



B.Sc. DEGREE PROGRAMME – LEVEL 5  
FINAL EXAMINATION – 2016/2017  
COURSE TITLE – AQUATIC BIOLOGY  
COURSE CODE – ZLU3180 /ZOE5180  
DURATION – TWO HOURS

DATE – 03.01.2018

TIME - 9.30 am – 11.30 am

Answer any four (4) questions.

Wherever necessary, illustrate answers with clearly labeled diagrams.

1. a. Explain the physical and chemical characteristics of a lentic water habitat.  
b. Briefly describe the life zones found in a village tank found in dry zone Sri Lanka.
2. “The Kelani river, the second longest river in Sri Lanka (144.3 km) originates from central hills and drains to sea at Mattakuliya”. Compare the lotic habitats in upper reaches with those in lower reaches of the river.
3. “Kerala Deniya” is an estuarine ecosystem with mangrove forest found in the west coast of Sri Lanka. Local authority has decided to reclaim (fill) this ecosystem in order to build a housing scheme. “Haritha youth club” of the area wants to reverse this decision of the local authority considering the importance of the estuarine ecosystem.

Although the youth Club needs to write a strong letter to local authority, they do not have solid scientific facts of the ecological importance of the estuarine ecosystem.

Suppose that you as a learned citizen have been consulted by the youth club for assistance. Giving all scientific facts, explain the importance of the above mentioned ecosystem.

4. Explain the adaptations shown by pelagic organisms live in the marine ecosystem.
5. a. (i) Briefly explain the association between sun, moon and the intertidal zone.  
(ii) Discuss why the rocky shore contains a higher diversity of organisms than that of sandy and muddy shores.
6. Write short notes on any two (2) of the following:
  - a. Marine pollution
  - b. Deep sea organisms
  - c. Osmoregulators
  - d. Adaptations of mangroves