

RAJARATA UNIVERSITY OF SRI LANKA FACULTY OF APPLIED SCIENCES

. Bachelor of Science Honours in Applied Biology Fourth Year – Semester I Examination – July/Aug 2023

, BDC 4206 – LIMNOLOGY AND CONSERVATION OF AQUATIC RESOURCES

Time: Two (02) hours

Answer ALL questions.

1. Lake Baikal is a large temperate lake which experiences seasonal changes of environmental temperature. These temperature driven forces stimulate a process that distribute dissolved oxygen in the entire water column which facilitates the aquatic fauna to inhabit the entire lake.

Explain this phenomenon briefly and elucidate how it affects to the aquatic life.

(100 marks)

- Rotifers are a group of zooplanktons that show diurnal migratory patterns in freshwater reservoirs. When those rotifers migrate vertically in a reservoir, describe the physical, chemical and biological conditions they encounter in different layers of the reservoir throughout their migration. (100 marks)
- 3. "Attitudes of people play a major role in conserving aquatic resources in Sri Lanka".

 Analyse the above statement, considering a water body in your local area as an example.

 (100 marks)
- 4. The following pictures are of two naturally formed lakes.
 - a) Name the lake types given in figure 1 and 2.

(20 marks)

b) Identify and explain the natural process that creates the above mentioned lakes.

(50 marks)

c) Compare and contrast the morphometry and chemical properties of the given lakes.

(30 marks)

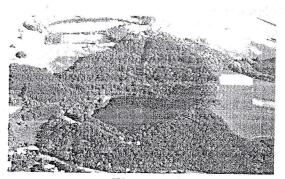


Figure 1



Figure 2