

[75]

SARDAR PATEL UNIVERSITY
M. Sc. Integrated Biotechnology (IG-EBT) 8th Semester
Theory Examination - April 2018
PS08CIGEB2 – Environmental Management
12th April 2018 (Thursday), 2:00 to 5:00 pm

Maximum Marks: 70

Note: (1) All the Questions are compulsory. (2) Figures on the right indicate marks.

Q.1 Select the most appropriate option

1 x 8 = 8

(i) The historic Convention on Biological Diversity held in Rio de Janeiro is known as: _____

a. CITES Convention

b. The Earth Summit

c. G-16 Summit

d. MAB Programme

(ii) A taxon believed likely to move into the endangered category in the near future is categorized as _____

a. Extinct

b. Rare

c. Vulnerable

d. None of the above

(iii) Which one of the following expanded forms of the following acronyms is correct?

a. IUCN = International Union for Conservation of Nature and Natural Resources

b. UNEP = United Nations Environmental Policy

c. IPCC = International Panel for Climate Change

d. EPA = Environmental Pollution Agency

(iv) Which one of the following is not included under *in situ* conservation?

a. National Park

b. Zoological Garden

c. Wild life sanctuary

d. Biosphere reserve

(v) Nalsarovar wetland selected under the National Wetland Programme is situated in _____

a. Punjab

b. Maharashtra

c. Gujarat

d. Jammu & Kashmir

(vi) India joined the Ramsar convention in _____

a. 1971

b. 2002

c. 1982

d. 1882

(vi) The Satellite constellation NAVSTAR means

a. Navigation system Airborne ranging

b. Navigation system using timing and Ranging

c. Navigation system Airborne Radar

d. None of these

(viii) _____ allows the measurement of image object heights, either from a Single photo or from a stereo pair.

a. Differential parallax

b. Relief displacement

c. Image Parallax

d. Topographic displacement

C.P.T.O.)

Q.2. Attempt any seven of the following

2 x 7=
14

1. Explain the terms: UNEP, TRIPS, NBA, FAO
2. What is the difference between bioprospecting and biopiracy?
3. Explain the two main approaches of the first five-year plans of India for tribal development programmes.
4. Comment: Hotspots have biodiversity significance.
5. Importance of wetlands.
6. Enlist various reasons of wetland losses.
7. Define remote sensing and types of remote sensing.
8. Enlist agricultural applications through remote sensing.
9. Explain the role of mangrove in wetland management.

- Q.3. a). Explain in detail the role of CBD in biodiversity conservation. 6
b). Define biopiracy and discuss various campaigns against it. 6

OR

- b). Define biodiversity. Give different reasons for biodiversity conservation. 6

- Q.4. a). Discuss the criteria, indicators and issues of sustainable forest management. 6
b). Write a note on: NTFPs and its suitable examples 6

OR

- b). Explain in detail the forest management for biodiversity conservation 6

- Q.5. a). Enlist the types of prescribed burn method of wetland management. Discuss its site preparation & firing pattern in detail. 6

- b). Enlist various mechanical and physical methods of wetland management? 6
Explain the use of herbicides and objectives in marsh management

OR

- b). Enlist various Biological methods of wetland management and explain any one in detail. 6

- Q.6. a). How remote sensing technology began with the deployment of space satellites with emphasis on image sensing characteristics of various sensors. 6

- b). (i) Write is relief displacement, discuss its importance in photogrammetric mapping. 3
(ii) Write a note on GPS 3

OR

- b). Discuss in brief on Geographic Information System (GIS) 6

————— X —————