



National Open University of Nigeria
Plot 91, Cadastral Zone, Nnamdi Azikiwe Expressway, Jabi - Abuja
Faculty of Science
2021_2 EXAMINATIONS

COURSE CODE: EMT311

COURSE TITLE: Remote Sensing and Mapping Techniques

CREDIT: 3 Units

TIME ALLOWED: 2 Hours: 30 minutes

Instruction: Attempt question number ONE (1) and any other FOUR (4) questions. Question number one (1) carries 22 marks, while the other questions carry (12) marks each.

- 1a) Outline the basic kinds of information on geographic features that is portrayed in a map
(3marks)
- 1b) Expatriate on the application of remote sensing in forestry
(9marks)
- 1c) Highlight the processes involved in electromagnetic remote sensing according to Lillisand and Kiefer (1999)
(10marks)
- 2a) With the aid of a diagram describe a compass rose
(4marks)
- 2b) Attempt a surmise of the value of forests as a resource in line with the need for its protection
(8marks)
- 3) Discuss the assertion that a map is a model of reality
(12 marks)
- 4a) Explain how convolution is applied in ERDAS IMAGINE
(4marks)
- 4b) Describe what classification entails in map analysis
(8marks)
- 5a) List the four major aspects a map covers that cuts across all definitions
(4marks)
- 5b) Discuss how the knowledge of remote sensing can be useful in landuse/landcover analysis
(8marks)
- 6) Discuss the following;
(12marks)
- Principal Component Analysis (3marks)
- Globe (3marks)
- Topographic Map (6marks)