

SECOND YEAR EXAMINATION FOR THE AWARD OF THE DEGREE OF BACHELOR OF SCIENCE IN CLINICAL MEDICINE AND COMMUNITY HEALTH SECOND SEMESTER 2022/2023 [MAY-AUGUST, 2023]

COMH 220: COMMUNICABLE AND NON-COMMUNICABLE DISEASES

STREAM: Y2S2 TIME: 2 HOURS

DAY: FRIDAY, 9:00 - 12:00 PM DATE: 28/07/2023

INSTRUCTIONS

1. Do not write anything on this question paper.

SECTION ONE: MULTIPLE CHOICE QUESTIONS (TOTAL MARKS 60)

MCQ: only one true answer

1. Which of the following statements is true:

- a) Waterborne diseases are caused by non-microorganisms in untreated/contaminated water.
- b) Cryptosporidiosis is an example of waterborne disease.
- c)Diarrhea and vomiting are not main symptoms of waterborne diseases.
- d)Eye and respiratory problems are not part of the signs of waterborne diseases.

2. Which of the following statements is not true;

- a) Fomite exposure often involve a secondary route of exposure such as oral or direct contact
- b) Contaminated tables and chairs are an example of fomites.
- c)Contaminated dishes are an example of fomites.
- d)Mosquitoes are fomites that cause Malaria especially the female anopheles mosquito.

3. The host factors that influence diseases causation include;

- (a) Dosage
- (b) Age
- (c) Mortality
- (d) Prognosis

4. The following are true about Disease prevention:

- a) Vaccination is important in prevention.
- b) Health education is not advised when a patient does not have symptoms.
- c) Treatment is a form of prevention
- d) Early diagnosis is important in prevention

5. The most recent development for the KEPI Programme is:

- (a) Is introduction of 2nd dose measles vaccine
- (b) The introduction of vitamin A as both a food supplement and a vaccine
- (c) Beyond Zero campaigns and National immunization days
- (d) The introduction of Rotavirus vaccinations

6. Routinely at 14 weeks;

- (a) All children must receive all vaccines previously missed
- (b) All children should get polio 3 and Penta 3 vaccines doses.
- (c) Yellow fever vaccine is given but only is selected sub-counties within the Rift valley region.
- (d) Vitamin a could be administered to children facing malnutrition.

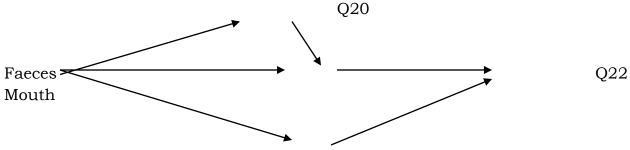
7. Which of the following diseases is water borne?

- (a) Malaria
- (b) Typhoid
- (c) TB
- (d) Taeniasis

8. Which of the following people are most predisposed to cholera:

- (a) Children aged below six months
- (b) Nurses and other medical workers
- (c) Women
- (d) Males of all ages

Use the link below on oral – fecal routes to answer questions 20 – 23



9)The point marked Q20 represents

- (a) Flies
- (b) Mosquitoes
- (c) Cockroaches
- (d) Rodents

10. The point marked Q21 represents

- (a) Food
- (b) Faeces
- (c) Water
- (d) Fingers

11. The central point at Q22 could be

- (a) Food or waters
- (b) Fingers or faeces
- (c) Flies of faeces
- (d) Faeces or water

12. Which one of the following is a factor in the competition between man and the disease-causing organism:

- (a) The condition of the environment
- (b) Religion of the community
- (c) Infrastructure
- (d) Skills and technology

13. The following vaccines are live attenuated except:

- (a) BCG
- (b) Rubella
- (c) Measles
- (d) Rota virus

14. The following statements are true about immunization EXCEPT:

- (a) Children cannot contact the disease they are vaccinated against.
- (b) Several vaccines can be given at the same time.
- (c) Vaccines given at 9 months includes yellow fever.
- (d) Pneumococcal vaccine can be given between 6 weeks and 12 months.

