

WARNING

This Question Paper MUST be returned with your answer book(s) at the end of the examination,
otherwise marks will be lost.

Write your Examination Number here ⇒



Coimisiún na Scrúduithe Stáit State Examinations Commission

LEAVING CERTIFICATE EXAMINATION, 2010

WEDNESDAY, 23 JUNE 2010, MORNING 9.30-12.00

AGRICULTURAL ECONOMICS – HIGHER LEVEL (320 Marks)

Answer **fifteen** questions from Part I and **four** questions from Part II. You should not spend more than one hour on Part I.

PART I (120 marks)

Answer **fifteen** questions.

Write the answers in the spaces provided.

All questions carry equal marks.

PART II (200 marks)

Answer **four** questions.

Write the answers in your answer book(s).

All questions carry equal marks (50 marks).

Do **not** write answers to Part II on this question paper.

**REMEMBER TO RETURN THIS QUESTION PAPER WITH THE ANSWER BOOK(S)
USED TO ANSWER THE QUESTIONS IN PART II.**

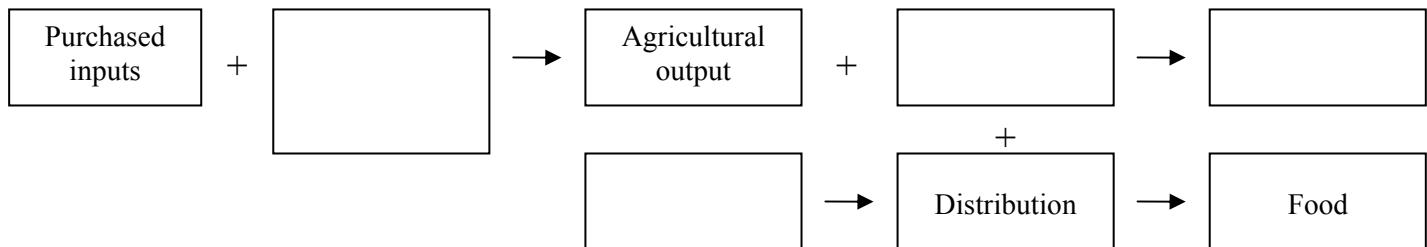
PART I (120 marks)

Answer fifteen questions.

Write the answers in the spaces provided.

All questions carry equal marks.

1. In the spaces provided, complete the following food chain:



2. Economics is the science of the allocation of _____ resources. On the _____ market, demand for resources from firms interacts with the supply of resources from _____ to determine the prices of the factors of production.

3. Outline **two** possible economic implications of levying a carbon tax on fossil fuels for Irish farmers:

- (i) _____
(ii) _____

4. Gross Domestic Product (GDP) is a measure of _____

5. State **two** variables, **other than price**, that affect the quantity demanded of an agricultural product:

- (i) _____
(ii) _____

6. The National Farm Survey reported a 13.7% decline in farm income between 2007 and 2008. State **two reasons** for this decline:

- (i) _____
(ii) _____

7. Using a **relevant example**, outline **one** economic reason for government intervention in agriculture:

8. In the spaces provided, classify the following inputs as either a **factor input** or an **intermediate input**:

Input	Classification	Input	Classification
Feed		Labour	
Buildings		Fuel and oil	

9. State **two characteristics** of Irish agriculture which can limit marketing efficiency:

- (i) _____
(ii) _____

10. In the space provided, state the formula used for calculating the **present value (PV)** of €20,000 receivable in 7 years time, at a discount rate of 5% (use the figures provided).

Present Value (PV) =

11. Explain the term ‘import substitution’, **using an example** from the Irish food industry:

12. State **two precautions** a farmer can take to minimise uncertainty regarding his or her future income:

- (i) _____
(ii) _____

13. The cross price elasticity of supply for joint products is positive. Explain this statement:

14. In the theory of production, distinguish between the average product and the marginal product:

Average product: _____

Marginal product: _____

15. State **two characteristics** of a perfectly competitive market:

- (i) _____
(ii) _____

16. The ratio of debt to net worth for a farm in 2009 was 0.18. This means that _____

17. Identify **two** items of information a bank may request a farmer to provide before granting a loan:

- (i) _____
(ii) _____

18. Explain the term ‘adjusted farm area’ as a measure for the quantity of land:

19. State **two** economic advantages of farmers deciding to farm jointly (e.g. dairy partnership agreements):

- (i) _____
(ii) _____

20. Outline **two objectives** of the CAP, as first outlined under Article 39 of the Treaty of Rome:

- (i) _____
(ii) _____

**Remember to return this question paper with the answer book(s) used to answer
the questions in Part II.**

Part II (200 Marks)

Answer **four** questions.

Write the answers to this part in the answer book.

All questions carry equal marks (50 Marks).

Do **not** write answers to Part II on this question paper.

1. (a) Using the example of a tillage farm, distinguish between *agricultural output* and *agricultural production*.
(b) Table 1 provides data on farm income and expenditure in Ireland.

