



The Open University of Sri Lanka
Faculty of Health Sciences
Bachelor of Medical Laboratory Sciences Honours (B.MLS Hons)
MDU6302-Public Health Microbiology
Academic Year 2018/2019- Semester 01
No Book Test 1

Return your question paper with the answer sheet

Date: 12.12.2018

Duration – 1 ½ hours

Time: 3.00 pm-4.30 pm

Registration No

Answer **ONLY** 4 questions out of 6 questions.
(100 marks)

Question 1

(25 marks)

- 1.1 Explain what you understand by the term 'Public Health'.
- 1.2 Briefly describe the role of 'Public Health microbiology' in public health.
- 1.3 List five (05) stakeholders in public health microbiology laboratory services in Sri Lanka.

Question 2

(25 marks)

- 2.1 List five (05) water borne infectious diseases in Sri Lanka.
- 2.1 Describe the different ways in which transmission of infective organisms can occur through this route (water borne).
- 2.3 Briefly discuss how a public health laboratory service could contribute to reducing the burden of one of the infectious diseases listed in 2.1.

Question 3

(25 marks)

- 3.1 Discuss (using examples) how the infectious dose and microbiological characteristics of the causative agents of food poisoning enable effective transmission.



Question 4

(25 marks)

- 4.1 “There is minimal information on the causes of food poisoning in Sri Lanka”.

Discuss this statement and state how the development of public health microbiology laboratory services could contribute to improving the database on infective causes of food poisoning in Sri Lanka.

Question 5

(25 marks)

- 5.1 Describe the different ways in which *Escherichia coli* can cause diarrhoeal disease, explaining why at-risk populations are different in each case.
- 5.2 State the limitations in the microbiology laboratory diagnostic services in tracing the sources of an outbreak caused by *Escherichia coli*.

Question 6

(25 marks)

- 6.1 What do you understand by the term ‘surveillance’?
- 6.2 List three (03) surveillance programmes (for microbial pathogens) carried out in Sri Lanka.
- 6.3 Discuss how microbiological surveillance of an infective disease could be useful in public health.