

1. Glycerol is the backbone of:
 - (A) Glycerophospholipid.
 - (B) Sphingo phospholipid.
 - (C) Glycolipids.
 - (D) Cholesterol esters.
2. The degree of unsaturation of lipids can be measured as:
 - (A) Iodine number.
 - (B) Saponification number.
 - (C) Reichert Meissel number.
 - (D) Polenske number.
3. Rancidity of lipids of lipid-rich foodstuff is because of:
 - (A) Hydrogenation of unsaturated fatty acids.
 - (B) Reduction of fatty acids.
 - (C) Dehydrogenation of saturated fatty acids.
 - (D) Oxidation of fatty acids.
4. At isoelectric point, amino acid exists as:
 - (A) Cations.
 - (B) Anions.
 - (C) Zwitter ions.
 - (D) None of this.
5. The higher levels of protein structure is supported by:
 - (A) Hydrogen bonds.
 - (B) Disulphide bonds.
 - (C) Electrostatic interactions.
 - (D) All.
6. Active form of vitamin D is:
 - (A) 1, 25 DHCC.
 - (B) 24,25DHCC.
 - (C) 1, 24 DHCC.
 - (D) 25 HCC.
7. Ketosis occurs in all of the following except:
 - (A) Diabetes mellitus.
 - (B) Marasmus.
 - (C) Prolonged starvation.
 - (D) High fat diet.
8. During electrophoretic separation, the fastest moving lipoprotein is:
 - (A) HDL.
 - (B) LDL.
 - (C) VLDL.
 - (D) Chylomicron.
9. Osmotically active substances in plasma are:
 - (A) Sodium.
 - (B) Chloride.
 - (C) Protein.
 - (D) All.

10. The anticoagulant used for blood sugar estimation is:
 - (A) Heparin.
 - (B) Double Oxalate.
 - (C) Sodium fluoride.
 - (D) EDTA.

11. Element called “one way substance” is:
 - (A) Iodine.
 - (B) Iron.
 - (C) Calcium.
 - (D) Sodium.

12. The 21st amino acid is:
 - (A) Hydroxy Tyrosine.
 - (B) Hydroxy Proline.
 - (C) Selenocysteine.
 - (D) Serine.

13. Which of the following amino acid is a precursor of Niacin?
 - (A) Cysteine.
 - (B) Threonine.
 - (C) Valine.
 - (D) Tryptophan.

14. Which of the following amino acids is not necessary to be taken in the diet?
 - (A) Cysteine.
 - (B) Threonine.
 - (C) Valine.
 - (D) Glycine.

15. The unit that compares the biological effectiveness of the different types of radiation is the:
 - (A) Roentgen.
 - (B) RAD.
 - (C) RAM.
 - (D) QF.

16. Which of the following is categorized as an incineration waste?
 - (A) Incineration ash.
 - (B) Animal waste.
 - (C) Solid waste.
 - (D) Cytotoxic drugs.

17. Which of the following is not a waste treatment method for biomedical wastes?
 - (A) Incineration.
 - (B) Chemical disinfecting.
 - (C) Autoclaving.
 - (D) Sieving.

18. Hybridoma technique helps to produce the following:
- (A) Antigen.
 - (B) Monoclonal Antibody.
 - (C) Anti-Antibody.
 - (D) None of these.
19. Ammonia in the brain is converted into:
- (A) Urea.
 - (B) Glutamine.
 - (C) Glutamic acid.
 - (D) Creatinine.
20. _____ transports unconjugated bilirubin to the liver.
- (A) Globulin.
 - (B) Albumin.
 - (C) AST.
 - (D) ALP.
21. High concentration of glucose 6-phosphate is inhibitory to _____.
- (A) Phosphofructokinase-1.
 - (B) Pyruvate kinase.
 - (C) Glucokinase.
 - (D) Phosphofructokinase-6.
22. QIP stands for:
- (A) Quality improvement program.
 - (B) Quality imparts process.
 - (C) Quality import procedure.
 - (D) None of the above.
23. Which of the following is not the electrolyte?
- (A) Bicarbonate.
 - (B) Potassium.
 - (C) Magnesium.
 - (D) Sodium.
24. ISO is an abbreviation for:
- (A) International organization for standardization.
 - (B) Indian standard organization.
 - (C) International standard organization.
 - (D) Internet standard organization.
25. The instrument used to measure the color intensity of a solution is:
- (A) Auto analyzer.
 - (B) Semi auto analyzer.
 - (C) Colorimeter.
 - (D) pH meter.

