



**THE INSTITUTE OF CHARTERED  
ACCOUNTANTS OF NIGERIA**

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# **PATHFINDER**

**MAY 2021 DIET  
SKILLS LEVEL EXAMINATIONS**

Question Papers

Suggested Solutions

Marking Guides

and

Examiner's Reports

## **FOREWARD**

This issue of the **PATHFINDER** is published principally, in response to a growing demand for an aid to:

- (i) Candidates preparing to write future examinations of the Institute of Chartered Accountants of Nigeria (ICAN);
- (ii) Unsuccessful candidates in the identification of those areas in which they lost marks and need to improve their knowledge and presentation;
- (iii) Lecturers and students interested in acquisition of knowledge in the relevant subject contained herein; and
- (iv) The professional; in improving pre-examinations and screening processes, and thus the professional performance of candidates.

The answers provided in this publication do not exhaust all possible alternative approaches to solving these questions. Efforts had been made to use the methods, which will save much of the scarce examination time. Also, in order to facilitate teaching, questions may be edited so that some principles or their application may be more clearly demonstrated.

It is hoped that the suggested answers will prove to be of tremendous assistance to students and those who assist them in their preparations for the Institute's Examinations.

### **NOTES**

Although these suggested solutions have been published under the Institute's name, they do not represent the views of the Council of the Institute. The suggested solutions are entirely the responsibility of their authors and the Institute will not enter into any correspondence on them.

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**THE INSTITUTE OF CHARTERED ACCOUNTANTS OF NIGERIA**

**SKILLS LEVEL EXAMINATION – MAY 2021**

**FINANCIAL REPORTING**

Time Allowed: 3¼ hours (including 15 minutes reading time)

**INSTRUCTION: YOU ARE REQUIRED TO ANSWER FOUR OUT OF SIX QUESTIONS IN THIS PAPER**

**SECTION A: COMPULSORY QUESTION (40 MARKS)**

**QUESTION 1**

The following is the trial balance of Almajiri Nigeria Limited as at September 30, 2018

	₦'m	₦'m
Revenue		60,000
Cost of sales	40,800	
Distribution costs	2,900	
Administrative expenses	4,440	
Interest on bank borrowings	40	
Research and development costs	1,720	
Leasehold property (at valuation Oct. 1, 2017)	10,000	
Plant and equipment (at cost)	15,320	
Plant and equipment (accum. depr. at Oct. 1, 2017)		4,920
Capitalised development expenditure (Oct. 1, 2017)	4,000	
Development expenditure (accum. amortiz. at Oct. 1, 2017)		1,200
Closing inventory (30 Sept. 2018)	4,000	
Trade receivables	8,620	
Bank		260
Trade payables & provisions		4,760
Preference dividend paid	160	
Dividend paid on ordinary shares	1,200	
Ordinary shares at 25k each		10,000
8% Redeemable preference shares at ₦1 each (year 2020)		4,000
Retained earnings brought forward		4,900
Deferred tax		1,160
Leasehold property revaluation reserve	--	2,000
	<b><u>93,200</u></b>	<b><u>93,200</u></b>

The following information were extracted from the records of Almajiri Nigeria Limited.

**Additional information:**

- (i) One of the reputable customers of Almajiri Nigeria Limited sued the company for ~~₦~~400 million for breach of contract over a cancelled order. Almajiri Nigeria Limited obtained a legal opinion that there is 20% chance that Almajiri will lose the case.

Accordingly, it has provided for ~~₦~~80 million (~~₦~~400 million x 20%) included in administrative expenses in respect of the claim. The unrecoverable legal cost of defending the action was estimated at ~~₦~~20 million and these have not been provided for as the legal action will not go to court until next year.

