DSE 2[Animal Behaviour And Chronobiology]

Answer the following question

1. Interpretation of behavioral data in terms of human experience is called
A) anthropocentrism

B) anthropomorphism

C) teleology

D) ethology

2. Every morning a research student turns on the light in a laboratory aquarium to feed the fish. After a couple of weeks of this routine, the student noticed that the fish come to the surface to feed as soon as the lights are turned on. The behavior of the fish is a result or
A) habituation.

B) positive phototaxis

C) classical conditioning

D) imprinting

3. The behavior of young ducks following their mother is known as

A) imprinting

B) innate behavior

C) mimicry

D) habituation

4. An animal's ability to escape from a predator by using the explored knowledge of home are is an example of
A) latent learning

B) imprinting

C) mimicry

D) insight learning

5. A female ‘spotted sand piper’ court male repeatedly this behavior can be explained by the term

A) polyandry

B) sexual cannibalism

C) monogamy

D) human RBCs

6. Community suckling of young ones is found in

A) cats

B) dogs

C) lions

D) humans

7. Marsupials are naturally found in Australia. The hallmark of the marsupials is

A) ovo-Vivi parity

B) prolonged placental development

C) incomplete adaptive radiations

D) parturition before completion of embryonic development

8. in the fish species, where internal fertilization occurs, the parental care is provided by

A) both parents

B) father

C) neither

D) mother

9. During hibernation in a hibernating mammal, its body temperature would be

A) lower than normal state

B) higher than normal state

C) fluctuate between high and low points

D) same as normal state

10. Which combination of mechanism best explain cross continental migration of animals

A) orientation and navigation

B) orientation and piloting

C) navigation and piloting

D) orientation, navigations and piloting

Answers:

1. D) ethology

2. C) classical conditioning

3. A) imprinting

4. A) latent learning

5. A) polyandry

6. B) dogs

7. D) parturition before completion of embryonic development

8. B) father

9. A) lower than normal state

10. D) orientation, navigations and piloting

Answer the following question in 2-3 sentences (1.5 marks)

1.Differentiate between proximate and ultimate behaviour

2.Define sign stimulus.

3.What do you understand by code breakers . Discuss with example .

4.What are Fixed action patterns(FAPs)?

5. Define Habituation.

6.Defibe imprinting .

7.What is sexual dimorphism? Explain with example.

8.Describe Alturism

9.What is Waggle dance?

10.Define circadian rhythm.

11. What are zeitgebers?

12.What is photoperiodism?

13. What do you mean by biological clock?

14.Describe male rivalry.

15.What are sterotype behaviour?

16.Define instict.

17.What do you mean by Releasers?

Answer the following question in 75 words. (2marks)

1.What are supernatural stimulus?

2.Explain about the releasers responsible for FAP.

3.Differentiate between kinesis and taxes.

4.What is Hamiltons Rule and how it is related to Altruism.

5.Explain learned behaviour in brief .

6.What do you mean by conditioned reflex?

7.How do honey bees commuincate?

8.What are some suitable criteria for mate choice in peacocks?

9.Distinguish between intrasexual and intersexual selection.

10. What do you mean by rhythmicity?

11.What are biological clocks and where does it located?

12.What are the short term and long term rhythms?

13.What is the role of melatonin in chronobiology?

14. Define Amplitute, phase, and period.

15.What do you mean by tidal rhythms and lunar rhythms?

16.Distinguish between Photic and Non photic Zeitgebers.

Answer the following questions in 500 words (6marks)

1.Describe brief history of ethology .

2. Describe various contribution of scientist in field of ethology.

3.Discuss proximate and ultimate cause of behaviour in details.

4.Describe the pattern of behaviour in details.

5.Discuss social organisation in insects taking honeybees as example .

6.Explain reproductive behaiour in animals with examples.

7.What are biological clock and its type? Explain with suitable examples.

8.Discuss the role of hormons in circadian rhythms.

9.Discuss sexual selections in animals .

10.What do you mean by altruism? Explain in details with the help of example .

11.Explain photoperiod and discuss its role in seasonal Reproduction.

12.Elaborate sexual conflict in parental care.

13.Discuss the objective of behaviour .

14.Explain behaviour as a basis of evolution withsuitable example.

15.Short notes on: (a)Stimulus filtering

(b) Code breakers