Chapter- 1

REPRODUCTION IN PLANTS.

Sub- Introduction, modes of reproduction in plants, asexual reproduction, Binary fission, Budding, Fragmentation, Spore formation, Vegetative reproduction.

Period-1

Level-1 **1 Mark Questions**

Easy-Very Short Answers

Name any two types of asexual reproduction.

1 . Define reproduction.

2. Name two organisms that show asexual reproduction.

3. How does Hydra reproduce? Name another organism that reproduces by a similar method.

4. What is a spore?

Level-2 **2 Marks Questions**

Medium

5.How does binary fission in amoeba differ from binary fission in Leishmania?

6. How will an organism be benefitted if it reproduces through spores?

7. Can you think of reasons why more complex organisms cannot give rise to new individuals

Level-3 **3 Marks Questions**

8.What are the advantages of sexual reproduction over asexual reproduction?

9. What is asexual reproduction? Explain briefly various methods of asexual reproduction

Level-4 **5 Marks Questions**

HOTS Questions

10.Why are budding, fragmentation and regeneration all considered as asexual types of reproduction? With neat diagrams explain the process of regeneration in *Planaria.*

11. (a) Give reason : Regeneration is not the same as Reproduction.

(b) State the mode of a asexual reproduction in *Plasmodium*

Period-2

Sub- Reproduction by stem, Reproduction by Leaf, Reproductionby Root, Advantages of vegetative reproduction, Disadvantages of vegetative reproduction

Level-1 **1 Mark Questions**

Easy-Very Short Answers

12. Name two plants which reproduce through spores.

13. Which vegetative part is used in the propagation of Bryophyllum and mint

Level-2 **2 Marks Questions**

Medium

14.What is vegetative reproduction?

15.Briefly explain why a gardener prefers to grow certain plants vegetatively?

16..What is advantages of sexual reproduction over asexual reproduction?

17.. Differentiate between natural and artificial vegetative propagation.

Level-3 **3 Marks Questions**

18. Some plants are propagated only by vegetative propagation ?why?

19. What is 'vegetative propagation'? Write two examples where it is used. State two reasons of practicing vegetative propagation for giving same types of plants

Level-4 5 Marks Questions

HOTS Questions

20- a-Name some plants where layering is used.

b- Which technique would you use for propagating improved varieties of mango and rose?

Period-3

Sub- Artificial vegetative propagation- Cutting, Layering, Grafting,Micro-propagation

Level-1 **1 Mark Questions**

Easy-Very Short Answers

21. Name two types of layering.

22. Name some plants where layering is used.

23. Which technique would you use for propagating improved varieties of mango and rose? **23.** Name various types of asexual reproduction

Level-2 **2 Marks Questions**

Medium

24. Name two plants which reproduce through spores.

25. Why is regeneration considered a method of reproduction?

26. Which vegetative part is used in the propagation of Bryophyllum and mint?

Level-3 3 Marks Questions

27. Which technique would you use for propagating improved varieties of mango and rose?
28.Name various types of asexual reproduction.

Level-4 **5 Marks Questions**

HOTS Questions

29. What is 'vegetative propagation'? Write two examples where it is used. State two reasons of practicing vegetative propagation for giving same types of plants.

Period-4

Sub- Sexual reproduction in plants - Calyx, Corolla, Androecium, Gynoecium, Ovules.

Level-1 **1 Mark Questions**

Easy-Very Short Answers

30. what is the function of corolla?

31.what is the function of calyx?

32.what is sexual reproduction.?

Level-2 **2 Marks Questions**

Medium

33. Draw a diagram of a flower to show its male and female reproductive parts. Label on it : a.-the ovary b- the anther c- the filament d- the stigma .

34. Desribe the fertilization in flower.

Level-3 **3 Marks Questions**

35.Draw and label the parts of a flower.

36. What are the functions of the following parts of a flower?

37. What is pollination?

38. What are the steps involved in fertilization and formation of seeds?

39. Draw the longitudinal section of pistil to show pollen grains' germination.

40. List the events after fertilization in an angiosperm takes place.

Level-4 **5 Marks Questions**

HOTS Questions

41.Draw a neat, labelled diagram of a pistil showing pollen tube growth and its entry into the ovule.

42. Draw the diagram of a flower and label the four whorls. Write the names of gamete producing organs in the flower.

Period-5

Sub- Pollination, Self-pollination, Cross pollination, Agents of pollination. Characteristics of insect,wind and water pollinated flowers, Artificial pollination, Fertilization, doublefertilization.

Level-1 **1 Mark Questions**

Easy-Very Short Answers

43. Write two ways in which pollination may occur in plants.

44.Name the three agents of pollination.

45.Give two features of flowers which favour pollination by insects.

Level-2 **2 Marks Questions**

Medium

46.Name two characteristics of flowers in which pollination occurs by wind.

47.Name any three agencies for dispersal of seeds.

48.What is self-pollination?

49. What is cross pollination?

50. What are the agents of pollination?

51. Which process results in formation of zygote

Level-3 **3 Marks Questions**

52. **What happens to the pollen which falls on a suitable stigma? Explain.**

53. Why cannot fertilisation take place in flowers if pollination does not occur?

Level-4 **5 Marks Questions**

HOTS Questions

54.Distinguish between pollination and fertilisation. Mention the site and product of fertilisation in a flower.

55. In a bisexual flower inspite of the young stamens being removed artificially, the flower produces fruit. Give reasons.