- (ii) The directors of the Company have estimated the provision for income tax for the year ended September 30, 2018 at ~~₦~~2,280 million. The required deferred tax provision at September 30, is ~~₦~~1,200 million.
- (iii) The redeemable preference shares were issued on April 1, 2018 at par. They are redeemable at a large premium which gives them an effective finance cost of 12% per annum.
- (iv) The leasehold property had a remaining life of 20 years at October 1, 2017. The company's policy is to revalue its property at each year end and as at September 30, 2018 it was revalued at ~~₦~~8,600 million.
- (v) On October 1, 2017 an item of plant and equipment was disposed of for ~~₦~~500 million cash. The proceeds have been treated as revenue by the company. The plant is still included in the company's trial balance figure at the cost of ~~₦~~1,600 million and accumulated depreciation of ~~₦~~800 million (to date of disposal). All plants and equipment are depreciated at 20% per annum using reducing balance method. Depreciation and amortisation of all non-current assets are charged to cost of sales.
- (vi) In addition to capitalised development expenditure of ~~₦~~4,000 million further research and development cost were incurred on a new project which commenced on October 1, 2017. The research stage of the new project lasted until December 31, 2017 and incurred ~~₦~~280 million costs, from that date the project incurred development cost of ~~₦~~160 million per month. On April 1, 2018 the directors became confident that the project would be successful and yield a profit well in excess of its costs. The project is still in development as at September 30, 2018.

Capitalised development expenditure is amortised at 20% per annum using straight line method. All expensed research and development expenditure is charged to cost of sales.

**You are required to prepare:**

- a. Statement of profit or loss and other comprehensive income for the year ended September 30, 2018. (13 Marks)
  - b. Statement of changes in equity for the year ended September 30, 2018. (6 Marks)
  - c. Statement of movement in property, plant and equipment to be included in published financial statements. (7 Marks)
  - d. Statement of financial position as at September 30, 2018. (14 Marks)
- (Total 40 Marks)**

**SECTION B: OPEN-ENDED QUESTIONS (60 MARKS)**

**INSTRUCTION: YOU ARE REQUIRED TO ANSWER ANY THREE OUT OF FIVE QUESTIONS IN THIS SECTION**

**QUESTION 2**

As a result of privatisation and commercialisation exercise currently going on in the country, the Ministry of Transport sold the assets and liabilities of the newly constructed standard gauge railway to a private company known as Stalus Rail Limited (SRL) to ensure smooth operations of the railway services by freeing it from government bureaucracy.

The summarised extracts of the statement of financial position at fair value of SRL on January 1, 2019 reflecting the terms and conditions of the sales agreement of the Transport Ministry are as follows:

	<b>₦'m</b>
<b>Assets</b>	
Goodwill	150,000
Operating licence	900,000
Property – Train stations and land	225,000
Rail tracks and coaches	225,000
Two (2) train engines	750,000

Purchase consideration	2,250,000
<b>Liabilities</b>	
Sundry liabilities	Nil

The operating licence is for a ten-year period which was issued on January 1, 2019 by the Transport Ministry and it is stated at cost.

The carrying value of the property and rail track and coaches are based on value in use. The engines are valued at their net selling prices.

On February 1, 2019 one of the train engines got damaged due to a technical fault from the manufacturer and the engine was completely destroyed. The sale of the assets to SRL was without recourse to the Transport Ministry and the manufacturer of the engines.

In view of this, it was estimated that there would be reduced passenger capacity, therefore, the estimated value in use of the whole train service business of SRL was assessed at ₦1,500 billion.

The number of passengers after one of the engines of the train got damaged was below expectation, even allowing for the reduced capacity. In the light of this, the value in use of SRL rail services was re-assessed on March 31, 2019 at ₦1,350 billion. On this date the SRL received an offer of ₦675 billion from another company called Papaya Railway Services Limited (PRSL) for the operating licence (since it is transferable). The realisable value of the other assets has not changed significantly.

**Required:**

- a. Draft a memo addressed to the MD of Stalus Rail Limited (SRL) explaining the basis of allocating an impairment loss to the assets of a cash generating unit in accordance with IAS 36 on impairment of assets.  
(6 Marks)
  - b. Calculate the carrying amount of the assets of SRL Limited as at February 1, 2019 and March 1, 2019. (10 Marks)
  - c. Explain **TWO** conditions that must exist before an impairment loss can be reversed. (4 Marks)
- (Total 20 Marks)**

**QUESTION 3**

- a. International Financial Reporting Standards (IFRS 5) on Non-Current Assets held for Sale and Discontinued Operations specifies the accounting treatment for assets held for sale and disclosure of discontinued operations.

