



MERU UNIVERSITY OF SCIENCE AND TECHNOLOGY

P.O. Box 972-60200 – Meru-Kenya.

Tel: 020-2069349, 061-2309217. 064-30320 Cell phone: +254 712524293,

+254 789151411

Fax: 064-30321

Website: www.must.ac.ke Email: info@must.ac.ke

University Examinations 2013/2014

SECOND YEAR, SECOND SEMESTER EXAMINATIONS FOR DIPLOMA IN
AGRICULTURE

BIO 0211: MICROBIOLOGY AND ZOOLOGY

DATE: APRIL 2014

TIME: 1 ½ HOURS

INSTRUCTIONS: Answer question *one* and any other *two* questions

QUESTION ONE – (30 MARKS)

- (a) Distinguish between Gram +ve and Gram –ve bacteria. (2 Marks)
- (b) Outline four characteristics of fungi. (4 Marks)
- (c) Discuss morphological adaptations of platyhelminthes to parasitic mode of life. (4 Marks)
- (d) Draw a fully labelled structure of a bacteria cell. (5 Marks)
- (e) Give five differences between prokaryotes and eukaryotes. (5 Marks)
- (f) Name any two invertebrate minor phyla. (2 Marks)
- (g) Describe four economic importance of protozoa. (4 Marks)
- (h) Explain how the thorax is modified for locomotion in insects. (4 Marks)

QUESTION TWO – (15 MARKS)

Discuss biological success of insects. (15 Marks)

QUESTION THREE – (15 MARKS)

Explain in details the economic importance of bacteria. (15 Marks)

QUESTION FOUR – (15 MARKS)

- (a) Describe the various behavioural patterns shown by animals. (10 Marks)
- (b) Name and describe various life processes exhibited by living organisms. (5 Marks)

QUESTION FIVE – (15 MARKS)

Discuss the adaptations of birds to flight. (15 Marks)