

HALF YEARLY COMMON EXAMINATION - 2019

12 - Std

ZOOLOGY

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Time : 3 .00 hrs.

SRI VENKATESWARA GROUP OF SCHOOLS

Marks : 70

PART - I

Note : (i) Answer all the questions.

15x1=15

(ii) Choose the most suitable answer from the given four alternatives and write the option code and the corresponding answer.

- _____ is an example for repeated fission.
(a) Amoeba (b) Euglena (c) Vorticella (d) Planaria
- Assertion (A) : Ovulation is the release of ovum from the Graafian Follicle.
Reason (R) : It occurs during the follicular phase of the Menstrual Cycle.
(a) (A) and (R) are true, (R) is the correct explanation of (A).
(b) (A) and (R) are true, (R) is not the correct explanation of (A).
(c) (A) is true and (R) is false. (d) Both (A) and (R) are false.
- one of the following is a non-steroidal contraceptive?
(a) Progestasert (b) LNG - 20 (c) Saheli (d) Mala - D
- A dextral snail provides the eggs and a sinistral snail provides the sperm. The offsprings of F₁ generation are :
(a) dextral (b) sinistral
(c) 50% dextral and 50% sinistral (d) 25% dextral and 75% sinistral
- DNA is chemically more stable than RNA, because : Fl
(a) DNA is a bigger molecule than RNA. (b) DNA is a double stranded structure.
(c) DNA is having thymine. ← stability (d) RNA is not a genetic material.
- The Golden age of reptiles' was :
(a) Mesozoic era (b) Cœnozoic era (c) Paleozoic era (d) Proterozoic era
- Find out the correct pair.
i) Plague - A) Alpha virus
ii) Chikungunya - B) Gambia
iii) Dermatomycosis - C) Yersinia
iv) Malaria - D) Trichophyton
(a) (i)-(A), (ii)-(C), (iii)-(D), (iv)-(B) (b) (i)-(B), (ii)-(C), (iii)-(D), (iv)-(A)
(c) (i)-(C), (ii)-(A), (iii)-(D), (iv)-(B) (d) (i)-(B), (ii)-(A), (iii)-(C), (iv)-(D)
- _____ is a immune competent cell.
(a) WBC (b) RBC (c) Platelet (d) Epithelial cell
- Find out the true and false statements from the following :
(i) Tetracycline is a broad spectrum antibiotic.
(ii) Super bugs are strains of bacteria that are resistant to antibiotic.
(iii) Penicillin is a fungicidal antibiotic.
(iv) Streptomycin is a narrow spectrum antibiotic. broad
(a) (i)-False, (ii)-True, (iii)-False, (iv)-True (b) (i)-True, (ii)-False, (iii)-True, (iv)-False
(c) (i)-False, (ii)-False, (iii)-False, (iv)-True (d) (i)-True, (ii)-True, (iii)-False, (iv)-False
- How many amino acids are arranged in the two chains of Insulin ?
(a) Chain A has 12 and Chain B has 13 (b) Chain A has 21 and Chain B has 30
(c) Chain A has 20 and Chain B has 30 (d) Chain A has 12 and Chain B has 20
- Which one of the following is not a character of a biome ?
(a) Location, geographical position. (b) Physiochemical environment.
(c) Predominant plants only animal (d) Boundaries between biomes are not always sharply defined.
- Which one of the following is an adaptation of terrestrial animals ?
(a) Well developed tracheal system in arthropods. (b) Presence of air bladder for buoyancy.
(c) Presence of lateral line system. (d) Streamlined body.

Aquatic animal

13. The location of Columbia is :
 (a) very close to north pole of earth. (b) very close to south pole of earth.
 (c) above tropic of cancer. (d) near the equator.
14. Which one of the following is not a vision of WWF ?
 (a) To conserve nature and its resources. (b) To ensure the value of nature.
 (c) Strengthening local communities to conserve the nature.
 (d) To announce environmental abiotic factors.
15. Which one of the following is not a good method for fresh water conservation ?
 (a) Used water of our homes, can be taken to sea through closed underground pipes.
 (b) Kitchen water can be used for kitchen garden.
 (c) Instead of electric motor, we can use manual pump to take out ground water.
 (d) Instead of laying cement roads, mud road will permit the water to percolate into the ground.

PART - II

Note : Answer any six of the following questions. Question no. 24 is compulsory.

16. Mention the differences between Spermiogenesis and Spermatogenesis. 18 6 X 2 = 12
17. Mention the functions of reproductive system. 13
18. What is genophore ? - Prokaryotic DNA ; without chromatin, she are called group. 100
19. Due to heavy population in our country, everyone thrives hard to lead a comfortable life. One Darwin's concept lies in this statement. Define the concept. 107
20. How does Mutation Theory of De vries differ from Lamarck and Darwin's view in the origin of new species ? 108
21. Draw the diagram of lymph node structure and label the parts. 141
22. What is the role of cyanobacteria in a biofertilizer ? 163 IAA, IBA, NAA (AA) Pub vita
23. What is zero stress ?
24. Indian Government restricted the entry of our people into southern part of Nicobar Island. Likewise, Brazil Government restricted the entry of their people into Amazon forest. Explain the reasons for this restriction ecologically. 221

PART-III

Note : Answer any six of the following questions. Question no. 33 is compulsory. 6 X 3 = 18

25. Some organisms like honey bees are called parthenogenetic animals. Give reason. 7
26. What is the aim of POCSSO Act ? 35
27. Write short note on Haemophilia. 55
28. Draw the schematic structure of a transcription unit. 79
29. State any three goals of the Human Genome Project. 90
30. Why do you think it is not possible to produce vaccine against 'common cold' ? BB-134
31. Differentiate Immunogen from Haptens. 144
32. What is cyclosporin - A ? 159
33. Stem cell therapy can prevent death of an animal. Give your view logically. 174-175

PART-IV

Note : Answer all the questions.

5 X 5 = 25

34. (a) Explain Parturition and Lactation. 26 (OR)
 (b) Explain the given Mendelian disorders : (i) Thalassemia 57 (ii) Albinism 58
35. (a) Population explosion is one of the major problem in our Country. How barrier methods will help to control population ? Explain. (OR) 36
 (b) How Hershey and Chase provided convincing evidence that DNA is the genetic material ? Describe it. 71
36. (a) Give an account on Modern Synthetic Theory of Evolution. (OR) 108
 (b) Write any five bacterial diseases, causative agent, site of infection, mode of transmission and symptoms. 121
37. (a) What are stem cells ? Explain its role in the field of medicine. (OR) 174
 (b) Tabulate and analysis of two species population interaction. 206
38. (a) List out the various causes for biodiversity losses. (OR) 220
 (b) Write about the causes and effects of ozone layer depletion. Add a note on its control measures. 238 + 250