**Required:**

Discuss the conditions which must exist in order to classify a Non-Current Asset as being held for sale and explain the accounting treatments that apply when such classification is deemed appropriate. (7 Marks)

- b. Wizkid Bottling Company Plc specialises in the production of alcoholic wine known as Blue Bull and soft drink called “Wiz-Cola”, hence the company operates two divisions i.e. Blue Bull and Wiz-Cola division. Due to high cost of labour and shortage of raw materials for the production of the wine, the Blue Bull division has incurred significant operating losses.

Management decided to close down the Blue Bull division and draw up a plan to discontinue operations of the division.

On February 1, 2019 the Board of Directors of Wizkid Bottling Company Plc approved and immediately announced the formal plan.

The following figures are available for the current and prior year ending March 31.

	2019		2018	
	Blue Bull	Wiz-Cola	Blue Bull	Wiz-Cola
	₦'000	₦'000	₦'000	₦'000
Revenue	235,000	1,570,000	250,000	1,250,000
Cost of sales	175,000	505,000	200,000	450,000
Admin. expenses	35,000	311,000	25,000	255,000
Distribution costs	20,000	186,500	10,000	157,500
Other operating expenditure	15,000	124,500	10,000	102,500
Taxation expense /(credit)	(3,000)	130,500	1,500	85,000

**Additional Information:**

The following additional costs are directly related to the decision to discontinue operation, and are yet to be accounted for.

Severance pay of ₦42.5 million was incurred between February 1, 2019 and March 31, 2019.

A proper evaluation of the recoverability of the assets in the ‘Blue Bull Division’ in terms of IAS 36 led to the recognition of an impairment loss of ₦9.5 million which is included in other operating expenses above.

**Required:**

- i. Draft the statement of profit or loss for Wizkid Bottling Company Plc for the year ended March 31, 2019 together with the comparative figures for year 2018.  
(10 Marks)
- ii. The Director of finance of Wizkid Bottling Company Plc stated that there should be some additional disclosure about the discontinued operations which should be shown in notes to the financial statements of the company.

5. Identify **THREE** of such disclosure requirements in accordance with IFRS

(3 Marks)

**(Total 20 Marks)**

**QUESTION 4**

Bottle Nigeria Plc acquired 80% of Glass Limited's equity share since its incorporation about 10 years ago.

The two companies' draft financial statements as at December 31, 2019 are as follows:

**Statements of profit or loss for the year ended December 31, 2019.**

	<b>Bottle Nig. Plc ₦'000</b>	<b>Glass Limited ₦'000</b>
Revenue	225,000	45,000
Cost of sales	<u>(130,500)</u>	<u>(27,000)</u>
Gross profit	94,500	18,000
Other expenses	<u>(76,500)</u>	<u>(14,400)</u>
Profit before taxation	18,000	3,600
Income tax expense	<u>(5,850)</u>	<u>(1,125)</u>
Profit for the year	<u>12,150</u>	<u>2,475</u>

**Statement of financial position as at December 31, 2019**

	<b>Bottle Nig. Plc ₦'000</b>	<b>Glass Limited ₦'000</b>
<b>Assets</b>		
<b>Non-Current Assets:</b>		
Property, plant and equipment	86,400	9,000
Investment in Glass Limited	<u>3,600</u>	<u>--</u>

	90,000	9,000
<b>Current Assets</b>		
Inventories	22,500	5,400
Trade receivables	29,250	1,800
Cash and cash equivalents	<u>17,550</u>	<u>1,575</u>
	<u>69,300</u>	<u>8,775</u>
<b>Total assets</b>	<b><u>159,300</u></b>	<b><u>17,775</u></b>
<b>Equity and liabilities</b>		
Equity		
Ordinary share capital	90,000	4,500
Retained earnings	<u>22,500</u>	<u>10,800</u>
	112,500	15,300
<b>Current liabilities</b>		
Trade payables	40,950	1,350
Current tax liabilities	<u>5,850</u>	<u>1,125</u>
	<u>46,800</u>	<u>2,475</u>
	<b><u>159,300</u></b>	<b><u>17,775</u></b>

