Animal Kingdom

Que.1. "Cniderians perform alternation of generation",read the statement and answer the following questions. [Marks :(2)]			
a) Name the another term for Alternation of generation?			
b) Which are the two ba	asic body forms of	cnideria?	
Ans. a)Metagenesis.			
b) Polyp and Medusa.			
Que.2. a.Define biolum	iniscence?		[Marks :(2)]
b.Name the phylum in	which this phenon	nenon occurs	
Ans. a. The property of a	living orgasnism to	emit light	
b.cnidaria			
Que.3. Match the column A with column B and column C [Marks			[Marks :(2)]
Α	В	С	
Porifera	Spongilla	Tapeworm	
Platyhelminthes	Ancylostoma	Earthworm	
Aschelminthes	Pheretima	Hookworm	
Annelida	Taenia	Fresh water sponge	
Ans. Arrange columns B	s or C according to A	Α.	
A	В	С	
Porifera	Spongilla	Fresh water sponge	
Platyhelminthes	Taenia	Tapeworm	
Aschelminthes	Ancylostoma	Hookworm	
Annelida	Pheretima	Earthworm	
Que.4. Identify the phylum from the given indicators and give one example ? [Marks :(2)]			
Second largest animal phylum			
Presence of calcareous shell			
Unsegmented body			
Ans. phylum mollusca.			

example : Pila,octopus etc.

Que.5. Identify the organism from the following indicators

wormlike

body cylindrical and composed of proboscis , collar and trunk

excretory organ is proboscis gland

Ans. balanoglossus

Que.6. "All vertebrates are chordates, but all chordates are not vertebrates " substantiate the statement ? [Marks :(2)]

Ans. The members of subphylum vertebrata possess notochord during the embryonic period . The notochord is replaced by a cartilaginous or bony vertebral coloumn in the adult , thus

Que.7. Differentiate the given pair of words

[Marks :(2)]

a)metagenesis --- Metamerism

b)Poikilothermous ---- Homoiothermous

c)Placoid Scales ---- Ctenoid Scales

Ans. a) Metagenesis-Polyps produce medusae asexually and medusae form the polyps sexually(ALTERNATION OF GENERATION), metamerism-The body surface distinctly marked out into segments or metameres

b)Poikilothermous : Lack capacity to regulate body temperature, homoio thermous capacity to maintain a constant body temperature

c)PlacoidScales: present in Chondrichthyes,

CtenoidScales : present in Osteichthyes

Que.8. Write the common names of the following Organisms? [Marks :(2)]

- 1. physalia
- 2.Euspongia
- 3.Fasciola

4.Asterias

Ans. 1. Portuguese man of war

2.Bath sponges

3.liver fluke

4.Star fish

Que.9. Note the relation in the first pair and then complete the second pair. [Marks :(1)]

a) Star fish:radial symmettry::Sycon:_____

b)Malpighian tubules:cockroach ::-----:Neries

[Marks :(2)]

Ans. a)Asymmetry b)Nephridia Que.10. The following are the characteristics of an animal group. [Marks :(2)] a) Circular and sucking mouth without jaws. b) fish like body with out scales and paired fins. 1.Name the class in which this organism belongs 2. Give two examples Ans. 1. Cyclostomata 2.Examples: Petromyzon (Lamprey) and Myxine (Hagfish). Que.11. Arrange the columns suitably [Marks :(2)] С Α В Catla Tympanum body covering Pigeon air bladder aerial mode of life Turtle **Pheumatic bones** ear Toad **Epidermal scale** buoyancy Ans. С А В Pneumatic bones aerial mode of life Pigeon Turtle Epidermal scale body covering Toad Tympanum ear Catla Air bladder buoyancy Que.12. Fill the blanks with suitable words [Marks :(3)] chondrichthyes osteichchyes scales placoid/ctenoid placoid/ctenoid present/absent operculum present/absent air bladder present/absent present/absent **Ans.** Fill the blanks with suitable words chondrichthyes osteichchyes

