

QB365 Question Bank Software Study Materials

Zoology - Organisms and Populations 50 Important 1 Marks Questions With Answers (Book Back and Creative)

12th Standard

Biology

Total Marks : 50

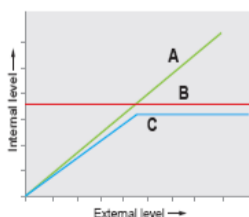
Multiple Choice Question

50 x 1 = 50

- All populations in a given physical area are defined as
(a) **Biome** (b) Ecosystem (c) Territory (d) Biotic factors
- Organisms which can survive a wide range of temperature are called
(a) Ectotherms (b) **Eurytherms** (c) Endotherms (d) Stenotherms
- The interaction in nature, where one gets benefit on the expense of other is...
(a) Predation (b) Mutualism (c) Amensalism (d) **Commensalism**
- Predation and parasitism are which type of interactions?
(a) (+,+) (b) (+, 0) (c) (--, --) (d) **(+, --)**
- Competition between species leads to
(a) **Extinction** (b) Mutation (c) Amensalism (d) Symbiosis
- Which of the following is an r-species
(a) Human (b) **Insects** (c) Rhinoceros (d) Whale
- Match the following and choose the correct combination from the options given below.

Column I	Column II
A. Mutualism	1. Lion and deer
B. Commensalism	2. Round worm and man
C. Parasitism	3. Birds compete with squirrels for nuts
D. Competition	4. Sea anemone on hermit crab
E. Predation	5. Barnacles attached to Whales.

- (a) **A- 4, B-5, C-2, D -3, E-1** (b) A- 3, B-1, C-4, D - 2, E-5 (c) A- 2, B-3, C-1, D - 5, E-4 (d) A- 5, B-4, C-2, D - 3, E-1
- The figure given below is a diagrammatic representation of response of organisms to abiotic factors. What do A, B and C represent respectively.



(a)

A	B	C
Conformer	Regulator	Partial Regulator

(b)

A	B	C
Regulator	Partial Regulator	Conformer

(c)

A	B	C
Partial Regulator	Regulator	Conformer

(d)

A	B	C
Regulator	Conformer	Partial Regulator

- The relationship between sucker fish and shark is _____

(a) Competition (b) **Commensalism** (c) Predation (d) Parasitism.

10) Which of the following is correct for r-selected species

- (a) **Large number of progeny with small size** (b) large number of progeny with large size
(c) small number of progeny with small size (d) small number of progeny with large size

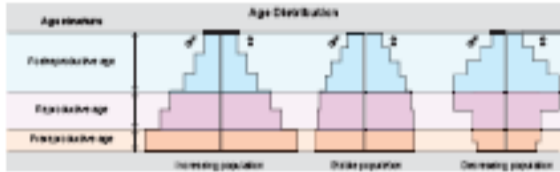
11) Animals that can move from fresh water to sea called as_____

- (a) Stenothermal (b) Eurythermal (c) **Catadromous** (d) Anadromous

12) Some organisms are able to maintain homeostasis by physical means _____

- (a) Conform (b) **Regulate** (c) Migrate (d) Suspend.

13) What type of human population is represented by the following age pyramid?



- (a) Vanishing population (b) **Stable population** (c) Declining population (d) Expanding population

14) Van't Hoff's rule describes the impact of _____ on the environment.

- (a) Light (b) **Temperature** (c) Water (d) Soil

15) "Birds and mammals attain greater body size in colder regions than warmer regions." - Choose the correct option.

- (a) **Bergmann's rule** (b) Jordan's rule (c) Sewall wright effect (d) Allen's rule

16) Type of response in hibernation and aestivation.

- (a) **Suspend** (b) Regulate (c) Migrate (d) Conform

17) 1000 fish in the volume of water in the pond indicates _____

- (a) Relative abundance (b) **Ecological density** (c) Crude density (d) Population density

18) Diapause is a type of response classified under _____

- (a) **Suspend** (b) Migrate (c) Conform (d) Regulate

19) People who have migrated from the plains to an area adjoining Rohtang Pass about six months back

- (a) **Have more RBC's and their haemoglobin has a lower binding affinity to O₂**
(b) Are not physically fit to play games like football
(c) Suffer from altitude sickness with symptoms like nausea, fatigue, etc.
(d) Have the usual RBC count but then haemoglobin has very high binding affinity to O₂.

