



**MASENO UNIVERSITY**  
**UNIVERSITY EXAMINATIONS 2015/2016**

**FOURTH YEAR FIRST SEMESTER EXAMINATIONS FOR THE  
DEGREE OF BACHELOR OF SCIENCE IN CLIMATE CHANGE  
AND DEVELOPMENT WITH INFORMATION TECHNOLOGY**

**MAIN CAMPUS**

**NCA 412: FORESTRY AND AGROFORESTRY  
MANAGEMENT**

Date: 14<sup>th</sup> January, 2016

Time: 2.30 - 4.30 pm

**INSTRUCTIONS:**

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



1. a. Explain how the following terms are used in forestry management:

i. Forest dendrology (5marks)

ii. Sustainable yield (5marks)

b. Describe how agro forestry can be use in soil protection (10marks)

c. Giving specific examples, explain agro forestry and forestry practices in Kenya (10marks)

2. Discuss the legal basis in development and management of agro forestry in Kenya (20marks)

3. Discuss ways in which forests respond to effects of climate change (20marks)

4. Explain the climate change risks associated with

a. Forest pests and pathogens (8marks)

b. Forest fires (6marks)

c. Agroforestry (6marks)

5. Discuss ways in which IPPC employs to influence farmers to adopt agro forestry as a measure to mitigate and adapt to the effects of climate change (20marks)

6. Discuss the significance of forestry and Agroforestry practices/ management to climate change mitigation and adaptation (20mark)