Table 1: farm income and expenditure figures in Ireland	
	€ millions
Gross Agricultural Output	5,875
Materials and Services	4,506
Levies	87
Salaries and Wages	452
Direct Payments	1,895
Depreciation	768
Interest Payments	542

Using the data in Table 1, calculate the following (**show all your workings**):

- (i) Gross Agricultural Product at Market Prices;
(ii) Gross Agricultural Product at Factor Cost;
(iii) Net Agricultural Product at Factor Cost;
(iv) Family Farm Income of the National Farm.

(c) When comparing the incomes of farmers and of other groups in society, discuss the difficulties that arise in constructing an accurate measure of farm income.

[50 marks]

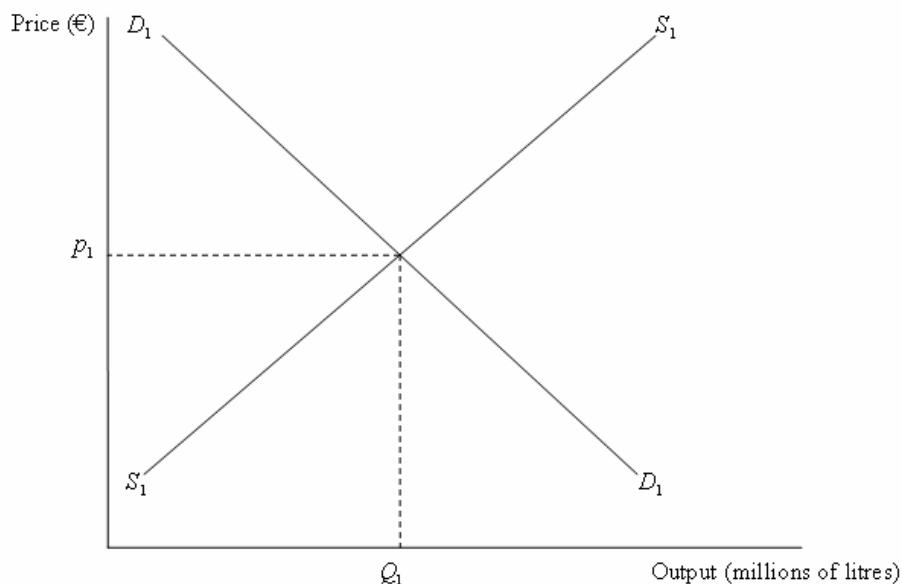
2. Distinguish between the items in **each** of the following pairs with reference to Irish agriculture:

- (a) Whole farm accounts and enterprise cost accounts;
(b) Fixed cost and opportunity cost;
(c) Term-loan and leasing;
(d) Partial budget and capital budget.

[50 marks]

3. Figure 1 below represents the Irish dairy market, with D_1D_1 representing market demand and S_1S_1 representing market supply.

Figure 1: The Irish dairy market



- (a) Copy figure 1 into your answer book and,
 - (i) Calculate the total revenue generated when the market is at equilibrium, assuming that P_1 has a value of 34 cent and Q_1 has a value of 5,500 million litres.
 - (ii) Show on the diagram you have drawn the impact a significant increase in fertilizer costs will have on the equilibrium price and quantity of milk. Explain your answer.
- (b) Copy figure 1 again into your answer book and,
 - (i) Assuming that the EU sets a price ceiling for milk above the **original** equilibrium price, show on the diagram you have drawn what will happen in the market. Explain your answer.
 - (ii) Outline using an example, how the EU could address this problem.

[50 marks]

4. “Environmental protection is an increasingly important element of modern agricultural policy, which must now take on board a range of international commitments, EU Directives and national legislation concerning the environment.”

(Source: Department of Agriculture, Fisheries and Food, “Annual Review and Outlook for Agriculture, Fisheries, and Food 2008-09”, p.g. 75)

Explain how **each** of the following developments contributes to environmental protection:

- (a) Single Farm Payment (SFP) and Cross Compliance;
- (b) The Rural Environmental Protection Scheme (REPS);
- (c) The Nitrates Directive.

[50 marks]

5. The market price of wheat and the quantity of wheat produced at each price is given in Table 2.

Table 2: Supply schedule for wheat	
Price of wheat € per tonne	Quantity of wheat produced tonne per year ('000)
90	120
100	150
110	190
120	210
130	210

- (a) Using the data given in **Table 2**:
- (i) Draw a supply curve for wheat;
 - (ii) Calculate the price elasticity of supply for wheat as the price changes from €100 to €110 per tonne;
 - (iii) Is the result obtained in (ii) above elastic or inelastic? Explain your answer.
- (b) Using an agricultural example, explain how the price elasticity of supply for a product may vary according to:
- (i) Closeness of competing enterprises on the farm;
OR
 - (ii) Length of time over which supply is allowed to adjust on the farm.

[50 marks]

6. (a) Explain why ‘resource mobility’ is an important economic issue.
- (b) With reference to current trends in Irish agriculture, outline the factors that affect **each** of the following:
- (i) Mobility of labour in agriculture;
 - (ii) Mobility of land in agriculture;
 - (iii) Mobility of capital in agriculture.

[50 marks]

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