



1ST SEM. 2020/2021

UNIVERSITY OF ESWATINI

RESIT/SUPPLEMENTARY EXAMINATION PAPER

PROGRAMME: BSc. IN ANIMAL SCIENCE YEAR IV
BSc. IN AGRICULTURAL EDUCATION YEAR IV
BSc IN AGRICULTURAL EXTENSION YEAR IV
BSc IN AGRICULTURAL BIOSYSTEMS & ENGINEERING
YEAR IV

COURSE CODE: ASC403/AS 404

TITLE OF PAPER: FISH FARMING

TIME ALLOWED: TWO (2) HOURS

INSTRUCTIONS: ANSWER ANY FOUR (4) QUESTIONS

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

Question 1

Make a sketch drawing of an integrated aquaculture system and then discuss how one part benefits from the other parts.

(25 Marks)

Question 2

Write an essay under the heading "Pond construction and pond preparation" **(25 Marks)**

Question 3

- a) Sex reversal is a commonly used technique in aquaculture. As a student who has learnt about fish reproduction, you have also learnt that in the early stage of the fish development, the fish has not yet differentiated into male or female. Explain to your neighbour who wishes to produce and supply fingerlings to farmers how you could do a sex reversal to either male or female fish in his aquaculture production **(12 Marks)**
- b) Explain how one could carry on with the technique of induced breeding in fish. **(13 Marks)**

Question 4

- (a) How do you do fish stocking in a fish pond with fingerling **(10 marks)**
- (b) List the things you will need when transporting fingerlings from a hatchery to your site of production, explain their use. **(5 Marks)**
- (c) Why do you need to buy fingerlings from a good source of hatchery, explain the characteristics of a good fish hatchery **(5 Marks)**
- (d) Why is it important to stock fingerlings soon after pond preparation? **(5 Marks)**

Question 5

Fish processing is normally determined by market preferences.

Discuss any five techniques of fish processing.

(25 marks)