ctenoid

scales

placoid

operculum	absent	present	
air bladder	absent	present	
Que.13. Cartilag	enous fishes have to sv	vim constantly .Why?	[Marks :(2)]
Ans. Due to the	absence of air bladder the	y have to swim constantly to avoid sink	ing
Que.14. Name a	reptile with four chamb	ered heart	[Marks :(1)]
Ans. Crocodiles/	Alligators		
Que.15. (a).Defi	ne homoiothermous		[Marks :(2)]
(b).Give exampl	е		
Ans. (a). Homoiothermous are animals have a constant body temperature.			
(b). They can regulate their body temperature according to the changes in the environment.			
They are warm blooded. Eg : Birds & Mammals			
Que.16. "Both c	hondrichthyes and oste	ichthyes are poikilothermous"	[Marks :(2)]
(a).Define poikilothermous. (b).Name other class of poikilothermous vertebrates.			
Ans. (a) Cold blooded animals, they lack the ability to regulate their body temperature.			
(b).Amphibian /Reptilia			
Que.17. Write any three differences between osteichthyes and Chondrichthyes			

[Marks :(3)]

Ar	۱S.	

Chondrichthyes	Osteichthyes	
Cartilagenous endoskeleton	Bony endoskeleton	
Mouth ventral	Mouth terminal	
Operculum absent	Operculum present	
Placoid scales	Cycloid /ctenoid scales	
Air bladder absent	Air bladder present	
Internal fertilization	External fertilization	

Que.18. Endoskeleton of birds is fully ossified and pneumatic. How will you explain the terms which are underlined.

[Marks :(2)]

Ans. Ossified – Endoskeleton of birds is bony

Pneumatic – Bones are having air cavities

Que.19. Complete the given schematic diagram suitably

[Marks :(2)] Ans. (a).Agnatha (b).chondrycthes (c).Reptilia (d).Mammalia Que.20. (a).Identify the given organism (b).Name the phylum in which it belonges to (c).Write any two salient features of the phylum [Marks :(3)]

(b).Phylum Hemichordata

(c),Body is cylindrical and composed of proboscis ,collar and trunk.

Open circulation

Respiration through gills

Proboscis glands are the excretory organ

Que.21. How do urochordata and cephalochordata differ in possessing the notochord

[Marks :(2)]

Ans. In urochordata, notochord is present only in larval tail,

But in cephalochordates ,it extends from head to tail region

Que.22. Categorise the following animals based on the type of coelom

(Tape worm, Earth worm, Pila, Ascaris, Octopus,, Liver fluke, Ancylostoma)

Coelomates	Pseudocoelomates	Acoelomates
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[Marks :(3)]

Ans.

Coelomates	Pseudocoelomates	Acoelomates
Pila	Ancylostoma	Liver fluke
Octopus Earth worm	Ascaris	Tape worm

3 scores

Que.23. A vertebrate division is without jaws mostly ectoparasitic on fish with circular mouth.

a)Name the vertebrate division and one class under it.

b)Give two example under the class.

Ans. a)Agnatha, class cyclostomata.

b)Petromyzon(lamprey), Myxine(hagfish)

Que.24. Find out the incorrect statement from the following .Correct the statement if the underlined part has any mistake

1.Statocyst, the balancing organs are present in Phylum Aschelminthes

- 2. Parapodia in annelida help in swimming
- 3. Cnidarians exhibit metagenesis
- 4.An excretory system is absent in Arthropoda

[Marks :(3)]

[Marks :(2)]

Ans. Incorrect statements (1) & (4)

1. Statocyst , the balancing organs are present in Phylum Arthropoda.

2.An excretory system is absent in Echinodermata

Que.25. Identify the phylum in which the following organs are present

[Marks :(3)]

- a.Combplates
- b.Flame cells
- c.Choanocytes
- d.Muscular pharynx

e.Radula

f.parapodia

Ans. a. Phylum Ctenophora

b.Phylum Platyhelminthes

c.Phylum Porifera

d.Phylum Aschelminthes

e.Phylum Mollusca

f.Phylum Annelida

Que.26. Differentiate Ostia and osculam .Name the organism in which both these openings are present

[Marks :(3)]

Ans. Ostia and Osculum are present in sponges .The minute pores in the body wall through which water enters into the central cavity is Ostia.

