

STELLA MARIS COLLEGE (AUTONOMOUS), CHENNAI – 600 086
(For Candidates admitted during the academic year 2011 – 12 & thereafter)

SUBJECT CODE: 11ZL/MC/LT54

B.Sc. DEGREE EXAMINATION - NOVEMBER 2014
BRANCH VI A – ADVANCED ZOOLOGY & BIOTECHNOLOGY
FIFTH SEMESTER

COURSE : MAJOR CORE
PAPER : MEDICAL LABORATORY TECHNOLOGY
TIME : 3 HOURS **MAX. MARKS: 100**

SECTION – A

ANSWER ALL THE QUESTIONS **(10 x 3 = 30)**

1. FILL IN THE BLANKS:

- a. Hayem's fluid is the commonly used diluting fluid for -----.
- b. Sudden increase in number of leucocytes is called -----.
- c. The hidden blood in the stool is called -----.

2. DISTINGUISH BETWEEN:

- a. ECG AND EEG
- b. Plasma and serum.
- c. Neutropenia and Neutrophilia

3. Draw a neat diagram of various cells in WBC.

4. Define the following:

- a. Buffer solution b. Bio-hazards c. Kidney stones

5. Give the normal range for

- a. Heart beat b. Blood sugar c. Cholesterol level

6. STATE WHETHER THE FOLLOWING STATEMENTS ARE TRUE OR FALSE:

- a. Lactated Ringer's solution is frequently used in human medicine.
- b. Ca^+ and vitamin K are needed for blood coagulation in man.
- c. Hot air oven is used for sterilization of glass or metal.
- d. Haematocrit value of adult female is higher than male.
- e. Blood test is usual test to detect malaria.
- f. Widal test is the common test for AIDS.

7. MATCH THE FOLLOWING:

- a. First aid box - Urine
- b. Blood platelets - AB blood group
- c. Universal recipient - Elephantiasis
- d. Casts - Erythroblastosis fetalis
- e. Microfilaria - Good laboratory
- f. Rh factor - Thrombocytes

8. Give the diagnostic significance of the following tests:
a. Agglutination b. HCG c. ELISA
9. Give the expansion of the following:
a. CSF b. COLD c. ICU
10. Name the causative agents for
a. Amoebiasis b. Gonorrhoea c. Chikungunya

SECTION – B

ANSWER ANY FIVE QUESTIONS

(5 x 6=30)

11. Enumerate some good lab practices.
12. What are the various types of anemia?
13. Describe the determination of ESR.
14. Explain the mechanism of blood clotting.
15. Describe briefly about hepatitis.
16. Give an account on pregnancy test.
17. Write notes on alanine transaminase.

SECTION - C

ANSWER ANY TWO QUESTIONS

(2 x20=40)

18. Write an account on various sterilization techniques.
19. Describe the procedure and significance of total RBC count.
20. Give an account on Blood groups in man.
21. Describe the principle and uses of RIA.
