C 62699   (Pages : 2)   Name...............................

Reg. No...........................

SECOND SEMESTER B.Sc. DEGREE EXAMINATION, MAY 2014

(UG—CCSS)

Core Course—Biotechnology

BT 2B 01—GENERAL MICROBIOLOGY

Time : Three Hours   Maximum : 30 Weightage

I. Objective type questions. Answer *all questions* :

A. Multiple Choice :

1 Acid fast staining is used to stain :

    (a) Corynebacterium.   **(b)** E.coli.

    (c) Mycoplasma.   **(d)** Actiromycetes.

2 Serum can sterilized by :

    (a) Autoclaving.   **(b)** Tyndallization.

    (c) Pasteurization.   **(d)** Filteration.

3 Which among is an enriched medium :

    (a) Nutrient agar.   (b) **Blood agar.**

    (c) Potato dextrose agar.   (d) LB agar.

4 Which one is a spirocheate :

    (a) Borrelia.   (b) Vibrio.

    (c) Nocardia.   (d) Pseudomones.

B. Fill in the blanks :

5 Microscope was invented by _____

6 Undefined media are called _____

7 Presence of bacterial capsule is demonstrated by _____ technique.

8 The site of action of pencillin is _____

C. Answer in one word

9 The bacterium which used as biopesticide.

10 The common media used for **fungal** cultivation.

11 E.coli phages are known as.

12 The organism which are reduced inorganic substance as their electron source are known as.

(12 x ¼ = 3 weightage)

Turn over

II. Short Answer type questions. Answer all *nine* questions :

13 Dimorphism.   14 Potato dextrose agar.

15 Nucleocapsid.   16 L-form.

17 McIntosh Fildes Jar.   18 Capsule.

19 Psychrophiles.   20 Cold sterilization.

21 Group translocation.

(9 x 1 = 9 weighta

III. Short Essay *or* Paragraph Questions. Answer any *five* questions :

22 Gram staining procedure and principle.

23 Electron transport chain.

24 Explain Embden Mayorhof pathway.

25 Methods used for microbial growth measurement.

26 Mycotoxins.

27 Enumeration and cultivators of viruses.

28 Typhoid fever.

(5 x 2 = 10 weightage)

IV. Essay questions. Answer any *two* questions. Explain the following :

29 Nutritional classes and nutritional grouping of baacteria

30 Describe factors influencing microbial growth.

31 Describe the ultrastructure of bacteria.

(2 x 4 = 8 weightage)