The opening through which water goes out is called osculum

Phylum porifera possess both these openings.

Que.27. Name the phenomenon in which body of an organism externally and internally divided into metamric segments

[Marks :(1)]

Ans. Metamerism

Que.28. How will you distinguish coelomates from pseudocoelomates

[Marks :(3)]

Ans. Coelomates posses a body cavity between the body wall and gut wall which is lined by mesoderm. eg. annelids, arthropdsrified

But in pseudocoelomates ,body cavity is not lined by mesoderm, instead the mesoderm is present as scattered pouches in between the ectoderm and endoderm.

Que.29. The body of cockroach can be divided into identical left and right halves in only one plane .

a. Identify the type of symmetry in cockroach

b.Mention any other types of symmetry with example

[Marks :(3)]

Ans. a. Bilateral symmetry

b.Asymmetry -Eg.Porifera

Radial symmetry - Coelenterates /Ctenophora/Echinodermat

Que.30. Name the undifferentiated layer present in between Ectoderm and Endoderm in diploblastic animals

[Marks :(1)]

Ans. Mesoglea

Que.31. which is the largest phylum?

[Marks :(1)]

Ans. Arthropoda

Que.32. Observe the given diagram .

Label the parts marked as A,B,C and D



Ans. A) Nerve Chord

- B) Notochord
- C) Gill slits
- D)Post anal tail

Que.33. Write the flight adaptations of class Aves.

[Marks :(2)]

- Ans. i) Presence of pneumatic bones
- ii) Streamlined body
- iii) Forelimbs are modified into wings
- iv) Presence of feathers
- v) Air sacs connected to lungs supplement to respiration

Que.34. Choose the suitable terms from the box and arrange in the table properly:-

Metameres, Malpighian tubules, Compund eye, Booklungs, Parapodia, Longitudinal and Circular muscles,

Phylum Annelida	Phylum Arthropoda
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[Marks :(3)]

Ans.

Phylum Annelida	Phylum Arthropoda
Metameres	Malpighian tubules

[Marks :(2)]

Longitudinal and circular muscles	Book lungs
Parapodia	Compound eye

Que.35. Complete the following table suitably:-

[Marks :(3)]

Organ	Function	Organism
i) Combplates		Pleurobrachia
ii) Flamecells	Excretion	
iii) Radula		
iV) Parapodia		

Ans.

Organ	Function	Organism
i) Combplates	locomotion	Pleurobrachia
ii) Flamecells	Excretion	Tapeworm/planaria
iii) Radula	Rasping organ for feeding	snail/Freshwatermussel
iV) Parapodia	locomotion	Neries

Que.36. Some organisms are given below, group them according to the number of chambers of heart.

		[Marks :(3)]
Crocodile		
Calotes		
Vulture		
Dog		
Catla		
Scoliodon		
Toad		
Frog		
Two chambered	Three chambered	Four chambered

Ans.

Two chambered	Three chambered	Four chambered
Catla	Frog	Crocodile
Scoliodon	Toad	Vulture
		Calotes

Que.37. Write the any four flight adaptations of class Aves.

[Marks :(2)]

- Ans. i) Presence of pneumatic bones
- ii) Streamlined body
- iii) Forelimbs are modified into wings
- iv) Presence of feathers
- v) Air sacs connected to lungs supplement to respiration

Que.38. Choose the suitable terms from the box and arrange in the table properly:-

[Marks :(2)]

Metameres, Malpighian tubules, Compund eye, Booklungs, Parapodia, Longitudinal and Circular muscles

Phylum Annelida	Phylum Arthropoda
-	-

Ans.

Phylum Annelida	Phylum Arthropoda
Metameres	Malpighian tubules
Longitudinal and circular muscles	Book lungs
Parapodia	Compound eye