20) A biologist studies the population of rats in a barn. He found that the average natality was 250, average mortality is 240, immigration is 20 and emigration to be 30. The in population is

- (a) 10 (b) 15 (c) 05 (d) **Zero**

21) Gause's principle of competitive exclusion states that:

- (a) More abundant species will exclude the less abundant species through competition
(b) Competition for the same resources excludes species having different food preferences
(c) **No two species can occupy the same niche indefinitely for the same limiting resources**
(d) Larger organisms exclude smaller ones through competition

22) When does the growth rate of a population following the logistic model equal zero? The logistic model is given as $dN/dt=rN(1-N/K)$:

- (a) **When N/K is exactly one** (b) When N nears the carrying capacity of the habitat (c) When N/K equals zero
 (d) When death rate is greater than birth rate
- 23) Identify the proper sequence in increasing order of population
 (a) **Species → Population → Community → biome** (b) Population → Community → Species → biome
 (c) Biome → Species → Community → Population (d) Community → Population → Biome → Species
- 24) Pick out the eurythermal organism
 (a) Fish (b) Frog (c) **Tiger** (d) Lizards
- 25) Locomotory speed of an organism changes due to light. This phenomenon is referred as _____
 (a) Photonasty (b) **Photokinesis** (c) Phototropism (d) Phototaxis
- 26) Identify the incorrect statement
 (a) Water is a universal solvent (b) **Water has less surface tension** (c) Water is heavier than air
 (d) When freezes water contracts
- 27) Assertion (A): Diapause is carried out to overcome abiotic stress.
 Reason (R): Animals become inactive during winter.
 (a) **Both A and R are correct R explain A** (b) A is correct R is incorrect (c) R does not explain A
 (d) Both A and R are incorrect
- 28) Assertion (A): Movement of organism from one place to another and back is called migration.
 Reason (R): Eel is an example for anadromous migration.
 (a) **Both A and R are correct R explain A** (b) A is correct R is incorrect (c) R does not explain A
 (d) Both A and R are incorrect
- 29) Which is not a feature of Tundra?
 (a) Large population oscillation (b) Short season of growth and reproduction (c) Low biotic diversity
 (d) **Extremely hot climate**
- 30) As altitude increases _____
 (a) O₂ density increases (b) **Precipitation decreases** (c) Temperature increases (d) Snowing decreases
- 31) Genetic engineering has been successfully used for producing
 (a) **Transgenic mice for testing safety of polio vaccine before used in humans.**
 (b) Transgenic models for studying new treatments for certain cardiac diseases
 (c) Transgenic cow Rosie which produces high fat milk for making ghee
 (d) Animals like bulls for farm work as they have super power.
- 32) There is a restriction endonuclease called EcoRI. What does 'co' part in it stand for?
 (a) Coelem (b) Coenzyme (c) **Coli** (d) Colon
- 33) For transformation, microparticles coated with DNA to be bombarded with gene gun are made up of
 (a) silver or platinum (b) platinum or zinc (c) silicon or platinum (d) **Gold or tungsten**
- 34) Which body of the government of India regulates GM research and safety of introducing GM organism for public services?
 (a) Bio-safety committee (b) Indian council of agricultural research (c) **Genetic engineering approval committee**
 (d) Research committee on Genetic manipulation
- 35) Animals that can tolerate wide range of salinity are called

- (a) Stenohaline **(b) Euryhaline** (c) Anadromous (d) Catadromous
- 36) Carrying capacity of environment is determined by
 (a) Birth rate (b) Death rate **(c) Limiting resources** (d) Population growth
- 37) Antelopes are
(a) Herbivorous (b) Fungivorous (c) carnivorous (d) omnivorous
- 38) Select the statement which explains best parasitism:
 (a) One organism is benefited. (b) Both the organisms are benefited.
 (c) One organism is benefited, the other is not affected. **(d) One organism is benefited the other is affected**
- 39) Which is the stenotherms from the following?
 (a) Dog (b) Tiger (c) Human **(d) Lizard**
- 40) Large woody vines are more commonly found in:
 (a) Temperate forest (b) Mangroves **(c) Tropical rainforests** (d) Alpine forests
- 41) Animals that can tolerate a narrow range of salinity are
(a) Stenohaline (b) Euryhaline (c) Anadromous (d) Catadromous
- 42) Soil particles determines its
(a) Texture (b) Field capacity (c) Water holding capacity (d) Soil flora
- 43) Soil best suited for plant growth is
 (a) Clay **(b) Loam** (c) Sandy (d) Gravel
- 44) Which is the correct order of ecological hierarchy?
 (a) Biome → Populations → Community → Organism (b) Organism → Biome → Population → Community
 (c) Population → Community → Biome → Organism **(d) Organism → Population → Community → Biome**
- 45) Find odd one w.r.t. population
(a) Natality (b) Death rate (c) Age pyramid (d) Births
- 46) Select the incorrect match w.r.t. interspecific interaction
(a) + + Commensalism (b) + + Mutualism (c) + - Parasitism (d) + - Predation
- 47) Altitude sickness is managed by the body by
(a) Decreasing RBC production (b) Increasing fat oxidation (c) Decreasing binding capacity of hemoglobin
 (d) Decreasing breathing rate
- 48) The study dealing with animal behaviour is called as
 (a) Euthenics **(b) Ethology** (c) Ecology (d) Pedogenesis
- 49) The soil zone is known as _____
(a) Pedosphere (b) Atmosphere (c) Hydrosphere (d) Stratosphere
- 50) Which one of the following is most appropriately defined?
 (a) (a) Host is an organism which provides food to another organism.
 (b) (b) Amensalism is a relationship in which one species is benefited whereas the other is unaffected.
(c) (c) Predator is an organism that catches and kills other organism for food.
 (d) (d) Parasite is an organism which always lives inside the body of other organism and may kill it.