administered cobalamin is positive. What is a gastric biopsy from this patient likely to show:**
- a) H. pylori infection
  - b) Chronic non specific gastritis
  - c) Peptic ulceration
  - d) Hypertrophic gastritis
  - e) Atrophy of fundic glands with intestinalization
- Q.9 A 40-year-old male develops chronic diarrhea following antibiotic therapy for enterocolitis. Sigmoidoscopy reveals plaques of yellow fibrin and inflammatory debris adherent to colonic mucosa. Histologic examination of biopsy material reveals a plaque-like adhesion of fibrinopurulent necrotic debris and mucous to damaged colonic mucosa. Diagnosis is confirmed by finding of which bacterial toxin in stool:**
- a) Shiga toxin
  - b) C. difficile cytotoxin
  - c) Vibrio cholera enterotoxin
  - d) Campylobacter enterotoxin
  - e) E. coli enterotoxin

**Q.10 A 30-year-old female has attacks of bloody mucoid diarrhea lasting a week to 10 days with symptom free intervals of 3-4 months in between. Sigmoidoscopy shows uninterrupted mucosal inflammation from rectum to splenic flexure. Biopsy material shows mucosal ulceration, cryptitis and crypt abscess formation, pseudopolyps and mild epithelial dysplasia. No granulomas are seen. What morphologic feature is the most important predictor of long-term prognosis of this patient:**

- a) Absence of granulomas
- b) Ulceration
- c) Cryptitis
- d) Dysplasia
- e) Pseudopolyps