

CBSE Test Paper with solution-5

Very Answer type Questions [1 mark each]

1.State the phylum to which centipede and prawn belong. (Board 2013)

Answer: Arthropoda.

2. In which kingdom would you place an organism which is single celled, eukaryotic and photosynthetic? (Board 2013)

Answer: Protista.

3.Rewrite the scientific name correctly : (i) panthera tigris (ii) periplaneta Americana. (Board 2012., 501004)

Answer: (i) Panthera tigris (ii) Periplaneta americana.

4.Name the term which is used for the following

(i) The left and right halves of the body have the same design.

(ii) Animal tissue differentiates from the three embryonic germ layers. (Board 2012, 501005; 47023)

Answer: (i) Bilaterally symmetrical. (ii) Triploblastic.

5.Name the phylum to which Prawn and Centipede belong. (Board 2012, SC-1008; 47001, 24, 20, 20)

Answer: Arthropoda.

6. Mention the function and location of notochord.

Answer: Function—It provides a place for muscle to attach for ease of movement.

Location—runs along the back of the animal separating the nervous tissue from the gut.

7. State the phylum to which Antedon (feather star) and Asterias (Starfish) belong. (Board 2012, 501010)

Answer: Echinodermata.

8.Mention any one characteristic feature of saprophytes. (Board 2012, 47005)

Answer: They have cell wall made of tough complex sugars called chitin.

9.Which in your opinion is more basic characteristics for classifying organism - the place where they live in or the kind of cells they are made of ? (Board 2012, 501006)

Answer: The kind of cells the organisms are made of.

10. Write the name of phylum to which Hydra and Sea anemone belong.- (Board 2012, 47017)

Answer: Coelenterata.

11. Name the phylum to which Leech and Earthworm belong. (Board 2012, 47004 }

Answer: Annelida.

12. Name a division of plants which can be classified as cryptogamae. (Board 2012, 47010}

Answer: Pteridophyta / Thallophyta / Bryophyta. (Any one)

13. State the system in poriferans that helps in circulating water throughout the body to bring in food and oxygen. (Board 2012, SC-1011}

Answer: Canal System

14. Write an example of the species which belong to this phylum and lives in colonies.

Answer: Corals.

15. Name the phylum to which Octopus and Unio belong ? (Board 2012, 4700}

Answer: Mollusca.

16. In angiosperm, seeds are developed inside fruit. The seeds may have single or Double cotyledon which becomes green on germination

- (i) what will happen if the cotyledon is not green ?
- (ii) How the plants are classified on the basis of number of leaves ?
- (iii) Seeds of pine tree are found to be naked. what do you call such tree ?
- (iv) Can you identify a monocotyledon or dicotyledon from their leaves ?
- (v) What will happen if pollination doesnot take place in angiosperm ?

Ans:

- (i) Seeds do not germinate
- (ii) Cotyledon is a modified leaf of the embryo in seed-bearing plants, that emerges from a germinating seed. Main purpose of cotyledon is storage or absorption of food reserves.

The angiosperms are divided into two groups on the basis of the number of cotyledons present in the seed.

Plants with seeds having a single cotyledon are called monocotyledonous or monocots. Plants with seeds having two cotyledons are called dicots

(iii) Gymnosperms

(iv) yes, If the leaves have parallel venations that are long and thin, then the plant is monocot. If the leaves have a branched venation, then the plant is a dicot.

(v) If pollination does not take place in angiosperms, no seeds and fruits are produced by the plants because fruit development is triggered by pollination and seeds are produced through fertilisation which only happens if pollination takes place.

17.(a) Write any four feature that all chordates possess

(b) Differentiate b/w aves and mammals any three points

Ans:

(a) chordates possess the following features:

- (i) have a notochord
- (ii) have a dorsal nerve cord
- (iii) are triploblastic
- (iv) have paired gill pouches
- (v) are coelomate.

(b) Aves group

Most birds have feathers and they possess a beak. They lay eggs, hence are oviparous.

Mammalian group

They do not have feathers and a beak is also not present. Some of them lay eggs and some give birth to young hence they are both viviparous and oviparous

18. Prove that *Labeo rohita* (rohu) is a chordate.

Ans Presence of the following four characters proves that *Labeo* (Rohita) is a chordate:

- (a) Notochord: A solid notochord is present on the dorsal side between the nerve cord and the alimentary canal.
- (b) Dorsal hollow nerve cord: A hollow nerve cord lies dorsal to the notochord.
- (c) Pharyngeal slits: A series of paired narrow openings called the gill slits are present on the lateral side of the pharynx.
- (d) Tail: It is present in the postanal part of the body.

19. (a) State two characteristic features of Annelida

(b) Identify on the basis of following features:

- (i) Organism without well defined nucleus and organelles
- (ii) Heterotrophic eukaryotic organism
- (iii) Multicellular eukaryotic organism without cell wall

Ans: (a) bilaterally symmetrical, triploblastic and have a true body cavity.

(b) (i) prokaryote [Monera] (ii) fungi, yeast (iii) Animalia [man]

20.(a) Define the following terms:

(i) Lichens (ii) Cryptogamae (iii) Phanerogams

(b) Why whales are not grouped in the fishes?

(c) What is bilateral symmetry?

Ans: (a) (i) Lichens: Some fungal species live in permanent mutually dependent relationships with blue-green algae. Such relationships are called symbiotic and the symbiotic life forms are called lichens.

(ii) Cryptogamae: The reproductive organs of the thallophytes, the bryophytes and the pteridophytes are very inconspicuous and are therefore, called 'cryptogamae'. It means the plants with 'hidden reproductive organs'.

(iii) Phanerogams: The plants with well differentiated reproductive tissues that ultimately make seeds are called 'phanerogams'.

(b) Whales can swim in water like the fishes but are not fish as they respire with lungs and have four chambered heart and mammary glands, so they are mammals.

(c) When the body of an organism can be cut into two similar halves which are mirror image of each other, only by one plane then the organism is said to have bilateral symmetry

21. (a) Give reasons for the following:

(i) Bryophytes are called amphibians of plant kingdom.

(ii) From Phylum Platyhelminthes onwards, animals are categorized as 'triploblastic'.

(iii) The presence of 'coelom' in an animal's body is considered as advantageous.

(b) What are oviparous animals?

(c) Name the phylum in which pharyngeal gill slits are present.

Ans (a) (i) Just like amphibians, bryophytes require water for fertilization as their gametes require aqueous medium for movement.

(ii) There are three layers of cells from which differentiated tissues can be made. This allows inside and outside body linings as well as some organs to be made. There is thus some degree of tissue formation.

(iii) Coelom is a true internal body cavity in which well-developed organs can be accommodated.

(b) The animals which lay eggs are known as oviparous animals.

(c) Chordata.

22. Moss is bryophytes . the feature that confirm this fact is

(a) undifferentiated plant body called thallus

(b) presence of false root rhizoid and spore bearing capsule

(c) true root ,leaves and spore baring sori

(d) naked seeds



Ans: [c]

23. In Angiospermic plant the part that develops into root is

- (a) Radicle
- (b) Node
- (c) Cotyledon
- (d) Plumule

Ans (a)

24. Broad leaves are characteristic feature of plant with:

- (a) Fibrous root system
- (b) trimerous flower
- (c) parallel venation
- (d) reticulate venation

Ans: [c]

25. Dicot plants in their seeds have

- (a) one cotyledon
- (b) one two cotyledon
- (c) Many cotyledon
- (d) No cotyledon

Ans (b)