

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

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**SEMESTER II EXAMINATIONS 2000/01**

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**HIGHER DIPLOMA IN BUSINESS STUDIES**

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**ACCOUNTING FOR CONTROL**

**(AY873)**

Professor N. Garrod  
Professor J. F. Collins  
Ms. B. Sweeney

**Time allowed: TWO AND A HALF HOURS**

**Candidates are required to attempt any THREE questions,**

**All questions carry equal marks**

### Question 1

The following information is provided on the results of Nevis Ltd for the month of April 2001:

	£	£
Sales (24,500 units at £130)		3,185,000
Material type A (75,800 kgs)	265,300	
Material type B (44,000 kgs)	165,000	
Labour grade 1 (75,000 hours)	1,650,000	
Labour grade 2 (50,000 hours)	<u>500,000</u>	
		<u>2,580,300</u>
		604,700
Fixed overheads		<u>334,000</u>
Net profit		270,700

There were no opening or closing stocks of materials, work in progress or finished goods. The budget for the year showed sales of 30,000 units for April, but a shortage of grade 2 labour restricted production. Fixed overheads budgeted for April were £300,000. Sales prices were higher than the budgeted price of £120 due to the shortage. The standard variable cost of production had been estimated as follows at the beginning of the year:

Material type A, 3 kgs at £3 per kg	£9
Material type B, 2.5 kgs at £4 per kg	£10
Labour grade 1, 3 hours at £20 per hour	£60
Labour grade 2, 2 hours at £10 per hour	<u>£20</u>
	<u>£99</u>

### Required

- Calculate the variances between the actual profit for April 2001 and the profit of £330,000 included in the budget  
(20 marks)
- Discuss briefly the ways in which variance analysis helps management to control a business  
(7 marks)
- Outline the main characteristics which you feel a useful variance report should possess.  
(6 1/3 marks)

**Total marks: 33 1/3**

## Question 2

Sinai Ltd manufactures two types of baths (standard and deluxe models). Two types of materials (A and B) are used in the manufacture of these baths. Details of the stock of these materials are as follows:

	<u>Material A</u>		<u>Material B</u>	
	<i>Units</i>	<i>Total cost</i>	<i>Units</i>	<i>Total cost</i>
Opening stock	500	£800	200	£2000
Purchased 10 January	400	£500	300	£3300
Purchased 10 February	100	£160	150	£1530

Labour costs are £4 per hour in manufacturing and £5 per hour in assembly. Total labour hours budgeted in manufacturing are 100,000 and in assembly 500,000.

Total budgeted overheads for the factory are £1,200,000 of which £800,000 relates to manufacturing and £400,000 to assembly. Sinai Ltd calculates a factory wide overhead rate on the basis of its budgeted figures in order to estimate the total cost of manufacturing. The overhead rate is based on direct labour hours.

Each standard bath requires 80 units of material A, 5 labour hours in manufacturing and 3 labour hours in assembly. Each deluxe bath requires 50 units of material B, 7 labour hours in manufacturing and 2 labour hours in assembly.

Sinai Ltd has a pricing strategy of total manufacturing cost plus 50%.

The company received an order of 10 standard baths and 12 deluxe baths on 1 March and wishes to price this order.

At the end of the year it was discovered that actual overheads for the year were £1,350,000 (£850,000 in manufacturing and £500,000 in assembly) and total labour hours were 550,000 (90,000 in manufacturing and 460,000 in assembly).

### Required

- (a)
  - (i) Calculate the price of the order received by Sinai Ltd using the LIFO method of costing materials and the factory wide overhead rate.
  - (ii) Calculate the price of the order using a FIFO method of costing materials and using separate departmental overhead rates.
- (b) Calculate any under or over applied overhead for the year using the factory wide overhead rate.
- (c) Discuss the usefulness of an activity-based costing (ABC) system and explain how it differs from traditional costing systems.

(18 marks)

(6 marks)

(9 <sup>1</sup>/<sub>3</sub> marks)

**Total marks: 33 <sup>1</sup>/<sub>3</sub>**

### **Question 3**

Muckcross Ltd commenced business manufacturing computer parts on 1 January 2000 with a bank loan of £200,000. Interest at 10% on the bank loan is payable at the end of each quarter. Any additional finance needed will be obtained by bank overdraft.

The company is trying to estimate its cash requirements for the first four months of business and has supplied the following information.

1. Sales units are expected to be 6,000 for January, 8,000 for February and 9,000 per month thereafter for the rest of the year. Each unit is sold for £40.
2. Raw materials costing £10 need to be acquired for each unit produced. Production of each unit requires  $\frac{1}{2}$  an hour labour. 20 employees are employed full time at a cost of £1000 per month. These employees each work 160 hours per month. Additional labour can be taken on at £4 per hour if required.
3. Variable production overheads cost £5 per unit. Fixed overheads of £10,000 per month are expected to be incurred. This does not include depreciation or rental of premises.
4. All labour and variable and fixed production overheads are paid for as they are incurred.
5. One months credit is received from the supplier of raw materials. A stock of raw materials equal to 30% of the next month's production is required at the end of each month.
6. All sales are on credit with 30% collected in the month following sale and the remainder in the second month following sale.
7. In January the company acquired fixed assets totalling £100,000. These assets are depreciated at 10% per annum.
8. A stock of finished goods of 50% of the following month's sales is to be held at the end of each month.
9. Premises are rented at a cost of £12,000 per year. Payments are made in advance in two instalments on 1 January and 1 July.

*Question 3 continues on next page...*

**Required:**

- (a) Prepare the following budgets for Muckcross Ltd, by month and in total for the first quarter (January to March inclusive) of 2000:
- production budget (in units);
  - purchases budget for raw materials (in £);
  - cash payments budget;
  - cash receipts budget;
  - cash budget.

**(27 marks)**

- (b) Why have certain leading multinational organisations decided to abandon budgets?

**(6  $\frac{1}{3}$  marks)**

**Total marks: 33  $\frac{1}{3}$**

**Question 4**

You are required to answer both parts (a) and (b).

- (a) Discuss what is meant by the term management control, including in your answer an explanation of different types of controls and the difference between feedforward and feedback controls.
- (b) It has been concluded in the literature that performance reports should be broadened to incorporate other variables besides costs and revenues. Discuss the reasons behind this broadening of performance reports.

**(16  $\frac{2}{3}$  marks)**

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**Total marks: 33  $\frac{1}{3}$**