

PSG COLLEGE OF ARTS & SCIENCE
(AUTONOMOUS)

BSc DEGREE EXAMINATIONS MAY 2024
(Sixth Semester)

Branch – ZOOLOGY

DISCIPLINE SPECIFIC ELECTIVE – II : ORNAMENTAL FISH BREEDING

Time: Three Hours

Maximum: 50 Marks

SECTION-A (5 Marks)

Answer ALL questions

ALL questions carry EQUAL marks (5 x 1 = 5)

- 1 What should be monitored and kept stable to ensure the health of fish in the tank?
(i) Water temperature (ii) Filter color
(iii) Tank decoration (iv) Room humidity
- 2 What is the purpose of using live plants in a freshwater aquarium?
(i) To provide food for fish
(ii) Solely for aesthetic purposes
(iii) To help oxygenate the water and remove toxins
(iv) To make cleaning the tank easier
- 3 Which fish is known for its bright colors, live-bearing nature, and adaptability to various water conditions?
(i) Mollies (ii) Tetras
(iii) Rasboras (iv) Danios
- 4 The primary purpose of binders in artificial fish feed is _____.
(i) To add flavor (ii) To enhance color
(iii) To improve water stability (iv) To increase nutrient content
- 5 Which hormone is commonly used in aquaculture to induce sex reversal in fish?
(i) Testosterone (ii) Estrogen
(iii) Progesterone (iv) 17 α -methyltestosterone

SECTION - B (15 Marks)

Answer ALL Questions

ALL Questions Carry EQUAL Marks (5 x 3 = 15)

- 6 a Demonstrate the setting of ornamental fish tank.
OR
b Discuss various types of filters and their effectiveness used in the aquarium.
- 7 a How aquarium water to be tested frequently and which parameters are crucial for routine testing?
OR
b Discuss the effects of temperature fluctuations on fish health and behaviour.
- 8 a Write short notes on Gold fish.
OR
b Provide an overview of livebearer fish species commonly found in freshwater aquariums.

Cont...

- 9 a Describe different culture systems used for mass culturing Artemia.
OR
b Illustrate the mass culture of infusoria.
- 10 a Identify common challenges faced during angelfish breeding and spawning.
OR
b What are the best practices for handling and packing live fish for transport?

SECTION -C (30 Marks)

Answer ALL questions

ALL questions carry EQUAL Marks (5 x 6 = 30)

- 11 a With a neat sketch explain the construction of fish tank.
OR
b "Accessories play a crucial role in enhancing the overall health of an aquarium"-
Justify the statement.
- 12 a Highlight the importance of various ornamental plants in aquarium.
OR
b Identify and explain the various factors that influence the levels of dissolved oxygen in a fish tank.
- 13 a Explore the identification of Gourami and Tetras.
OR
b Detail the brood stock management adopted in ornamental fish breeding.
- 14 a How do seasonal changes and environmental factors affect the feeding behaviour and nutritional needs of ornamental fish?
OR
b Discuss the significance of essential nutritional components required in formulating artificial feed for fish
- 15 a What are the potential health and behavioral impacts of hormonal manipulation on ornamental fishes?
OR
b Outline the causes, symptoms, prevention and treatment of white spot diseases, velvet diseases and tail and fin rot diseases in ornamental fishes.

Z-Z-Z

END