STELLA MARIS COLLEGE (AUTONOMOUS), CHENNAI – 600 086 (For Candidates admitted during the academic year 2011 – 2012 & thereafter)

SUBJECT CODE: 11ZL/MC/LT54

B.Sc. DEGREE EXAMINATION - NOVEMBER 2016 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

 $(10 \times 3 = 30)$

- 1. Comment on Turk's fluid.
- 2. Give the significance of reticulocytocrit.
- 3. List the different types of anaemia.
- 4. Expand the following a) ACD b) PCV c) MCH
- 5. Mention any three screening tests for Blood transfusion.
- 6. What are Thrombocytes? Highlight their functions.
- 7. Differentiate between Azoospermia and Oligospermia.
- 8. Draw a neat labeled diagram of the Neubauer counting chamber.
- 9. Give the normal range for the following
 - a) Triglycerides b) Total
 - b) Total serum cholesterol c) Blood urea
- 10. Give the principle of Western blot.

SECTION - B

ANSWER ANY FIVE QUESTIONS

 $(5 \times 6=30)$

- 11. Give a brief account on sterilization of laboratory items by heat.
- 12. Discuss in detail about the blood collection techniques.
- 13. Describe the process of Blood coagulation.
- 14. Explain the procedure for identification of malarial parasite in blood smear.
- 15. Write a note on the principle, procedure and clinical relevance of ALT estimation.
- 16. Enumerate the procedure of blood smear preparation for differential count of WBC and add a note on its significance.
- 17. Give a detailed account on AIDS.

SECTION - C

ANSWER ANY TWO QUESTIONS

 $(2 \times 20 = 40)$

- 18. Give a detailed account on the estimation of Erythrocyte Sedimentation Rate and Haemoglobin.
- 19. Explain ABO blood grouping and Rh typing.
- 20. Discuss in detail about the macroscopic, microscopic and chemical analysis of urine.
- 21. Write the principle, procedure and clinical relevance of Blood glucose estimation.