15. The following are true bout vibrio cholera EXCEPT:

- (a) Is a gram-negative bacillus
- (b) Is anaerobic
- (c) Usually, motile
- (d) Not sensitive to acidity and drying

16. The following is true about a bout Amoebiasis EXCEPT:

- (a) Exists as a trophozoite and cyst
- (b) Incubation period of E. Hystolytica is 2-4 weeks
- (c) Amoebic cysts do not need treatment
- (d) Most patients present with fever

17. The following diseases are spread though faecal matter EXCEPT?

- (a) Typhoid fever
- (b) Poliomyelitis
- (c) Infective Hepatitis A
- (d) Schistosomiasis

18. The following are characteristic of good housing EXCEPT:

- (a) Good ventilation
- (b) Near a pit latrine
- (c) Near source of water
- (d) Adequate spacing for family members

19. The following diseases need Quarantine as part of management EXCEPT:

- (a) Ebola
- (b) Tuberculosis
- (c) Cholera
- (d) Plague

20.A comprehensive municipal solid waste management includes the following activities EXCEPT.

(a) Setting policies

- (b) Developing and enforcing regulations
- (c) Establishing training programs
- (d) Establishing prices for services

21. Transmission of Amoebiasis includes:

- (a) Direct fecal oral transmission
- (b) Sexual transmission
- (c) Colonic irrigation
- (d) Inhalation spores

22. The following statements are true about 'Chicken pox' EXCEPT:

- (a) Causative agent NOT known
- (b) Impetigo is a differential diagnosis
- (c) Communicable 5 days before eruption
- (d) It's caused by a virus varicella-zoster virus

23. The following are protozoal diseases EXCEPT:

- (a) Shigellosis
- (b) Trypanosomiasis
- (c) Amoebiasis
- (d) Giardiasis

24. Factors that determine/contribute to the occurrence of a disease:

- (a) Absence of vectors
- (b) Disposal of Excreta
- (c) Availability of water
- (d) Poverty

25. The following are NOT household hazardous waste:

- (a) Paint thinners
- (b) Pesticides
- (c) Insecticides
- (d) Antifreeze

26.Unsafe injection practices may transmit the following infections EXCEPT:

- (a) Hepatitis B virus
- (b) Hepatitis C virus
- (c) Leukemia
- (d) HIV AIDS

27. Which of the following is a Water washed disease:

- (a) Cholera
- (b) Poliomyelitis
- (c) Hepatitis A
- (d) Amoebiasis
- (e) Scabies

28. The following are diseases associated with chemical exposure to environment except:

- (a) Silicosis
- (b) Anthracosis
- (c) Asbestosis
- (d) Tuberculosis

29. Which of the following is not true about TB:

- a) It's caused by mycobacterium bovis
- b) Its one of the leading causes of mortality in Kenya
- c) TB is airborne
- d) TB is the leading causes of Non-communicable diseases in Kenya.

30. The following are true about Leprosy EXCEPT:

- a) Caused by M. Japonicum
- b) Also called Hansen's disease
- c) Late signs are bleeding from the mucous membranes
- d)One of the leading causes of hemorrhagic diseases

31. The following are true about Leishmaniasis:

- a) It is spread by sandflies
- b) All patients show signs
- c) Weight loss is not a sign
- d) Spleen and liver are the only organs that are not affected by the disease

32. Which of the following is not a sign of poliomyelitis:

- a) Stiffness of the neck
- b) Pin in the limbs

- c)Paralysis
- d) Mucosal bleeding

33. The following are preventive measures to Poliomyelitis except:

- a) IPV
- b) good hygiene
- c)OPV
- d) Avoiding contact with infected people

34. Which of the following is true about hemorrhagic fevers:

- a) yellow fever is not classified under hemorrhagic fevers
- b) Ebola is classified under filvoviridae.
- c) Rift valley fever is classified under filvoviridae.
- d) Rodents are not associated with hemorrhagic fevers.

