

FACULTY	AGRICULTURE, ENGINEERING & NATURAL SCIENCES				
DEPARTMENT	ENVIRONMENTAL	SCIENCE			
SUBJECT	DISTURBANCE AND RESTORATION ECOLOGY				
SUBJECT CODE	EBL 3802				
DATE	OCTOBER/NOVEMBER 2021				
DURATION	2 HOURS	MARKS	90		

SUPLEMETARY EXAMINATION

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Internal Moderator: Prof. I. Mapaure (University of Namibia)

External Moderator: Prof. C.T. Downs (University of KwaZulu-Natal)

This examination paper consists of three (3) pages including the cover page.

Instructions

SECTION A: answer <u>ALL</u> questions

SECTION B: choice questions (answer only <u>ONE</u> question).

UNIVERSITY OF NAMIBIA EXAMINATIONS

Section A

Answer <u>all</u> questions in this section. This section is worth 60 marks.

- 1. As an ecology student, briefly discuss the relevance of disturbance and restoration ecology and point out the linkage between the two terms (disturbance and restoration). (4)
- 2. Why is it desirable to use local plant materials to revegetate as a restoration effort? (4)

3. Study the two communities (A and B) below and answer the following question.

Community A	Community B	
High species diversity	Low species diversity	

Which community is more stable? Explain your choice! (5)

- 4. Distinguish between the insurance effect and the averaging effect. (4)
- 5. Distinguish between the two modes of ecosystem recovery (4)
- 6. Outline any eight attributes of a restored ecosystem. (8)
- 7. Briefly discuss the disturbance hypothesis in relation to ecosystem stability. (6)
- 8. Briefly describe the characteristics of a disturbance. (10)
- 9. Discuss the use of the Natural Disturbance Regime (NDR) and the challenges it faces. (15)

SE	CT	Oľ	N	B

Answer only one question from this section. This section is worth 30 marks.

Question 1

Discuss herbivory as a disturbance in an ecosystem. Clearly highlighting the important aspects of herbivory and not limited to: the categories of herbivory and the plants' defensive mechanisms for herbivory. (30)

OR

Question 2

Discuss any six guiding principles in restoration ecology. (30)

END OF EXAMINATION