

Biology Important Questions and Topics

Unit 1 :

1. Difference between Unicellular and Multicellular Organisms.
2. In which organisms all functions are performed by single cell?
 - (a) Unicellular
 - (b) Multicellular
3. The term cell was given by
 - (a) Robert Hooke
 - (b) Tatum
 - (c) Schwann
 - (d) De Bary
4. A plant cell wall is mainly composed of
 - (a) Protein
 - (b) Cellulose
 - (c) Lipid
 - (d) Starch
5. Definition of Cell.
6. Types of Cell.
7. Difference between Prokaryotic and Eukaryotic cell.
8. Cell theory and its principles.

9. Who gave cell theory

(a) Schleiden and Schwann

(b) Robert Hook

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(d) None of these

10. Functions of Cell.

11. Difference between animal cell and plant cell.

12. Cell wall is absent in animal cell.

(a) True

(b) False

13. Structure of Cell.

14. Cell organelles.

15. Power house of the cell ?

16. Which cellular structure regulates the entry and exit of molecules to and from the cell?

17. Central dogma.

18. Transcription.

19. Translation.

20. Gene.

21. What is called the flow of genetic information in the cells?

22. Structure of Proteins.

23. Smallest unit of proteins?

24. Protein Synthesis.

25. Role of mRNA,Trna,rRNA in Protein synthesis

26. Where are amino acids assembled into a chain of proteins?

27. Mitosis is what type of division ?

(a) cell

(b) nuclear

28. How many nitrogenous bases are present in one codon ?

(a) 2

(b)3

©4

(d)5

29. Kitchen of cell

30. Director of the cell

31. Protein factory of the cell.

32. In eukaryotes 70 S types of ribosomes in its cytoplasm.

- (a) True.
- (b) False.

33. Cells arise from pre existing cells by cell division was suggested by

- (a) Schleiden
- (b) Hooke
- © Rudolf Virchow
- (d) None of these

34. Cell cycle.

35. Nuclear DNA replicates in which phase ?

- (a) G₂
- (b) M
- © S

36. Formation of cell plate starts at which phase ?

37. Cell division and their types.

38. Synapsis is defined as the pairing of

- (a) Homologous chromosomes
- (b) Non – homologous chromosomes
- © Any chromosomes
- (d) Acentric chromosomes

39. Chromosomes structure can be observed best during

- (a) Anaphase
- (b) Metaphase
- © Telophase

40. The spindle apparatus is formed during which phase of mitosis?

- (a) Telophase
- (b) Metaphase
- © Prophase
- (d) Anaphase

41. The longest stage in the cell cycle is ?

42. The condensation of chromosomes is observed in _____

- (a) Prophase 1
- (b) Anaphase 1
- © Metaphase 1
- (d) None of the above

43. is a form of cell division which results in the creation of gametes or sex cells.

- (a) Mitosis
- (b) Meiosis
- © Miosis
- (d) None of the above

44. _____ is the number of DNA in the chromosome at the G₂ stage of the cell cycle

- (a) 1

(b)2

©3

(d)0

45. The stage which serves as a connecting link between meiosis 1 and meiosis 2

(a) Interphase 2

(b)Interphase 1

©Interkineses

(d)None of the above

46. The _____ state implies the exit of cells from the cell cycle

(a) S

(b)G1

©G2

(d)G0

47. Apoptosis

48. Cell organelle that participates actively in animal apoptosis.

49. What is an active cell death process?

50. Stem cells,origin,function and their types.

51. Cells or tissue donated by a related or unrelated individual are called

52. What is the process of cell specialisation called?

53. What is the process in which organs can be conserved?

54. Chondrocyte is the cell which secretes?

55. Tissue Engineering.

56. Where are stem cells present ?

(a) Unicellular

(b) Multicellular

©Non living things

57. Which cells can form a complete organism?

58. Programmed cell death is called?

(a) Necrosis

(b) Apoptosis

©Autophagy

59. Which cell cycle phase has longest duration?

(a) Interphase

(b) Metaphase

©Telophase

60. What is the main function of tRNA in terms of protein synthesis ?

(a) Proof Reading

(b) Identifies amino acids and transports them to ribosomes.

© Inhibits protein synthesis.

(d) All of these