- 55. Which of the following will be increased in vitamin K deficiency?
  - (a) The plasma concentration of calcitonin
  - (b) The plasma concentration of prothrombin
  - (c) The time for blood to clot
  - (d) The time for broken bones to heal
- 56. Which of the following will increase in vitamin D deficiency?
  - (a) The plasma concentration of prothrombin
  - (b) The plasma concentration of preprothrombin
  - (c) The plasma activity of alkaline phosphatase
  - (d) The plasma activity of acid phosphatase
- 57. Name the disease caused by the deficiency of Niacin?
  - (a) Pellagra
  - (b) Rickets
  - (c) Scurvy
  - (d) Pernicious anemia
- 58. Which of the following cell organelle is responsible for transporting, modifying, and packaging proteins and lipids?
  - (a) Mitochondria
  - (b) Endoplasmic Reticulum
  - (c) Golgi Complex
  - (d) DNA
- 59. A cell organelle that is present in animal cells but not present in plant cells is?
  - (a) Cytoplasm
  - (b) Centrosome
  - (c) Mitochondrial
  - (d) Cytoplasm
- 60. Which of the following promote curvature of cell membrane?
  - (a) Phosphatidyl serine (PS)
  - (b) Phosphatidyl inositol(PI)
  - (c) Phosphatidyl choline (PC)
  - (d) Phosphatidyl ethanolamine (PE)
- 61. Carbonic acid and bicarbonate ions buffer which of the following?
  - (a) Cytosol
  - (b) Cytoplasm
  - (c) Blood
  - (d) Lymph

- 62. Which among the following is studied under 'fulminology'?
  - (a) Sudden changes in atmosphere
  - (b) Lightning
  - (c) Cloudbursts
  - (d) Volcanic Eruptions
- 63. A small quantity of water is placed in a small cavity made in a block of Ice at 0 degree centigrade. Which of the following will happen?
  - (a) the temperature of water will become zero and it will freeze
  - (b) the temperature of water will become zero but it will not freeze
  - (c) the temperature of the water will become zero and it will come out of the cavity
  - (d) the temperature of the water will become zero and ice will melt to merge with water
- 64. Which among the following is known as first electronic amplification device?
  - (a) Diode
  - (b) Triode Vaccum Tubes
  - (c) Vacuum Tubes
  - (d) Bipolar transistors
- 65. Assertion (A): Non-metals are electronegative in nature.

Reason (R): They have tendency to lose electrons.

Choose the correct option:

- (a) Both (A) and (R) are true and (R) is the correct explanation of (A).
- (b) Both (A) and (R) are true, but (R) is not the correct explanation of (A).
- (c) (A) is true, but (R) is false.
- (d) (A) is false, but (R) is true.
- 66. VIBGYOR (Violet, Indigo, Blue, Green, Yellow, Orange, Red) are the rainbow colors in which of the following order?
  - (a) Increasing wavelength
  - (b) Decreasing wavelength
  - (c) Increasing polarization
  - (d) Increasing Speed
- 57. Which of the following waves can be used to measure the speed of a approaching car?
  - (a) Light waves
  - (b) Micro waves
  - (c) Radio waves
  - (d) Sound waves