35. About Meningitis, which of the following statements is true:

- a) Can not be caused by a virus
- b) May be caused by bacteria
- c) Cryptococcal meningitis is viral
- d) Its one of the least causes of mortalities in Kenya

36) The following are true about Cancers except:

- a) Can be inherited.
- b) Early signs include convulsions.
- c) Are among the leading causes of communicable diseases in Kenya.
- d) Affect all parts except nails, teeth and hair.

37) About Cancer prevention, which of the following statements is true:

- a) Age for vaccination against cervical cancer for girls is 10-14yrs
- b) Early sex is not a predisposing factor
- c) VMMC is not recommended
- d) Health education is not recommended as it causes stigma among patients.

38) Concerning HIV, which of the following statements is not true:

- a) Staged 1 4 among adults
- b) Early signs mimic URTIs
- c) Is not treatable
- d) Is not curable

39. HIV can be prevented by the following except:

- a. VMMC
- b. Protected sex
- c.Vaccination
- d.Treatment

40. The following are transmitted sexually except:

- a) HIV
- b) Chancroid
- c)Toxoplasmosis
- d)Hepatitis B

41) About Communicable Diseases:

- a) TB is transmitted through contact with an uninfected person
- b) TB is caused by Mycobacterium Tuberculosis
- c)Diabetes Mellitus is a communicable Disease
- d)Leprosy is not transmitted through droplet infection

42) The following statement are true about NCDs (Non-Communicable Diseases) EXCEPT:

- a) Diabetes Mellitus is classified under NCD
- b) Hypertension is classified under NCDs
- c) Cancers are classified under NCDs
- d) Hemorrhagic fevers are not classified under NCDs.

43) Which of the following is true about Dysentery:

a) Also called infectious diarrhea

- b) Caused by brugia malayi
- c) Lab tests or imaging never required
- d) Takes long to resolve

44) Which of the following is true about trypanosomiasis:

- a) Caused by a protozoan
- b) Not in tropical regions
- c) Doesn't cause sleep
- d) Only affects adults

45) Which of the following is true about Zoonotic diseases:

- a) Transmitted from humans to animals
- b) Rabies is a zoonotic disease
- c) Coccidiomycosis is not zoonotic
- d) Zoonotic diseases are not life threatening

46) Which of the following is true about Rabies Disease:

- a) Doesn't affect the CNS.
- b) Is bacterial.
- c) Its 100% fatal if symptoms occur.
- d) Resolves after a very long time.

47) The following diseases are spread through direct contact EXCEPT:

- a) Ebola
- b) Scabies
- c) Ringworms
- d) Hypertension

48) The following statements are true about indirect transmission EXCEPT:

- a) They spread when an infected person sneezes or coughs sending infectious droplets in air.
- b) Food is not a vehicle of indirect transmission.
- c) Surgical scalpels are not vehicles of transmission.

d) Surgical scalpels are not classified under fomites.

49) Which of the following is not true about vehicles of disease transmission:

- a) Food can be a vehicle.
- b) Fomites are non-living things that transmit infections.
- c) A vehicle can't passively carry an infection.
- d) Vehicles can be living or non-living things.

50) Which of the following is not true about respiratory illnesses:

- a) Covid 19 is a respiratory infection.
- b) Colds are classified under respiratory illnesses.
- c) Respiratory illnesses can be fatal especially in children.
- d) They can be spread through kissing.

51) Which of the following is not true about Covid 19:

- a) It can be transmitted through indirect transmission.
- b) It can be transmitted through direct transmission.
- c) Distancing is a prevention measure.
- d) It can't be prevented through vaccination.

52) The following are true about Malaria except:

- a) It's transmitted through the male anopheles' mosquitos.
- b) It's transmitted through the female anopheles mosquito
- c) Its protozoal.
- d) Its among the leading causes of mortalities among children.

53) Concerning sexually transmitted infections, which of the following statements is true:

- a) Gonorrhea presents with a discharge.
- b) Syphilis presents with a painful chancre during early onset.
- c) Chancroid is not treatable.
- d) HIV is not transmitted during pregnancy.

