

UNIT III : REPRODUCTION IN PLANTS

6. MODES OF REPRODUCTION

1 × 4 = 4 Marks

ROOT POINTS

1. **Reproduction** enables a species to live generation after generation.
2. **Types of Reproduction in organisms:** (i) asexual reproduction (ii) sexual reproduction
3. In **asexual reproduction, gametic fusion does not occur**, whereas in sexual reproduction gametic fusion occurs. [IPE]
4. Asexual reproduction is involved with **single parent**, but sexual reproduction involves two parents (Male and Female). [IPE]
5. In asexual reproduction **fertilization doesnot take place**, but in sexual reproduction fertilization takes place. [IPE]
6. In asexual reproduction **off springs are identical and same as parents**, but in sexual reproduction variation in off springs takes place. [IPE]
7. Asexual reproduction is common in algae and fungi, they produce zoospores and conidia.
8. Asexual reproduction of Angiosperms is called **Vegetative Propagation**.
9. Vegetative propagation in angiosperms is by **runners, rhizomes, suckers, tubers, offsets**.
10. The process of formation of two types of gametes, male and female is called **gametogenesis**.
11. **Events of sexual reproduction:** Pre-fertilization, Fertilization and Post-fertilization events.
12. **Pre-fertilization** events include gametogenesis and gamete transfer.
13. **Post-fertilization** events include formation of zygote and embryogenesis. [IPE]
14. Plants are designed as monoecious and dioecious. Flowers may be unisexual or bisexual.
15. **Transfer of male gametes** is done by **pollination** in angiosperms.
16. **Syngamy** occurs between male and female gametes. Syngamy may be external or internal.
17. The process of development of **embryo from zygote** is called **embryogenesis**.
18. In flowering plants after fertilisation **ovary develops into fruit** and **ovules into seeds**.

FRUITY Qs OF IPE**1x4 = 4 Marks**

1. List the changes observed in angiosperm flower subsequent to pollination and fertilisation.
2. Write a brief account on gametogenesis with examples.
3. Define (a) Juvenile phase (b) Reproductive phase.
4. Distinguish between asexual and sexual reproduction. Why is vegetative reproduction also considered as a type of asexual reproduction?
5. Give a brief account on the phases of the life cycle of an angiosperm plant.
6. Identify each part in a flowering plant and write whether it is haploid (n) or diploid (2n)
(a) Ovary..... (b) Anther (c) Egg..... (d) Pollen(e) Male gamete.....
(f) Zygote..... (g) Antipodal..... (h) Megaspore mother cell.....

BULLET MASTER'S**BOT BEATS!**

Reproduction is the only way to multiple living organisms.

But this multiplication is not seen in case of non-living things.

For if, it happens in non-living things then what happens you know?

There is no need of producing so many things like vehicles. A single makes many.

"Multiplication by means of Reproduction" is of several manners like a destination has several routes.

Similarly Mode of Reproduction may occur in different ways like **Vegetative, Asexual, Sexual...**