

## HIV AIDS Exam 3

### SECTION I - ( MULTIPLE CHOICE QUESTIONS) - 20 MARKS)

Instructions: Answer all Questions; Choose one best option that fits the stem statement.

1. One of the following is an indicator of AIDS
  - a) CD4 count lower than 200/ml
  - b) CD4 count more than 400/ml
  - c) CD4 count lower than 600/ml
  - d) Cd4 count lower than 1000/ml
  
2. Definition for epidemiology
  - a) Existing in the form of a widespread epidemic that affects people in many different countries
  - b) Study of origin & spread (cause & transmission) of a disease within a population
  - c) An outbreak of a disease that spreads more quickly and more extensively among a group of people
  - d) The number of cases existing at a particular time for a defined population
  
3. One of the following statements is true about HIV/AIDS
  - a) HIV was identified in 1982
  - b) The acronym AIDS was coined in 1984
  - c) SIV mutated into HIV
  - d) SIV changed to HIV by zoonosis
  
4. A pair of theories that are interrelated
  - a) Conspiracy (man made) theory and colonialism (heart of darkness) theory
  - b) Contaminated needle theory and oral polio vaccine (OPV) theory
  - c) Contaminated needle theory and hunter theory
  - d) Oral polio vaccine (OPV) theory and contaminated needle theory
  
5. One of the following early instances of HIV infections is correctly matched to the year
  - a) 1959 – a DRC adult female lymph node sample
  - b) 1960 – a Norwegian sailor tissue sample
  - c) 1969 – a teenager in St. Louis, America, tissue sample
  - d) 1976 – a DRC adult male plasma sample
  
6. Results from KAIS (2007) indicate that \_\_\_\_\_ percent of Kenyan adults age 15 -64 are infected with HIV.
  - a) 6.7
  - b) 8.4
  - c) 7.4
  - d) 6.4
  
7. According to the KIAS report of 2007, \_\_\_\_\_ has the lowest HIV prevalence
  - a) Eastern
  - b) North Eastern

- c) Coast  
d) Western
8. Group M of HIV-1 consists of multiple genetic subtypes A,B,C,D,E,F,G,H,J,K. Which of these is more virulent than others
- a) A  
b) B  
c) C  
d) D
9. One of the following classes of ARVs is correctly matched to examples of drugs
- a) NRTSs – Lamivudine, Didanosine, Stavudine,  
b) NNTRIs – Efavirenz, Nevirapine, Delavirdine, Ritonavir  
c) Protease inhibitors – Indinavir, Lopinavir, Abacavir  
d) Immunomodulators – Enfuvirtide, Enfuvirtide
10. \_\_\_\_\_ is both an inductor & and inhibitor of the cytochrome P450 isoenzyme.
- a) Efavirenz  
b) Ritonavir  
c) Nevirapine  
d) Stavudine
11. HIV is not spread through
- a) Wet kissing  
b) Breastfeeding  
c) Hugging  
d) Tattooing
12. A correct specific recommendation when to start ART in children is
- a) WHO stage II when TLC is  $<200/\text{mm}^3$   
b) WHO stage I or II disease if CD4 count  $<200/\text{mm}^3$   
c) WHO stage III disease if CD4 count is  $<200/\text{mm}^3$   
d) WHO stage IV disease if CD4 count is  $<350/\text{mm}^3$
13. Efavirenz and Nevirapine may be used interchangeably in cases where one or the other is not tolerated well or can not be used
- a) True  
b) False
14. Core protein of the HIV virus include
- a) P17  
b) P16  
c) P24  
d) P22
15. The main reason for altering a patient's ARV drug regimen
- a) Drug Intolerance  
b) Patients request  
c) nausea

- d) Pregnancy
- 16. Genital warts are caused by
  - a) Human papilloma virus
  - b) Herpes simplex
  - c) Hepatitis B
  - d) Chlamydia
- 17. A clinical features of stage 3 in pediatric HIV
  - a) Oral candidiasis (thrush) after 2 months
  - b) Pulmonary tuberculosis (TB) or lymph node TB
  - c) Recurrent severe bacterial meningitis
  - d) Severe, recurrent bacterial pneumonia
- 18. Children have more side effects than adults to ARVs
  - a) True
  - b) False
- 19. True about Immune Reconstitution Inflammatory Syndrome
  - a) Aspergillus, C.albicans, P.jiroveci and hepatitis B are commonly implicated
  - b) Consistent clinical improvement after starting HAART
  - c) Presents within 2 weeks after initiating HAART
  - d) Managed by temporarily modifying HAART
- 20. Abortion is a complication associated with
  - a) Syphilis
  - b) Gonorrhoea
  - c) Candidiasis
  - d) Chlamydia.

## SECTION B: SHORT ANSWER QUESTIONS – 40 Marks

- 1. Illustrate on a graph the immune response to HIV infection in reference to CD4 cells, HIV-antibodies and HIV RNA copies (8marks)
- 2. What is voluntary counseling and Testing? Identify five Ethical and Legal Issues to consider (8 marks)
- 3. Explain three criteria used to evaluate success and failure of ARV treatment and their timings in response to treatment? (8 marks)
- 4. Describe four ways of controlling sexually transmitted infections ( 8marks)
- 5. Outline four ways in which HIV may be acquired by children from their mothers who are HIV positive and identify three patterns of manifestations in pediatric HIV Infection (8 marks)

## SECTION C: LONG ESSAY QUESTIONS - 40 Marks

- 1. Sub-Saharan Africa is the home to HIV/AIDS. Discuss this statement with reference to possible factors fueling the spread of HIV (20 marks)
- 2. Describe the structure of HIV and its significance to its survival in the host cell (CD4T cell) (20 marks)

