

**OLLSCOIL NA hÉIREANN, GAILLIMH
NATIONAL UNIVERSITY OF IRELAND, GALWAY**

AUTUMN EXAMINATION, 2002

**BACHELOR OF COMMERCE – FIRST YEAR
BACHELOR OF COMMERCE WITH LANGUAGE – FIRST YEAR
BACHELOR OF INFORMATION TECHNOLOGY – FIRST YEAR
BACHELOR OF CORPORATE LAW – FIRST YEAR**

ACCOUNTING (AY102)

**Professor N. Garrod
Professor J. F. Collins
Mr. K. Warnock
Mr. F. Conaty**

INSTRUCTIONS TO CANDIDATES:

Answer TWO questions from Section A and TWO questions from Section B

Use a separate answer book for each section

All questions carry equal marks

Time allowed: THREE HOURS

SECTION A
(Answer TWO questions from this Section)

Question 1

Set out below are the balance sheets of Bergamot Limited as at 31st January 2001 and 2002, and the profit and loss account for the year ended 31st January 2002.

Balance Sheets as at 31 st December	<u>2002</u>		<u>2001</u>	
	€000	€000	€000	€000
Tangible Fixed Assets:				
Plant & Machinery		4,100		2,900
At cost		1,260		980
Accumulated depreciation		<u>2,840</u>		<u>1,920</u>
Current Assets:				
Stock	920		306	
Debtors	266		202	
Cash and bank	<u>-</u>		<u>60</u>	
	<u>1,186</u>		<u>568</u>	
Current Liabilities				
Creditors	160		173	
Taxation	800		580	
Proposed dividend	220		160	
Bank overdraft	<u>855</u>		<u>-</u>	
	<u>2,035</u>		<u>913</u>	
Net Current Liabilities		(849)		(345)
Creditors Due After More Than One Year				
10% Long term debt		(130)		(165)
		<u>1,861</u>		<u>1,410</u>
Share Capital And Reserves				
Ordinary shares of €1 each		1,310		1,110
Share premium account		300		200
Profit and loss account		<u>251</u>		<u>100</u>
		<u>1,861</u>		<u>1,410</u>

/ ... Question 1 continues on the next page ...

/ ... Question 1, continued from the previous page ...

Profit and Loss Account for the Year Ended 31st January 2002

	€000
Operating profit	1,264
Interest payable	<u>15</u>
Profit on ordinary activities before taxation	1,249
Taxation	<u>808</u>
Profit for the year	441
Dividend	<u>290</u>
Profit retained for the year	<u><u>151</u></u>

Notes:

1. During the year plant that originally cost €200,000 and that had a net book value of €80,000 was disposed of at a loss of €20,000.

Required:

- a) Prepare the Cash Flow Statement for Bergamot Ltd for the year ended 31st January 2002 in accordance with the requirements of FRS1;
(20 Marks)
- b) What are the component parts of 'Net Debt' as set out in FRS1? Your answer should clearly explain the nature of each of the components.
(5 Marks)

Total: 25 Marks

Cont'd...

Question 2

James Appleby is a glassware wholesaler. A trial balance extracted from his books on 31 December 2001 revealed the following balances:

	DR.	CR.
	€	€
Capital account		134,400
Purchases	110,800	
Sales		188,600
Premises at cost	76,800	
Motor vehicles at cost	36,000	
Accumulated depreciation on motors		9,840
Fixtures & Fittings at cost	7,800	
Accumulated depreciation - fixtures & fittings		1,320
Motor expenses	8,760	
Rates	2,760	
Balance at bank	5,040	
Wages & salaries	50,400	
Drawings	11,520	
Insurance	2,400	
Trade debtors	21,600	
Provision for doubtful debts		670
Trade creditors		18,000
Sundry expenses	19,440	
Long-term loan		24,000
Stock at 1 Jan 2001	23,100	
Cash in hand	410	
	<hr/> 376,830	<hr/> 376,830

/ ... Question 2 continues on the next page ...

/ ... Question 2, continued from the previous page ...

Notes:

The following information was available at 31 December 2001.

1. Closing stock at 31 December 2001 amounted to €26,800.
2. There were wages and salaries of €1,400 owing as at 31 December 2001.
3. There was a payment of €1,800 on 30 September 2001 to cover 12 months' insurance.
4. On reviewing debtors, it was discovered that a debt of €900 would not be recovered and that a further €1,600 was doubtful.
5. Depreciation is provided for at 25% on a reducing balance basis on motors and 10% straight-line on fixtures & fittings.
6. The long-term loan was taken out on 1st July 2001. Interest on the loan is charged at 12% per annum and has not yet been provided for.

