



**JARAMOGI OGINGA ODINGA UNIVERSITY OF
SCIENCE
AND TECHNOLOGY
UNIVERSITY EXAMINATIONS 2012/2013
2ND YEAR 2ND SEMESTER EXAMINATION FOR THE
DEGREE OF BACHELOR OF EDUCATION ARTS WITH
IT (SCHOOL BASED BONDO)**

COURSE CODE: NGE 202

TITLE: CLIMATOLOGY

DATE: 29/4/2013

TIME: 9.000-11.00AM

DURATION: 2 HOURS

INSTRUCTIONS

- 1. This paper contains FIVE (5) questions**
- 2. Answer question 1 (Compulsory) and ANY other 2 Questions**
- 3. Write all answers in the booklet provided**

1. a) Examine the salient features of the troposphere (10 marks)
b) Discuss the formation of raindrops in cold clouds (10 marks)
c) Explain the mechanisms for heat transfer in the atmosphere (10 marks)
2. Examine the factors which influence the temperature change on planet Earth (20 marks)
3. Discuss the impact of ultra-violet (UV) radiation to the lower atmosphere (20 marks)
4. Write explanatory notes on the following:
 - i) Absolute humidity (5 marks)
 - ii) Water vapour (5 marks)
 - iii) Greenhouse effect (5 marks)
 - iv) Stratospheric ozone (5 marks)
5. Examine the atmospheric processes that lead to depletion of solar radiation. (20 Marks)