

OJEE 2014

BOTANY

Set-I

1. Capsids are helical in shape in the following virus
a) Influenza virus b) TMV
c) T-even phage d) Adenovirus
2. Which of the following has DNA in it ?
a) TMV b) Potato X virus
c) Cauliflower mosaic virus d) Bean mosaic virus
3. Which of the following is known commonly as "Baker's yeast" ?
a) *Schizosaccharomyces pombe*
b) *Saccharomyces cerevisiae*
c) *Saccharomyces japonicus*
d) *Saccharomyces octosporus*
4. Spiral shaped chloroplasts are present in
a) *Funaria* b) *Cycas*
c) *Spirogyra* d) *Dryopteris*
5. Coralloid roots are present in
a) *Cycas* b) *Pinus*
c) *Gnetum* d) *Taxus*
6. Zygomorphic flowers are seen in
a) Malvaceae b) Brassicaceae
c) Fabaceae d) Orchidaceae
7. Binomial nomenclature was introduced by
a) Theophrastus b) Linnaeus
c) Aristotle d) Bentham and Hooker
8. *Hibiscus* sps. belongs to the family
a) Malvaceae b) Brassicaceae

c) Fabaceae d) Liliaceae

9. DNA molecule is made up of

- a) Fats b) Nucleic acids
- c) Chitins d) Amino acids

10. Muton is a unit of

- a) Mutation b) Recombination
- c) Synthesis d) Fission

11. The ribosomes of eukaryotes are

- a) 60 S type b) 70 S type
- c) 80 S type d) 90 S type

12. Crossing over occurs during

- a) Fertilization b) Pollination
- c) Mitosis d) Meiosis

13. The most fundamental characteristic of cells is

- a) Photosynthesis b) Respiration
- c) Protein synthesis d) Self reproduction

14. The interphase chromosomes are in a

- a) Condensed state b) Degraded state
- c) Decondensed state d) Denatured state

15. The phase between two mitotic divisions is called

- a) Metaphase b) Anaphase
- c) Telophase d) Interphase

16. The part of a plant that is inoculated on to the culture medium for plant tissue culture

- a) Plant organ b) Explant
- c) Synseed d) Propagule

17. BT cotton as an example of

- a) New generation plant b) Intergeneric hybrid plant
- c) Interspecific hybrid plant d) Transgenic plant

18. Cambium is a

- a) Lateral meristem b) Intercalary meristem

- c) Apical meristem d) Secretory tissue

19. The end product of Glycolysis is

- a) Ethyl alcohol b) Citric acid
c) Pyruvic acid d) Glyceraldehyde phosphate

20. The molecule that traps light energy is

- a) Cyanacobalamin b) Riboflavin
c) Chlorophyll d) Propagule

21. The O₂ liberated during photo synthesis comes from

- a) Hydrolysis of carbohydrates
b) Photolysis of water
c) Break down of chlorophyll
d) Reduction of CO₂

22. The final electron acceptor of the electron transport chain is

- a) Cytochrome a₃ b) Cytochrome c
c) Plastoquinone d) Cytochrome b

23. The products of light reaction in photosynthesis are

- a) ADP & Glucose b) ATP & NADPH
c) Ferridoxin d) Plastoquinone & cytochrome f.

24. Ethylene induces

- a) Fruit production b) Shoot elongation
c) Root elongation d) Fruit ripening

25. The Earth and Atmosphere including the living organisms is known as

- a) Biosphere b) Biota
c) Ecosystem d) Ecology

26. A group of interacting organisms along with their environment is known as

- a) Biome b) Edaphic factors
c) Ecosystem d) Biota

27. This is an Edaphic factor

- a) Soil b) Temperature
c) Wind d) rainfall

28. *Oryza sativa* is the botanical name of

- a) Wheat
- b) Rice
- c) Maize
- d) Bajra

29. Bacterial blight of rice is caused by

- a) *Agrobacterium sps*
- b) *Bacillus thuringiensis*
- c) *Erisiphe sps*
- d) *Xanthomonas oryzae*

30. Powdery mildew of peas is caused by

- a) *Agrobacterium sps*
- b) *Bacillus thuringiensis*
- c) *Erisiphe sps*
- d) *Xanthomonas oryzae*