Required:

- a) Prepare the Profit and Loss Account for James Appleby's business for the year ended 31 December 2001 and a Balance Sheet as at that date.
- b) Financial Reporting Standard 18, 'Accounting Policies' states that 'An entity should prepare its financial statements on the accruals basis of accounting'. Briefly set out your understanding of the 'accruals basis of accounting'.

(20 Marks)

(5 Marks)

Total: 25 Marks

Question 3

You have been asked by a local retailing company, Uno, to assist them in carrying out a comparative analysis with their main competitor, Dos. The comparative financial statements for the trading year just ended are set out below:

/ ... Question 3 continues on the next page ...

/ ... Question 3, continued from the previous page ...

BALANCE SHEETS		Uno	Dos
As at 31st March 2002		€000	€000
Fixed assets	Land & buildings	400	280
	Fixtures & fittings	350	200
	Vehicles	<u>60</u>	<u>70</u>
		810	550
Current assets	Stock	110	120
	Debtors	180	118
	Cash	<u>5</u>	<u>10</u>
		295	248
Current Liabilities	Creditors	140	88
	Accruals	50	36
	Overdraft	<u>18</u>	<u>12</u>
		208	136
Net Current Assets		<u>87</u>	<u>112</u>
		897	662
10% Debentures		<u>74</u>	<u>50</u>
		<u>823</u>	<u>612</u>
Capital and Reserves			
	Ordinary share capital	500	420
	Profit and loss account	<u>323</u>	<u>192</u>
		<u>823</u>	<u>612</u>

PROFIT AND LOSS ACCOUNTS		Uno	Dos
For the year ended 31st March 2002		€000	€000
Sales		600	780
Cost of Sales		<u>380</u>	<u>600</u>
Gross Profit		220	180
Distribution costs	80		60
Administration costs	<u>32</u>	<u>112</u>	<u>38</u>
Operating profit		108	82
Interest on debentures		<u>12</u>	<u>7</u>
Net profit before tax		96	75
Taxation		<u>55</u>	<u>40</u>
Net profit after tax		41	35
Dividends		<u>30</u>	<u>25</u>
Retained profit		<u>11</u>	<u>10</u>

/ ... Question 3 continues on the next page ...

/ ... Question 3, continued from the previous page ...

Required:

- a) With the use of ratio analysis, compare Uno and Dos under the headings profitability, management performance and working capital management and draft a short memorandum to the Management of Uno with any recommendations you may have to assist them in improving their management performance.

(20 Marks)

- b) Set out briefly the shortcomings or limitations of comparative financial analysis using ratio analysis.

(5 Marks)

Total: 25 Marks

Cont'd...

SECTION B
(Answer TWO questions from this Section)

Question 4

Cunningham Ltd. is about to begin manufacturing operations. On 1 July 2002, the company raised €2,800,000 in share capital and borrowed €500,000 at an interest rate of 10% per annum, with interest payable quarterly starting on 30 September. Fixed assets were purchased for €1,800,000. These will be depreciated at a rate of 15% per annum on the straight-line basis. The company has also purchased 10,000 kilograms of raw material at a cost of €25 per kilogram; these have already been paid for. During July and August 2002 wages and salaries, paid in cash, amounted to €150,000. On 1 July 2002 the company paid quarterly rent in advance of €18,000 under a five year lease agreement.

The company's product requires 3 kilograms of raw material per unit and 4 hours of direct labour. Raw material is expected to cost €25 per kilogram for the foreseeable future, and wage rates have been fixed for the next year at €20 per hour. The company will also incur variable overheads of €5 per unit of production. As with direct labour costs, variable overheads will be paid in the month in which they are incurred. Total fixed overheads of €1,600,000, excluding depreciation and rent, will be incurred in the ten months beginning 1 September 2002; these will be spread evenly over the period and payable in cash in the month in which they are incurred.

Sales are predicted to be 5,000 units in October, 8,000 units in November, 12,000 units in December, and 16,000 units per month thereafter. During September the company will manufacture 6,000 units, and from October onwards the company plans to manufacture sufficient quantities to ensure that closing stocks of finished goods at the end of each month are equal to 75% of the following month's sales. The company's policy will be to hold stocks of raw materials at the end of each month equal to 50% of the requirements for the following month. Payments to the suppliers of raw materials will be made in the month following purchase.

The sales price will be €220 per unit, and all sales will be on credit. It is expected that bad debts will be 2% of the total. Half of the total amount due from debtors will be collected in the month of sale, and the balance of collections will take place in the following month.