26. LDH1 and LDH2 isoenzymes are significantly elevated in blood in:
- (A) Myocardial infarction.
 - (B) Diabetes Mellitus.
 - (C) Infective hepatitis.
 - (D) Anemia.
27. Dopamine is synthesized from which amino acid?
- (A) Tyrosine.
 - (B) Tryptophan.
 - (C) Histidine.
 - (D) Methionine.
28. Which of the following is an imino acid?
- (A) Alanine.
 - (B) Glycine.
 - (C) Proline.
 - (D) Serine.
29. Citrullinemia is the disorder of which pathway?
- (A) Transamination.
 - (B) Deamination.
 - (C) Urea cycle.
 - (D) None.
30. Unfolding of protein can be termed as _____.
- (A) Renaturation.
 - (B) Denaturation.
 - (C) Oxidation.
 - (D) Reduction.
31. Glycogen in animals are stored in _____.
- (A) Liver and spleen.
 - (B) Liver and muscle.
 - (C) Liver and bile.
 - (D) Liver and Adipose.
32. The enzyme which belongs to the class hydrolase is _____.
- (A) Dehydrogenase.
 - (B) Kinase.
 - (C) Lipase.
 - (D) Carboxylase.
33. Spectrophotometer obeys the rule of:
- (A) Dalton's Law.
 - (B) Laplace law.
 - (C) Charles's law.
 - (D) Beer lambert law.
34. Master gland of the body is _____.
- (A) Pituitary gland.
 - (B) Thyroid gland.
 - (C) Adrenal gland.
 - (D) Gonads.

35. Which is not a liver function test?
(A) Albumin.
(B) ALP.
(C) CK.
(D) Bilirubin.
36. Phosphate buffer system is found in:
(A) Intracellular fluid.
(B) Extracellular fluid.
(C) Transcellular fluid.
(D) Paracellular fluid.
37. Pernicious anemia is due to deficiency of:
(A) Folic acid.
(B) Vitamin B7.
(C) Vitamin B12.
(D) Vitamin K.
38. Protein digestion occurs in the:
(A) Stomach and duodenum.
(B) Stomach.
(C) Duodenum.
(D) Kidney.
39. Fireflies are an example of:
(A) Bioluminescence.
(B) Photolysis.
(C) Photosynthesis.
(D) Photoisomerisation.
40. Proteins can be removed by which treatment?
(A) Phenol and chloroform treatment.
(B) Sodium hydroxide.
(C) Chloroform.
(D) Centrifugation.
41. The purification of enzyme most commonly done by:
(A) Paper chromatography.
(B) Affinity.
(C) Ion exchange.
(D) All.
42. The two nitrogen of urea are derived from which compound?
(A) Arginosuccinate and ammonia.
(B) Alanine and ammonia.
(C) Aspartate and ammonia.
(D) Glutamate and ammonia.
43. Competitive ELISA which is detected in Sample:
(A) Antigen.
(B) Antibody.
(C) Both.
(D) None.

44. In uncompetitive inhibition V_{max} will:
- (A) Increase.
 - (B) Remain same.
 - (C) Slightly increase.
 - (D) Decrease.
45. Hypercalcemia is due to:
- (A) Decrease in serum calcium.
 - (B) Increase in serum calcium.
 - (C) Increase in serum phosphate.
 - (D) Decrease in serum phosphate.
46. Thiol group is present in:
- (A) Histidine.
 - (B) Arginine.
 - (C) Cystine.
 - (D) Valine.
47. Absorption of calcium involves the participation of:
- (A) Vit A.
 - (B) Vit D.
 - (C) Vit E.
 - (D) Vit K.
48. EDTA prevents Blood clotting by:
- (A) Binding with fibrinogen.
 - (B) Binding with calcium.
 - (C) Inhibiting prothrombin.
 - (D) None.
49. Function of Fluoride in fluoride oxalate vial:
- (A) Acts as anticoagulants.
 - (B) Antiglycolytic agent.
 - (C) Acts as buffer.
 - (D) Chelating agent.
50. Calcitonin comprises of how many amino acids?
- (A) 30.
 - (B) 32.
 - (C) 42.
 - (D) 20.
51. Virus will contain:
- (A) Cell membrane.
 - (B) Cell wall.
 - (C) DNA.
 - (D) DNA or RNA.
52. Shape of bacteriophage is:
- (A) Brick shape.
 - (B) Bullet shape.
 - (C) Helical shape.
 - (D) Tadpole shape.

