



MASENO UNIVERSITY

UNIVERSITY EXAMINATIONS 2012/2013

SECOND YEAR SECOND SEMESTER EXAMINATIONS FOR THE DEGREE OF BACHELOR OF SCIENCE IN EARTH SCIENCE WITH INFORMATION TECHNOLOGY (MAIN CAMPUS)

NGA 211: PRINCIPLES OF GEOLOGY

Date: 15th July, 2013

Time: 11.00 a.m. – 1.00 p.m.

INSTRUCTIONS:

- ♦ Answer Question ONE and any other TWO questions.
- ♦ Sketch maps and diagrams should be used whenever appropriate.

NGA 211: PRINCIPLES OF GEOLOGY

1. a) Describe the earth's internal layering. (6 marks)
b) Explain the various methods used in dating geological materials. (10 marks)
c) Define a mineral and describe rock forming minerals. (8 marks)
d) Define metamorphism and describe any three metamorphic rocks. (6 marks)
2. Explain the origin of the earth. (20 marks)
3. a) Describe the catastrophic events associated with earthquakes. (8 marks)
b) Describe how Mercalli and Richter scales are used in measuring earthquakes. (12 marks)
4. Describe mountain building processes. (20 marks)
5. Explain the linkages between structural geology and other subdivisions of geology. (20 marks)
6. Describe sedimentary rocks of economic use found in Kenya. (20 marks)