



**KENYA MEDICAL TRAINING COLLEGE  
FACULTY OF NURSING  
DEPARTMENT OF NURSING**

**END OF SEMESTER EXAMINATION  
FOR  
DIPLOMA IN COMMUNITY HEALTH NURSING**

**YEAR 1, SEMESTER 2**

**MODULES: CARDIOVASCULAR AND HAEMATOLOGY NURSING**

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**DATE: 25<sup>TH</sup> JULY, 2022**

**TIME: 3 HOURS (9:00AM – 12:00 PM)**

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**INSTRUCTIONS**

1. This paper consists of:
  - Section 1 (20 Multiple Choice Questions)
  - Section 2 (8 Short Answer Questions)
  - Section 3 (2 Long Answer Questions)
2. Attempt **ALL** Questions
3. Write your **COLLEGE NUMBER** only on all the answer sheets provided and on the question paper.
4. Ensure that all examination answer scripts are handed in at the end of the examination
5. Ensure you sign the examination register provided

**COLLEGE NUMBER** .... D/NURS/22039/846 .....

CARDIOVASCULAR NURSING

SECTION I: MULTIPLE CHOICE QUESTIONS (10 MARKS)

1. A modifiable risk factor for atherosclerosis includes:-
  - a) Male sex.
  - b) Hyper Lipidemia.
  - c) Low blood pressure.
  - d) Positive family history.
2. Rupture of aortic aneurysm occurs due to
  - a) External physical trauma
  - b) Surgery
  - c) Hypertension
  - d) Pressure from surrounding organ.
3. The health messages that should be shared with a patient who has suffered from myocardial infarction include:-
  - a) Identification and modification of all risk factors.
  - b) Report fatigue and paroxysmal nocturnal dyspnea.
  - c) Eating low salt-fat and free fluid diet
  - d) Reporting of insomnia and orthopnea.
4. The position that best relieves dyspnea in congestive cardiac failure is:-
  - a) Sims
  - b) Supine
  - c) Fowlers
  - d) Knee chest
5. Signs and symptoms of infective endocarditis include:-
  - a) Hemiparesis
  - b) Cyanotic skin
  - c) Diarrhea
  - d) Flank pain
6. In teaching a patient about coronary artery disease (CAD), the nurse explains that the changes that occur in this disorder involve:-
  - a) Diffuse involvement of plaque formation in coronary veins
  - b) Formation of fibrous tissue around coronary artery orifices
  - c) Accumulation of lipid and fibrous tissue within the coronary arteries
  - d) Chronic vasoconstriction of coronary arteries leading to permanent vasospasm
7. Significant risk factors for peripheral arterial disease include:-
  - a) Sedentary lifestyle, stress, obesity
  - b) Advanced age, female gender, familial tendency
  - c) Cigarette smoking, Hyperlipidemia, hypertension
  - d) Protein S deficiency, protein C deficiency, factor V Leiden mutation
8. A compensatory mechanism involved in congestive heart failure that leads to inappropriate fluid retention and additional workload of the heart is:-
  - a) Ventricular dilation
  - b) Ventricular hypertrophy
  - c) Neurohormonal response

d) Sympathetic nervous system activation

A hospitalized patient with angina tells the nurse that she is having chest pain. The nurse bases her actions on the knowledge that angina pain:-

- a) Will be relieved by rest, nitroglycerine, or both
- b) Is less severe than pain of a myocardial infarction
- c) Indicates that irreversible cellular damage is occurring
- d) Is frequently associated with vomiting and extreme fatigue

10. The nurse suspects the presence of a deep vein thrombosis based on the findings of:-

- a) Paresthesia and coolness of the leg
- b) Pain in the calf that occurs with exercise
- c) Generalized edema of the involved extremity
- d) Pallor and cyanosis of the involved extremity

### SECTION 2: SHORT ANSWER QUESTIONS—20MKS

1. State four (4) types of hypertension (4 marks)
2. State the nursing care given to patient in loop diuretics therapy (6 marks)
3. Outline four (4) roles of a nurse in the care of a patient who is on digoxin therapy. (4 marks)
4. Explain three (3) main effects of atheroma formation in the blood vessels (6 marks)

### SECTION 3: LONG ANSWER QUESTIONS—20MKS

Master Rex aged 30 years is admitted to the ward suffering from infective endocarditis.

- a) Describe the specific management of Master X till discharge. (20marks)

### HAEMATOLOGY NURSING

#### SECTION 1: MULTIPLE CHOICE QUESTIONS (10 MARKS)

1. What is the most pertinent patient self-care for a patient with sickle cell anemia?
  - a) Drink 4 to 6 litres of fluid daily
  - b) Exercise 3 to 4 hours a day
  - c) Consume a daily high fat diet
  - d) Rest 10 to 12 hours each day
2. When a patient with a platelet count of 20,000/mm<sup>3</sup> receives 1 unit of platelets the platelet count should rise to?
  - a) 25,000-30,000/mm<sup>3</sup>
  - b) 35,000- 40,000/mm<sup>3</sup>
  - c) 45,000- 50,000/mm<sup>3</sup>
  - d) 55,000- 100,000/mm<sup>3</sup>
3. A 40 year old is seen in an accident and emergency clinic. He presents with symptoms of Polycythemia Vera. What lab value will confirm the possible diagnosis?
  - a) High hemoglobin level
  - b) Low white blood cell count
  - c) Low platelet count
  - d) High iron level
4. Which findings do you expect to find in a patient with acute blood loss?
  - a) Weakness, Lethargy, warm and dry skin

- b) Restlessness, hyperthermia and bradycardia
  - c) Tachycardia, hypotension, cool and clammy skin
  - d) Widened pulse pressure, anxiety and hypoventilation
5. Which of the following may not be an underlying condition that leads to DIC?
- a) Surgery and trauma
  - b) Cancer
  - c) Complications of pregnancy and child birth
  - d) Malaria
6. What is the common type of anemia?
- a) Sickle cell anemia
  - b) Aplastic anemia
  - c) Iron-deficiency anemia
  - d) Hemolytic anemia
7. Which is not a complication of hemophilia?
- a) Joint swelling
  - b) Death
  - c) Bleeding in the head
  - d) liver cirrhosis
8. What foods would be included in nutrition teaching plan for an iron deficiency anemia patient?
- a) Beans and meat
  - b) Apples and white rice
  - c) Milk and cooked carrots
  - d) Tea and Eggs
9. A client with iron deficiency anemia is scheduled for discharge. Which instruction about prescribed ferrous gluconate therapy should the nurse include in the teaching plan?
- a) Take the medications with an antacid
  - b) Take the medication with a glass of milk
  - c) Take the medication together with calcium supplement
  - d) Take the medication on an empty stomach
10. How does anemia affect the body?
- a) The blood does not deliver enough oxygen to the body
  - b) Blood becomes thin
  - c) Tissues retain fluids
  - d) None of the above

**SECTION 2; SHORT ANSWER QUESTIONS. (20 MARKS)**

- 1. List the signs and symptoms of thrombocytopenia. (4 marks)
- 2 Explain three (3) measures that patients with hemophilia will do to stay healthy. (6marks)
- 3. Outline the four types of leukemia (4 marks)
- 4. State the two types of hemophilia (2 marks)
- 5. Outline the etiological classification of Anemia (4marks)

**SECTION 3: LONG ANSWER QUESTION (20 MARKS)**

- 1. Explain three (3) types of crises in sickle cell disease. (6marks)
- 2. Outline four (4) signs and symptoms of multiple myeloma. (4marks)
- 3. Discuss management of sickle cell anaemia (10 marks)