

UNIVERSITY OF SWAZILAND FINAL EXAMINATION PAPER

PROGRAMME:

BSC AGRIC. 5 (LWM)

COURSE CODE:

LUM 503 (Old programme)

TITLE OF PAPER: WATERSHED MANAGEMENT

TIME ALLOWED: TWO (2) HOURS

SPECIAL MATERIAL REQUIRED: NONE

INSTRUCTIONS: ANSWER QUESTION ONE AND ANY TWO OTHER QUESTIONS.

DO NOT OPEN THIS PAPER UNTIL PERMISSION HAS BEEN GRANTED BY THE CHIEF INVIGILATOR

SECTION A. COMPULSORY QUESTION

QUESTION 1

a. Outline the challenges discouraging effective implementation of Environmental Impact Assessments (EIAs) in Swaziland.

20 marks

b. Alien plants have both economic values and negative effects on the environment.
Discuss these factors and suggest means of how we can benefit from them and still curb the negative impacts it has on the environment.
20 marks

SECTION B. ANSWER ANY TWO QUESTIONS

QUESTION 2

a. An integrated approach is important in watershed management. Discuss the reasons why.

10 marks

b. Describe the importance of wetlands both as a water resource and as a biosphere.

20 marks

QUESTION 3

a. Veld fire is described as both disruptive and useful in watershed management. Discuss why and make suggestions how it can be used in a significant way.

20 marks

b. Explain why socio-economic factors are considered when developing watershed management programme.

10 marks

QUESTION 4

- a. Explain the following concepts;
 - i. Niche overlap
 - ii. Biodiversity

10 marks

b. Compare the erosion status of land degradation of commercial and communal land under grazing and cropping land practices. Discuss the reasons for these differences.

20 marks