**Additional Information:**

- (i) On December 31, 2019 Bottle Nigeria Plc dispatched goods which cost ₦3,600,000 to Glass Limited at an invoice price of ₦4,500,000. Glass Limited received the goods on January 2, 2020 and recorded the transaction on that date.
- (ii) It is the group's policy to value non-controlling interest at acquisition at its proportionate share of the fair value of the subsidiary's identifiable net assets.

**Required:**

Prepare Bottle Group draft consolidated statement of:

- i. Profit or loss for the year ended December 31, 2019. (8 Marks)
- ii. Statement of financial position as at December 31, 2019. (10 Marks)
- iii. Explain the term "cash and cash equivalent" under IAS 7 Statement of Cash Flows. (2 Marks)

**(Total 20 Marks)**

## QUESTION 5

You are the Chief Accountant of Jolmarg Nigeria Limited, Pepeyoyo Limited is a competitor in the same industry as Jolmarg and has been operating for the past 20 years.

The following is the result of Pepeyoyo Limited for the last three years ended December 31.

Ratios		2016	2017	2018
Gross profit margin	%	34	34.4	35.4
ROCE	%	21.1	21.5	17.8
Net profit margin	%	11.9	12.4	11.4
Asset turnover	times	1.78	1.73	1.56
Gearing ratio	%	15.6	24.3	23.6
Debt ratio	%	18.5	32.0	30.9
Interest cover	times	16.7	8.1	5.5
Current ratio	ratio	3:1	2.8:1	2.7:1
Quick ratio	ratio	1.2:1	1.1:1	1.1:1
Receivable collection period	(days)	46	52	64
Inventory turnover period	(days)	158	171	182
Payable payment period	(days)	35	42	46

### Required:

Write a report to the finance director of Jolmarg Nigeria Limited analysing:

- Performance (profitability, liquidity and long term financial stability) of Pepeyoyo Limited based on the information available. (10 Marks)
- Identify **FIVE** areas which require further investigation, including references to other pieces of information which would compliment your analysis of the performance of Pepeyoyo Limited. (10 Marks)

**(Total 20 Marks)**

## QUESTION 6

- The qualitative characteristics of relevance, faithful representation and comparability identified in the IASB's framework for the preparation and presentation of financial statements are some of the attributes that make financial information useful to various users of financial statements.

**Required:**

Explain what is meant by:

- i. Relevance
- ii. Faithful representation
- iii. Comparability and how they make financial information useful. (6 Marks)

b. The following transactions and events took place in Jaye Investment Nigeria Limited during the year ended March 31, 2019.

- (i) The company entered into a lease to rent an asset paying ₦150,000 a year for 5 years out of its useful economic life of 15 years. Assume a rate of interest implicit in the lease to be 10%. (6 Marks)
- (ii) The company's statement of profit or loss prepared using historical cost method showed a loss from operating its hotels but the company is aware that the increase in value of its properties during the year far outweigh the operating loss. (4 Marks)
- (iii) A decision was made by Jaye Investment Nigeria Limited's board of directors to change the company's accounting policy from one of expensing the finance cost on building new retail outlets to one of capitalising such costs. (4 Marks)

**Required:**

Explain how you would treat the items in (i) to (iii) above in Jaye Investment Nigeria Limited's financial statements and indicate on which of the qualitative characteristic framework your treatment is based. (Total 20 Marks)

**SOLUTION 1**

(a) **Almajiri Nigeria Limited**  
**Statement of Profit or Loss and Other Comprehensive Income for the Year Ended September 30, 2018**

	₦'m
Revenue (60,000 – 500)	59,500
Cost of sales (w1)	<u>(45,080)</u>
Gross profit	14,420
Distribution cost (w1)	(2,900)
Admin expenses (w1)	(4,380)
Finance costs	<u>(280)</u>
Profit before taxation	6,860
Income tax expense (w3)	<u>(2,320)</u>