Required:

- (a) Calculate the opening cash position at 1 September 2002, and prepare a production, raw materials and cash budget for each of the three months September, October and November 2002; and
(18 marks)
- (b) Discuss, using examples, the way the process of budgeting may help managers to make decisions on the actions to be taken in managing the company.
(7 marks)

Total: 25 marks

Question 5

Power Solutions Ltd. is a consultancy company specialising in advising companies on business reorganisation. Power began a working relationship with McCoy Engineering Ltd. (a potential new client) in December 2001. During December 2001 and January 2002, Power incurred salary costs amounting to €45,000 for consultants engaged on an initial assessment of McCoy's business; overheads for the company are typically charged at 80% of salary costs, of which only one tenth are variable. McCoy paid €40,000 for this assessment (in March 2002), the shortfall below the full cost being acceptable to Power because of the potential profits if the initial assessment led to a full consultancy contract.

In February 2002, McCoy Engineering Ltd. hired Power Solutions Ltd. to advise on its business reorganisation at a fee of €810,000; 40% of the fee was paid as agreed on 31 July 2002, and the balance is payable on 30 November 2002. If Power withdraws from the contract after 31 July, it is entitled to retain the fees so far paid, but must pay a penalty of €150,000 to McCoy in addition to forgoing the balance payable.

From February to July inclusive, Power incurred salary costs to consultants of €325,000. Power's assistant financial controller estimates that, due to continuing rampant inflation in the salary costs of consultants and an initial underestimate of the time required to complete the job, further salary costs of €215,000 will be incurred before the end of November. He calculates that when overheads are included, the loss on the job (even before considering the initial assessment) will exceed the penalty payable, and advises that the job should therefore be discontinued. The financial controller reviewed the suggestion briefly before departing for a meeting, and asked her assistant to re-consider the position, bearing in mind three aspects of the situation:

- the treatment of sunk costs in the assistant financial controller's original calculation
- the fact that the discontinuance of the contract would involve redundancy payments of €10,000 to a consultant who was engaged for this and some similar contracts which had been expected but never materialised
- what the financial controller referred to briefly as the "non-financial" aspects of the decision

Required:

- (a) Prepare a calculation of the relevant costs and benefits, showing whether the contract with McCoy Engineering Ltd. should or should not be continued, stating any assumptions that you make in support of your calculations and explaining your treatment of each of the financial aspects of the problem; (15 marks)
- (b) Explain the concept of opportunity cost in decision-making; (5 marks)
- (c) Discuss briefly what the financial controller might have meant by the reference to "non-financial" aspects of the decision, either specifically in relation to the situation of Power Solutions Ltd. or in relation to short-term decision-making generally. (5 marks)

Total: 25 marks

Question 6

Kernan Manufacturing Ltd. made a profit in the financial year ended 30 June 2002 of €190,000, as shown below, from the production and sale of 8,000 units of its single product. The directors are currently considering a number of issues in relation to the year ending 30 June 2003, and require advice on the implications of various possible courses of action.

Profit and loss account, year ended 30 June 2002

	€	€	€
Sales			2,400,000
Production costs			
Direct materials	400,000		
Direct labour	640,000		
Variable overheads	88,000		
Fixed overheads	<u>480,000</u>		
		1,608,000	
Distribution costs			
Variable costs	120,000		
Fixed costs	<u>176,000</u>		
		296,000	
Fixed administrative expenses		<u>306,000</u>	
Profit			<u>2,210,000</u>
			<u>190,000</u>

For the year ending 30 June 2003, price and wage inflation is expected to lead to increases in comparison to the previous year of 5% for material costs and 10% for direct labour costs and variable production overheads. Variable distribution costs will continue to be the same percentage of sales revenue as before. A rigorous cost-cutting programme is being implemented to ensure that, despite price increases, overall fixed costs will remain at the same levels as in the previous year.

Production and sales are expected to drop to 7,500 units next year in the absence of any action by the company. It is believed that production and sales levels could be restored to 8,000 units by a drop in price to €290 per unit, and increased to 10,000 units by a drop in price to €270.

The production director believes that instead of making price reductions it would be better to allocate 2,500 units of the company's overall production capacity of 10,000 units to the manufacture of a modified product that could be sold in Eastern Europe. For the modified product, sales price would be €230, direct materials would cost €35 per unit, and direct labour and variable production overheads would be as for the existing product. Fixed distribution costs would be increased by €120,000 and fixed administrative expenses by €60,000. There would be no variable distribution costs.

/ ... Question 6 continues on the next page ...

/ ... Question 6, continued from the previous page ...

Required:

- (a) Calculate the profit that would be earned next year with no drop in price and no sales to Eastern Europe;
(7 marks)
- (b) Calculate the profit that would be earned if price were to be dropped to €290 and the profit that would be earned if the price were further reduced to €270, in both cases with no sales to Eastern Europe;
(5 marks)
- (c) Calculate the overall profit that would be earned if the production director's proposal for sales to Eastern Europe were adopted;
(7 marks)
- (d) Explain briefly the concept of "relevant range" and its importance in decision-making.
(6 marks)

Total: 25 marks