

SECTION 3 (80 marks)
Answer **ONE** question

8. Marginal Costing

Ivor Ltd produces a single product. The company's profit and loss account for the year ended 31/12/2010, during which 90,000 units were produced and sold, was as follows:

	€	€
Sales (90,000 units)		1,170,000
Materials	390,000	
Direct labour	236,000	
Factory overheads	82,000	
Selling expenses	105,000	
Administration expenses	<u>130,000</u>	<u>(943,000)</u>
Net profit		<u>227,000</u>

The materials, direct labour and 40% of the factory overheads are variable costs. Apart from sales commission of 5% on sales, selling and administration expenses are fixed.

You are required to calculate:

- (a) The company's break-even point and margin of safety.
- (b) The number of units that must be sold in 2011 if the company is to increase its net profit by 20% over the 2010 figure, assuming the selling price and cost levels and percentages remain unchanged.
- (c) The profit the company would make in 2011 if it reduced its selling price to €11, increased fixed costs by €15,000 and thereby increased the number of units sold to 110,000, with all other cost levels and percentages remaining unchanged.
- (d) The selling price the company must charge per unit in 2011, if fixed costs increase by 12% but the volume of sales and profit remains the same.
- (e) The number of units that must be sold at €16 per unit to provide a profit of 10% of the sales revenue received from these same units.
- (f) (i) List and explain **two** limitations/assumptions of marginal costing.
(ii) Explain what is meant by a step fixed cost.

Roughly sketch a graph of step fixed costs using the following rental payments:

Rent €	€5,000	€12,000	€19,000	€28,000
Output (units)	20,000	30,000	40,000	50,000

(80 marks)