Profit for the year	4,540
<b>Other Comprehensive Income:</b>	
Loss on revaluation of leasehold property	<u>(900)</u>
<b>Total comprehensive income</b>	<u><b>3,640</b></u>

(b) **Almajiri Nigeria Limited**  
**Statement of Changes in Equity for the Year Ended Sept. 30, 2018**

	Ord. Share capital N'm	Retained earnings N'm	Revaluation reserve N'm	Total N'm
Oct. 1, 2017	10,000	4,900	2,000	16,900
Dividend paid	--	(1,200)	--	(1,200)
Total comp. income	<u>--</u>	<u>4,540</u>	<u>(900)</u>	<u>3,640</u>
Sept. 30, 2018	<u>10,000</u>	<u>8,240</u>	<u>1,100</u>	<u>19,340</u>

(c) **Property Plant and Equipment**

	Leasehold property N'm	Plant and equipment N'm	Total N'm
<b>Cost/Valuation:</b>			
Oct. 1, 2017	10,000	15,320	25,320
Disposal	--	(1,600)	(1,600)
Revaluation	<u>(900)</u>	<u>--</u>	<u>(900)</u>
Sept. 30, 2018	<u>9,100</u>	<u>13,720</u>	<u>22,820</u>
<b>Depreciation/amortization:</b>			
Oct. 1, 2017	--	4,920	4,920
Charged in year (w1)	500	1,920	2,420
Disposal	--	(800)	(800)
Revaluation	<u>--</u>	<u>--</u>	<u>---</u>
Sept. 30, 2018	<u>500</u>	<u>6,040</u>	<u>6,540</u>
<b>Carrying amount:</b>			
Sept. 30, 2018	<u>8,600</u>	<u>7,680</u>	<u>16,280</u>
Oct. 1, 2017	<u>10,000</u>	<u>10,400</u>	<u>20,400</u>

(d) **Almajiri Nigeria Limited**  
**Statement of Financial Position as at September 30, 2018**

Assets	N'm	N'm
Property plant & equipment		16,280
Development expenditure (w5)		<u>2,960</u>

<b>Current assets:</b>		
Inventory	4,000	
Trade receivables	<u>8,620</u>	
		<u>12,620</u>
<b>Total assets:</b>		
		<u>31,860</u>
<b>Equity and liabilities:</b>		
Ordinary shares at 25k each		10,000
Retained earnings		8,240
Revaluation reserve		<u>1,100</u>
		19,340
<b>Non-current liabilities:</b>		
8% Redeemable preference shares (w6)	<u>4,080</u>	
Deferred tax liability (1,160 + 40)	<u>1,200</u>	5,280
<b>Current liabilities:</b>		
Trade payable and provisions (4,760 – 60)	<u>4,700</u>	
Tax payable (current)	<u>2,280</u>	
Bank overdraft	<u>260</u>	<u>7,240</u>
		<u>31,860</u>

## Workings

### W1 Expenses

	Cost of sales	Distribution expenses	Admin. expenses
	₤'m	₤'m	₤'m
Per trial balance	40,800	2,900	4,440
Depreciation:			
Property $\left(\frac{10,000}{20}\right)$	500		
Plant and Equip.	1,920		
Loss on disposal $(500 - [1,600 - 800])$	300		
Amortisation	800		
Research and development $(280 + 480)$	760		
Legal claim $(80 - 20)$	--	--	(60)
	<u>45,080</u>	<u>2,900</u>	<u>4,380</u>

### W2 Finance cost

	₤'m	₤'m
Interest on borrowing		40
Finance cost of preference shares (redeemable)		<u>240</u>
		<u>280</u>

### W3 Income tax expense

		<b>₦'m</b>
Current tax		2,280
Deferred tax (1,200–1,160)		40
		<u>2,320</u>

### W4 Loss on property revaluation

	<b>₦'m</b>	<b>₦'m</b>
Leasehold property at Oct. 1, 2017	10,000	
Less depreciation $10,000 \div 20$	<u>(500)</u>	9,500
Value at Sept. 30, 2018		<u>(8,600)</u>
Loss on revaluation		<u>900</u>

