



# MANICALAND STATE UNIVERSITY OF APPLIED SCIENCES

**FACULTY OF AGRIBUSINESS AND COMMERCE**

**DEPARTMENT: ACCOUNTING**

**MODULE: FINANCIAL PLANNING AND CONTROL**

**CODE: HBM415**

**SESSIONAL EXAMINATIONS  
SEPT/OCT 2021**

**DURATION: 3 HOURS**

**EXAMINER: MRS L MANDONGWE**

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## **INSTRUCTIONS**

- 1. Answer **All** questions*
- 2. There are 5 questions*
- 3. Each question carries 20 marks*

***Additional material(s): Non programmable calculators***

**Question 1 [20 marks]**

- a. A company plans to borrow \$50 000 for 5 years. The company's bank will lend the money at a rate of 9% and require that the loan be paid off in 5 equal end of year payments.
- (i) Calculate the amount of the payment that the company must make in order to fully amortise this loan in 5 years. (5)
  - (ii) Construct an amortisation schedule to show the interest and the principal component of that loan. (5)
- b. Differentiate between an ordinary annuity and an annuity due. (2)
- c. A company just paid its annual dividend of \$1.10 a share. The company's policy is to increase the dividend by 2% annually.

How much are you willing to pay today for a share of this stock if you require an 11% rate of return? (2)

- d. The Thomas Co. is in a declining industry and has just announced that they will be reducing their annual dividend by 2% annually from now on. The last dividend they paid was \$1.60. The market rate of return on this stock is 6%.

What is the market price of one share of Thomas Co. stock? (4)

- e. In capital expenditure appraisal, if there are two conflicting project rankings, which criteria is used to choose a better project? (2)

**Question 2 [20 marks]**

A redundant manager who received compensation of \$80 000 decides to commence business on 4 January 2021, manufacturing a product for which he knows there is a ready market. He intends to employ some of his former workers who were also made redundant but they will not all commence on 4 January. Suitable premises have been found to rent and second-hand machinery costing \$60 000 has been bought out of the \$80 000. This machinery has an estimated life of five years from January and no residual value.

*Additional information*

(i) Production will begin on 4 January 2021 and 25% of the following month's sales will be manufactured in January. Each month thereafter the production will consist of 75% of the current month's sales and 25% of the following month's sales.

(ii) Estimated sales are:

	<b>(Units)</b>	<b>(\$)</b>
January	Nil	Nil
February	3200	80 000
March	3600	90 000
April	4000	100 000
May	4000	100 000

(iii) Variable production cost per unit:

	(\$)
Direct materials	7
Direct wages	6
Variable overhead	<u>2</u>
	<b><u>15</u></b>

(iv) Raw material stocks costing \$10 000 have been purchased (out of the manager's \$80 000) to enable production to commence and it is intended to buy, each month, 50% of the materials required for the following month's production requirements. The other 50% will be purchased in the month of production.

Payment will be made 30 days after purchase.

(v) Direct workers have agreed to have their wages paid into bank accounts on the seventh working day of each month in respect of the previous month's earnings.

(vi) Variable production overhead: 60% is to be paid in the month following the month it was incurred and 40% is to be paid one month later.

(vii) Fixed overheads are \$4000 per month. One quarter of this is paid in the month incurred, one half in the following month, and the remainder represents depreciation on the second-hand machinery.

(viii) Amounts receivable: a 5% cash discount is allowed for payment in the current month and 20% of each month's sales qualify for this discount. 50% of each month's sales are received in the following month, 20% in the third month and 8% in the fourth month. The balance of 2% represents anticipated bad debts.

Required:

- (a) Prepare a cash budget for each of the first four months ending 30 April 2021 (17)
- (b) Describe briefly the benefits to cash budgeting from the use of a particular type of software package. (3)

**Question 3 [20 marks]**

Butani Limited is a company which is involved in the retail trade. The following are their results for the two years, 2020 and 2019.

Butani Limited Statement of Profit or Loss and Other Comprehensive Income for the year ended 31 December:

	<b>2020</b>	<b>2019</b>
	<u>\$000</u>	<u>\$000</u>
Sales	5 800	3 990
Cost of Sales	(4 123)	(2 863)
Gross Profit	1 677	1 127
Distribution Costs	(193)	(177)
Administration Costs	(218)	(126)
Profit before Interest and Tax	1 266	824
Interest	(188)	(194)
Taxation	<u>(108)</u>	<u>(120)</u>
<b>Profit for the Year</b>	<b><u>970</u></b>	<b><u>510</u></b>

Butani Limited Statement of Financial Position for the year ended 31 December:

	<b>2020</b>	<b>2020</b>	<b>2019</b>	<b>2019</b>
	\$000	\$000	\$000	\$000
<b>Non-Current Assets</b>		3 610		3 225
<b>Current Assets</b>				
Inventory	580		460	
Trade Receivables	460		280	
Cash and Cash Equivalents	<u>200</u>		<u>160</u>	
Total Current Assets		<u>1 240</u>		<u>900</u>
<b>Total Assets</b>		<b><u>4 850</u></b>		<b><u>4 125</u></b>
<b>Equity &amp; Liabilities</b>				
<b>Equity</b>				
Share Capital	1 000		1 000	
Retained Earnings	<u>1 525</u>		<u>555</u>	
Total Equity		2 525		1 555
<b>Non-Current Liabilities</b>				
Long-term Debt	<u>1 700</u>		<u>2 000</u>	
Total Non-Current Liabilities		1 700		2 000
<b>Current Liabilities</b>				
Trade Payables	400		320	
Bank Overdraft	147		30	
Taxation	108		120	
Accruals	<u>47</u>		<u>100</u>	
Total Current Liabilities		<u>702</u>		<u>570</u>
<b>Total Equity &amp; Liabilities</b>		<b><u>4 927</u></b>		<b><u>4 125</u></b>

Notes:

- (i) The opening inventory for 2015 was \$500 000.
- (ii) The number of shares in issue is 1000 000 for both years.

	<b>2020</b>	<b>2019</b>
(iii) Market price per share at year-end	\$12	\$6.20

Required:

(a) Calculate for both years the following ratios in relation to Butani Limited:

- (i) Gross Profit Percentage
- (ii) Net Profit Percentage
- (iii) Current Ratio
- (iv) Trade Receivable Days
- (v) Trade Payable Days
- (vi) Return on Capital Employed
- (vii) Earnings Per Share
- (viii) Price Earnings Ratio. (8)

(b) Draft a report to the Board of directors of Butani Limited in which you provide a commentary on the company's position and performance. Use the ratios calculated at (a) above as the basis for your commentary. (10)

(c) Advise the directors on the option to sell the company for \$15m as offered by a third party. (2)

**Question 4 [20 marks]**

The following budgeted information relates to BR. Ltd for the forthcoming period:

	<b>Products</b>		
	<u>Plates</u>	<u>Pots</u>	<u>Pans</u>
	(000)	(000)	(000)
Sales and production (units)	50	40	30
	\$	\$	\$
Selling price (per unit)	45	95	73
Prime cost (per unit)	32	84	65
	<u>Hrs</u>	<u>Hrs</u>	<u>Hrs</u>
Machine department (machine hours per unit)	2	5	4
Assembly department (direct labour hours per unit)	7	3	2

Overheads allocated and apportioned to production departments (including service cost centre costs) were to be recovered in product costs as follows:

Machine department at \$1.20 per machine hour

Assembly department at \$0.825 per direct labour hour

You ascertain that the above overheads could be re-analysed into 'cost pools' as follows:-



<b>Cost pool</b>	<b>\$000</b>	<b>Cost driver</b>	<b>Quantity for the period</b>
Machining services	357	Machine hours	420 000
Assembly services	318	Direct labour hours	530 000
Set-up costs	26	Set-ups	.... 520
Order processing	156	Customer orders	32 000
Purchasing	<u>84</u>	Suppliers orders	11 200
	<b><u>941</u></b>		

You have also been provided with the following estimates for the period:

	<b>Products</b>		
	<u>Plates</u>	<u>Pots</u>	<u>Pans</u>
Number of set-ups	120	200	200
Customer orders	8000	8000	16 000
Suppliers' orders	3000	4000	4 200

### **Required**

- (a) Prepare and present profit statements using:
- (i) Conventional absorption costing (5)
  - (ii) Activity-based costing (10)
- (b) Comment on why activity-based costing is considered to present a fairer valuation of the product cost per unit. (5)

**Question 5 [20 marks]**

You are employed by C & K Company, based in Botswana. The firm has recently been engaged by a small manufacturing company to provide advice and recommendations to improve the company's financial planning and control system. The managing director of the manufacturing company is particularly interested in implementing standard costing.

Draft a memorandum for your client that:-

- a. Outlines any *five* purposes of standard costing (5)
- b. You are a newly qualified financial planner and controller in the firm of Kyle & Co and have been asked by a senior manager to provide assistance to a new client. The client has asked for information about standard costing, specifically the different types of standard costs and how standard costs are established. You have agreed to prepare a briefing note that will address these matters.

**Required**

- (i) Describe the different types of standard costs and their suitability for use in a company. (6)
- (ii) Briefly explain two approaches to establish standard costs, including the advantages and disadvantages of each approach. (6)
- c. Explain *two* the advantages of life cycle costing? (2)
- d. Explain how the life cycle cost per unit is calculated (1)

**END OF EXAMINATION**