53. Spirochete is:
- (A) Gonococci.
 - (B) Streptococcus.
 - (C) Treponema pallidum.
 - (D) Clostridium.
54. Cell wall of Gram negative bacteria is:
- (A) Thick.
 - (B) Lipids are present.
 - (C) Teichoic acids are absent.
 - (D) None of these.
55. The largest protozoa is:
- (A) Balantidium coli.
 - (B) Entamoeba coli.
 - (C) Trichomonas vaginalis.
 - (D) Toxoplasma gondi.
56. Which of the following are acid fast structures?
- (A) Mycobacteria.
 - (B) Bacterial spore.
 - (C) Nocardia.
 - (D) All of these.
57. Confirmatory test for AIDS is:
- (A) Western blot test.
 - (B) ELISA test.
 - (C) Immunoelectrophoresis.
 - (D) Karpas test.
58. Lysol is a:
- (A) Sterilant.
 - (B) Disinfectant.
 - (C) Antiseptic.
 - (D) Antifungal agent.
59. Culture media used for fungus is:
- (A) Sabouraud's medium.
 - (B) Nutrient agar.
 - (C) Blood agar.
 - (D) LJ media.
60. Laboratory diagnosis of enteric fever based on:
- (A) Blood culture.
 - (B) Urine and stool culture.
 - (C) Widal test.
 - (D) All of the above.
61. Which of the following method of sterilization has no effects on spore?
- (A) Drying.
 - (B) Hot air oven.
 - (C) Autoclave.
 - (D) None of these.

62. Best method for getting pure culture is:
- (A) Streak plate.
 - (B) Agar slant.
 - (C) Both A & B.
 - (D) None of these.
63. Glassware are sterilized by:
- (A) Autoclave.
 - (B) Hot air oven.
 - (C) Incineration.
 - (D) None of these.
64. Example of Anaerobic medium is:
- (A) Robertson cooked meat medium.
 - (B) Nutrient agar.
 - (C) Blood agar.
 - (D) MacConkey's agar.
65. Rapid bacterial growth phase is known as:
- (A) Log.
 - (B) Lag.
 - (C) Lack.
 - (D) None of these.
66. Minimum growth temperature is:
- (A) The growth of organisms at lowest temperature.
 - (B) The lowest temperature at which the microorganisms grow.
 - (C) The maximum temperature at which the growth is stable.
 - (D) None of these.
67. Genetic information transfer DNA to RNA is called:
- (A) Transcription.
 - (B) Transduction.
 - (C) Transformation.
 - (D) Recombination.
68. Broken glass are discarded in:
- (A) Yellow bag.
 - (B) Red bag.
 - (C) White Container.
 - (D) Blue bag.
69. Function of bacterial flagella:
- (A) Adhesion.
 - (B) Locomotion.
 - (C) Both.
 - (D) None of the above.
70. Dengue virus transmitted from person to person by:
- (A) Aedes aegypti.
 - (B) Aedes africanus.
 - (C) Culex tritaeniorhynchus.
 - (D) Female anopheles mosquito.

71. HEPA filter full form is:
- (A) High effective particulate Air.
 - (B) High efficiency particulate Air.
 - (C) High efficiency processed Air.
 - (D) High efficiency processed air.
72. What is RPM?
- (A) Rotation per minute.
 - (B) Revolution per minute.
 - (C) Rate per minute.
 - (D) Revolve per minute.
73. Oil used in slide for Microscopy:
- (A) Cedarwood oil.
 - (B) Palm oil.
 - (C) Olive oil.
 - (D) Coconut oil.
74. Life span of RBC:
- (A) 7 days.
 - (B) 120 days.
 - (C) 1 month.
 - (D) 3 months.
75. Definition of an antiseptic:
- (A) Chemicals that prevent infection & damage living tissues.
 - (B) Chemicals that prevent infection without damaging living tissues.
 - (C) Chemicals that can prevent infection on non-living tissues.
 - (D) Chemicals that can only kill infection on animal housing.
76. Hepatitis A virus transmitted by:
- (A) Parental transfusion.
 - (B) Sexual transmission.
 - (C) Feco oral route.
 - (D) By fomites.
77. The symptom “general feeling of illness and discomfort” is called:
- (A) Cystitis.
 - (B) Malaise.
 - (C) Anaphylactic shocked.
 - (D) Arthritis.
78. Amoebic dysentery in humans is caused by:
- (A) Plasmodium.
 - (B) Paramecium.
 - (C) Yeast.
 - (D) Entamoeba histolytica.
79. Bacteria multiply by:
- (A) Spore formation.
 - (B) Simple binary fission.
 - (C) Conjugation.
 - (D) Gametes.