### W5 Development expenditure

		<b>₦'m</b>
Cost – Oct. 1, 2017		4,000
Less: Accum. Depreciation		<u>(1,200)</u>
Carrying amount		2,800
Additional expenditure capitalised (160 x 6)		960
Charged to Cost of Sales (i.e. amortised cost (4,000 x 20%))		<u>(800)</u>
Balance as at Sept.30, 2018		<u>2,960</u>

### W6 8% Redeemable preference shares – (Year 2020)

		<b>₦'m</b>
Balance as at Oct. 1, 2017		4,000
Premium: Effective interest rate $(4,000 \times 12\%) \times \frac{6}{12}$		240
12% of 4000 = 480 x 6/12		
Interest rate $(4,000 \times 8\% \times \frac{6}{12})$		<u>(160)</u>
		<u>4,080</u>

### W7 Litigation

The company is being sued by a customer for ₦400 million for breach of contract over a cancelled order and according to legal opinion that there is a 20% chance that Almajiri Nigeria Limited will lose the case. Hence, no recognition is required in line with IAS 37.

## Examiner's Report

The question tests candidates' knowledge of preparation of final accounts which includes statement of profit or loss, statement of changes in equity, statement of movement in property, plant and equipment and statement of financial position.

Majority of the candidates attempted the question and performance was average.

The commonest pitfall was the inability of the candidates to correctly make necessary adjustments for the additional information provided and this led to loss of marks.

Candidates are advised to pay more attention to the principles and provisions of accounting standards as the additional information requires the applications of such principles and provisions.

## Marking Guide

	Marks	Marks
a. Statement of profit or loss and other comprehensive income		
• Presentation of statement of profit or loss		
• Determination of cost of sales	4	
• Workings for admin. expenses and distribution expenses	4	
• Working for finance cost and income tax	2	
	<u>3</u>	13
b. Statement of changes in equity		
• Presenting of statement in changes in equity	<u>6</u>	6
c. Statement of movement in PPE		
• Determination of carrying amount of property	2	
• Determination of carrying amount of plant and equipment	2	
• Determination of total carrying amount of PPE	2	
• Workings for loss on revaluation	<u>1</u>	7
d. Statement of financial position		
• Presentation of statement of financial position	8	
• Determination of development expenditure	4	
• Workings for 8% redeemable preference shares	<u>2</u>	<u>14</u>
<b>Total</b>		<b><u>40</u></b>

## **SOLUTION 2**

(a)

### **Stalus Rail Limited MEMO**

**From:** The Accountant  
**To:** The Managing Director  
**Subject:** The basis of allocating an Impairment loss to the assets of a cash generating unit.

Dear Sir,

The above subject refers.

**Cash generating unit** is the smallest identifiable group of assets for which independent cash flows can be identified and measured.

#### **Allocation of Impairment Loss of a Cash Generating Unit**

- i. Any identified impairment loss on a specific asset should be used to reduce the carrying amount of that specific asset.
- ii. The remaining impairment losses after the above treatment, if any, should be charged against goodwill.
- iii. After goodwill has been reduced to nil, any other impairment losses remaining should be allocated or charged to non-monetary assets on pro-rata basis of their carrying amount.
- iv. Please note that the monetary assets such as trade receivables should not be exempted from the allocation of the impairment loss.
- v. the carrying amount of an asset cannot be reduced below the highest of:
  - Its fair value less cost of disposal (if determinable).
  - Its value in use (if determinable); and
  - Zero

Thank you.

