



UNIVERSITY OF SWAZILAND

FINAL EXAMINATION PAPER

2nd SEMESTER 2008/2009

PROGRAMME : **BSc. AG. ECON. & AGBMGT YR2**
BSc. AGRIC. EDUCATION YR2
BSc. AGRONOMY YR2
BSc. ANIMAL SCIENCE YR2
BSc. HORTICULTURE YR2
BSc. LAND & WATER MGMNT YR2

COURSE CODE : **AEM 205**

TITLE OF PAPER : **FARM MANAGEMENT**

TIME ALLOWED : **TWO (2) HOURS**

INSTRUCTIONS : **ANSWER ALL QUESTIONS. EACH QUESTION CARRIES A TOTAL OF 25 MARKS**

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QUESTION 1

Farmer Mr Dlamini applies different levels of fertilizer to his maize field and achieves corresponding yields, as shown below. Assume a unit cost of fertilizer is E24 per kg and a unit price of maize is E4 per kg.

Fertilizer (kg):	0	1	2	3	4	5	6	7	8	9	10
Maize yield (kg):	0	24	60	88	108	124	136	144	148	144	136

- (a) How much of maize should Mr Dlamini produce in order to maximize his profit? Approach this problem from the marginal revenue and marginal cost concepts. **[15 Marks]**
- (b) Mr Dlamini insists to continue applying fertilizer till an output of 148 kg of maize is achieved even though he is following the profit-maximising goal. From the point of view of “profit-maximizing input level”, would you encourage Mr Dlamini to stick to his decision? Justify your answer. **[10 Marks]**

QUESTION 2

With the aid of a diagram, describe the key management functions, giving a clear indication how these functions are interlinked. **[25 marks]**

QUESTION 3

- (a) What is the difference between a cashflow budget and an enterprise budget? **[10 marks]**
- (b) Discuss the sources of risk that any farm business is likely to incur. **[10 marks]**
- (c) Differentiate between complementary and supplementary products. **[5 marks]**

QUESTION 4

Assume you have been planning a cropping programme for next year and that you can grow maize or sunflower with the existing equipment on the farm. After checking all available price information, you predict that sunflower prices will be more favourable than maize prices in the next production season. Consequently, you consider reducing maize by 100 hectares and produce sunflower on the same 100 hectares. Your enterprise budget was able to provide you with the following information:

- Maize yield from 100 ha is 100 tons.
- Maize producer price is E2.80 per ton.
- Seed, fertilizer, lime, herbicide and fuel = E130 per ha
- Labour requirements for maize production is 3 hours per ha and must be hired at E5.00 per hour.
- Sunflower yield from 100 ha is 35 tons
- Sunflower producer price is E7.00 per ton
- Seed, fertilizer, lime, herbicide and fuel = E75 per ha
- Labour requirements for sunflower is 2.5 hours per ha and must be hired at E5.00 per hour.

- (a) Should the change be adopted or not? Justify your answer. **[15 marks]**
- (b) What other factors would you consider in making your final decision?
[5 marks]
- (c) Should the economic principles for determining profit-maximising input levels be applied before or after completing an enterprise budget? Why? **[5 marks]**