80. Antibodies in our body produced by:
- (A) B-Lymphocytes.
 - (B) T-Lymphocytes.
 - (C) Monocytes.
 - (D) RBC's.
81. Vaccines used against viral infections are:
- (A) Cholera Vaccine.
 - (B) Measles & Mumps Vaccine.
 - (C) Typhoid Vaccine.
 - (D) DPT Vaccine.
82. Mantoux test is used for detection of:
- (A) Tuberculosis.
 - (B) Diphtheria.
 - (C) Cholera.
 - (D) Tetanus.
83. Delayed type of hypersensitivity reactions seen in:
- (A) Penicillin allergy.
 - (B) Contact dermatitis.
 - (C) Arthus reaction.
 - (D) Anaphylaxis.
84. The organisms which can grow best in the presence of a low concentration of oxygen:
- (A) Aerobic.
 - (B) Anaerobic.
 - (C) Microaerophilic.
 - (D) Aerophilic.
85. Cerebral malaria is caused by:
- (A) Plasmodium vivax.
 - (B) Plasmodium ovale.
 - (C) Plasmodium malariae.
 - (D) Plasmodium falciparum.
86. A cell becomes flaccid when placed in a:
- (A) Isotonic solution.
 - (B) Hypertonic solution.
 - (C) Hypotonic solution.
 - (D) Normal solution.
87. The main feature of prokaryotic organism is:
- (A) Absence of Locomotion.
 - (B) Absence of nuclear envelope.
 - (C) Absence of nuclear material.
 - (D) Absence of Protein synthesis.
88. All are examples of nematode except:
- (A) Ascaris lumbricoides.
 - (B) Hookworm.
 - (C) Pinworm.
 - (D) Echinococcus granulosus.

89. Which immunoglobulin secreted in body fluid?
(A) IgM.
(B) IgG.
(C) IgA.
(D) IgE.
90. Serological reactions are use useful for:
(A) Detection of antigen.
(B) Detection of antibody.
(C) Both A and B.
(D) None of the above.
91. Coagulase test is done to differentiate:
(A) Staphylococcus aureus from Staphylococcus epidermidis.
(B) Staphylococcus epidermidis from Neisseria meningitidis.
(C) Streptococcus pyogenes from Enterococcus faecalis.
(D) Streptococcus pyogenes from Staphylococcus aureus.
92. Which of the following dye is commonly used for negative staining technique?
(A) Crystal violet.
(B) Lactophenol cotton blue.
(C) Periodic acid-schiff stain.
(D) India Ink.
93. Which part of the compound microscope helps in gathering and focusing light rays on the specimen to be viewed?
(A) Condenser lens.
(B) Magnifying lens.
(C) Objective lens.
(D) Eyepiece lens.
94. Cryptococcosis is a disease of:
(A) Viral infection.
(B) Parasitic infection.
(C) Bacterial infection.
(D) Fungal infection.
95. Inclusion bodies diagnostic of rabies are called:
(A) Elementary bodies.
(B) Paschen bodies.
(C) Negri bodies.
(D) Guarnieri bodies.
96. Bacillus is an example of:
(A) Gram positive bacteria.
(B) Gram negative bacteria.
(C) Virus.
(D) Protozoa.
97. Cell wall is:
(A) Thick in Gram negative than gram positive bacteria.
(B) Thick in Gram positive than gram negative bacteria.
(C) Equal in both.
(D) In gram negative bacteria cell wall is absent.

98. The arrangement of Staphylococci is:
- (A) In chains.
 - (B) In clusters.
 - (C) In pairs.
 - (D) None of the above.
99. The organ of adhesion in bacteria is:
- (A) Flagella.
 - (B) Fimbriae.
 - (C) Capsule.
 - (D) Mesosomes.
100. Agar-agar is used in microbiological media for:
- (A) Nutritive value.
 - (B) Solidifying media.
 - (C) Carbon source.
 - (D) All the above.