54) Which of the following is true about Dengue fever:

- a) It's classified under hemorrhagic fevers.
- b) Most people who get it have symptoms.
- c) Fever is not one of the symptoms.
- d) You can't prevent it by avoiding mosquito bites.

55) About prevention of TB, which of the following statements is not true:

- a) TB is prevented through contact tracing to identify and treat the sick.
- b) TB is prevented through opening of windows and doors.
- c) TB is prevented through immunization using the BCG vaccine.
- d) TB is prevented through immediate isolation of those infected.

56) In prevention of Non-Communicable Diseases:

- a) Health education is important.
- b) Isolation of patients with NCDs is encouraged.
- c) Patients should be offered early support to prevent complications.
- d) Dietary management is important.

57.Onyango presented to the clinic with a referral letter that had a diagnosis of Hypertension.

a) Concerning hypertension, the following are true except:

- a) Hypertension can be managed through health education on importance of diet.
- b) As a clinician, you will inquire about history of frequent headaches.
- c) History of hypertension in the family will be important to ask.
- d) I will advise Onyango not to worry but go home, come back after 2 weeks.

b) Onyango needs your advice on how he will prevent high blood pressures. Which statement is not true:

- a) I will take the BP measurement and advice based on the levels.
- b) I will advise him to avoid stress.
- c) I will encourage him on the need for routine BP checks.
- d)I will give him anti pyrectics for 2 weeks to allow review later.

59) Rebecca presents at the clinic with history of coughing. Which of the following statements is true.

- a) History taking will not be important since Rebecca doesn't have difficulty in breathing.
- b) Rebecca could be having TB and history of contact is important.
- c) I will ask about history of drenching night sweats.
- d) I will inquire on history of Asthma.

60) Concerning Asthma, which of the following statements is false:

- a) Asthma is an allergic condition.
- b) Asthma could be familial.
- c) Asthma is not airborne but instead, transmitted through droplet infection.
- d) Identifying the causative allergen is the main stay management of Asthma.

SECTION TWO: ESSAY (TOTAL MARKS 100)

Answer all the questions

1). Briefly describe below terminologies as used in Communicable Diseases; (2 marks each)

- a) Vector borne
- b) Water borne
- c) Direct transmission
- d) Indirect transmission
- e) Fomites

2). Describe the life cycle of the Malaria parasite (10 marks)

3). Write short notes on TB Disease under below areas:

a) Definition and types	(2 marks)
b) Signs and symptoms	(2 marks)
c) Diagnosis	(2 marks)
d) Treatment	(2 marks)
e) Prevention	(2 marks)

4. Write short notes on Poliomyelitis under below areas:		
a) Definition and types	(2 marks)	
b) Signs and symptoms	(2 marks)	
c) Diagnosis	(2 marks)	
d) Treatment	(2 marks)	
e) Prevention	(2 marks)	
5 Discuss vaccinations under the below areas:	(10 marks)	
a) Live attenuated	(4 marks)	
b) Inactivated	(3 marks)	
c)Recombinant	(3 marks)	
6) Describe any 5 vaccines used in Kenya	(10 marks)	
7) Write short notes on Diabetes Mellitus under the below areas;		
a) Definition and types	(2 marks)	
b) Signs and symptoms	(2 marks)	
c) Diagnosis	(2 marks)	
d)Treatment	(2 marks)	
e) Prevention	(2 marks)	
8) Write short notes on;		
a) Direct Transmission	(5 marks)	
b) Indirect Transmission	(5 marks)	
9. There's an outbreak of Cholera in your area.		
a) State the clinical manifestations of Cholera disease	(3marks)	
b) Describe the clinical intervention for the disease	(3marks)	
c)Outline the prevention and control measures you will undertake (4 marks) 10.Bonface comes to your clinic with history of difficulty in breathing.		
You make a diagnosis of Asthma. Write short notes on;		
a) Predisposing factors	(3 marks)	
b) Signs and symptoms	(3 marks)	
c) Treatment	(2 marks)	
d) Prevention	(2 marks)	