

(30) Seat No.: \_\_\_\_\_

No. of Printed Pages : 2

Sardar Patel University  
M.Sc. ( Integrated ) Biotechnology  
Semester IV Examination 2016 (NC)  
Environmental Biology : PS04CIGB 03  
Saturday 22<sup>nd</sup> October, 2016  
10:00 am to 1:00 pm

Total Marks: 70

Note : (i) Figures to the right indicate marks.  
(ii) Draw diagrams wherever necessary.

Q I Multiple choice Questions.

[08]

1. \_\_\_\_\_ is a decomposer.  
a. Grass                      b. Cow  
c. Lion                        d. None
2. Ecosystem has \_\_\_\_\_ components.  
a. biotic                      b. abiotic  
c. both                        d. none
3. \_\_\_\_\_ is/are predator(s).  
a. Lion                        b. cow  
c. both                        d. none
4. \_\_\_\_\_ is an example of mutualism.  
a. Lion and deer            b. Algae and fungi  
c. Fox and rabbit           d. Liver fluke and sheep
5. Atmospheric moisture present as visible vapour is known as  
a. fog                         b. humidity  
c. snow                        d. hail
6. Lentic fresh water ecosystem includes  
a. pond                        b. springs  
c. river                         d. brooks
7. \_\_\_\_\_ is an example of warm blooded animal.  
a. Cow                        b. Human  
c. Pigeon                      d. All of these
8. Which of the following is a sedimentary cycle?  
a. carbon                      b. hydrological  
c. nitrogen                    d. phosphorous

[P. T. O]

**Q II Answer the following in short. (Attempt any seven)**

**[14]**

1. What is synecology?
2. What is the role of decomposers in an ecosystem?
3. Draw a flow chart for aquatic food chain.
4. What is parasitism?
5. Define natality.
6. Give an account on mesocoles.
7. Mention the characteristic features of tropical rain forest.
8. What is convergent adaptation?
9. Draw a flow chart of carbon cycle.

- QIII** a. Discuss the biotic components of an ecosystem. **[06]**  
b. Write a note on: Ecological pyramids. **[06]**

**OR**

- b. Give an account on food web with suitable examples. **[06]**

- QIV** a. What is commensalism? Explain with suitable examples. **[06]**  
b. Write a note on : Mortality **[06]**

**OR**

- b. Describe the types of survivorship curves. **[06]**

- QV** a. Mention the characteristic features of desert ecosystem. **[06]**  
b. Write a note on : Soil weathering **[06]**

**OR**

- b. Discuss the effects of water on animals in reference to hydrocoles. **[06]**

- QVI** a. Mention the adaptive characteristic features of desert animals. **[06]**  
b. Write a note on : Effect of temperature on animals **[06]**

**OR**

- b. Write a note on : Hydrological cycle. **[06]**

— X —  
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