Mr. XYZ  
Accountant

(b) The impairment losses are allocated as required by IAS 36 as calculated below:-

	Assets Jan. 1 2019 N'm	First Impairment loss N'm	Carrying amount Feb. 1 2019 N'm
Goodwill	150,000	(150,000)	Nil
Operating licence	900,000	(150,000) (W1)	750,000
Property Stations/Land	225,000	(37,500) (W2)	187,500
Rail Tracks/Coaches	225,000	(37,500) (W3)	187,500
Train Engines	<u>750,000</u>	<u>(375,000)</u>	<u>375,000</u>
	<u>2,250,000</u>	<u>(750,000)</u>	<u>1,500,000</u>

	Carrying amount @ Feb.1 2019 N'm	Second impairment Loss N'm	Carrying amount March 1, 2019 N'm
Operating licence	750,000	(75,000)	675,000
Property – Station/land	187,500	(37,500) (w4)	150,000
Rail track/coaches	187,500	(37,500) (w5)	150,000
Train engine	<u>375,000</u>	-	<u>375,000</u>
	<u>1,500,000</u>	<u>150,000</u>	<u>1,350,000</u>

$$(w1) - \text{Operating licence} = \frac{900}{225 + 225 + 900} \times \frac{(750 - 150 - 375)}{1}$$

$$\frac{900}{1,350} \times \frac{225}{1} = \text{N150 billion}$$

$$(w2) - \text{Property-Station/land} = \frac{225}{1,350} \times \frac{225}{1} = \text{N37.5 billion}$$

$$(w3) - \text{Rail track/coaches} = \frac{225}{1,350} \times \frac{225}{1} = \text{N37.5 billion}$$

$$W(4) - \text{Property – Station/land} = \frac{187,500}{187,500 + 187,500} \times \frac{75,000}{1} = \text{N37.5 billion}$$

$$W(5) - \text{Rail trust/coaches} = \frac{187,500}{187,500 + 187,500} \times \frac{75,000}{1} = \underline{\underline{\text{N}37.50 \text{ billion}}}$$

**Note:** The operating licence value cannot be reduced below net selling price.

The engine cannot be reduced below its selling price.

**(c) Conditions that must exist before impairment loss can be reversed**

Any impairment loss may be reversed when there is evidence that these had happened.

- (i) There is an improvement in the indicator of the impairment; and
- (ii) The reversal should not lead to carrying amount in excess of what the carrying amount of the assets would have been without the recognition of the original impairment loss.

**Examiner's Report**

The question tests the principles and application of IAS 36 on Impairment of Assets.

Most of the candidates did not attempt the question and the few that did, performed poorly.

The commonest pitfalls were as follows:

- i. Inability to explain the basis of allocating impairment loss to assets of a cash generating unit;
- ii. Incorrect calculation of impairment loss due to inability to apply (i) above; and
- iii. Only few were able to explain the conditions that must exist before an impairment loss can be reversed.

Candidates are advised to pay more attention to all relevant accounting standards at the skills level of the Institute's examination for better performance in future.

**Marking Guide**

	Marks	Marks
(a) Memo on basis of allocation of impairment loss:		
• Opening memo format	½	
• Explanation of cash generating unit	1	
• four correct points on basis of allocation of impairment loss	4	
• Closing memo format	½	6

(b)	Calculation of carrying amount of assets after allocation of impairment loss:		
	• Determination of carrying amount at Feb. 1, 2019	4½	
	• Workings for allocation of impairment loss at Feb 1, 2019	½	
	• Determination of carrying amount at March 1, 2019	4½	
	• Workings for allocation of impairment loss March 1, 2019	<u>½</u>	10
(c)	Conditions for reversal of impairment loss:		
	• Correct explanation of two conditions	4	4
	<b>Total</b>		<b><u>20</u></b>

### SOLUTION 3

#### Conditions that Must Exist before Classifying a Non-Current Asset as Being held for Sale

(a) (i). A non-current asset is classified as held for sale, if its carrying amount will be recovered principally through a sales transaction rather than through continuing use. For this to be the case, the following criteria must be met:

The asset must be available for immediate sale in its present condition; and the sale must be highly probable.

- IFRS 5 lists the following conditions which must be met if a sale is to be considered as highly probable:
- The management is committed to a plan to sell the asset;
- An active programme has been initiated to locate a buyer and complete the plan;
- The asset is being actively marketed at a sale price that is reasonable in relation to its current value;
- A complete sale is expected within one year from the date of classification (may be extended if any delay is caused by circumstance beyond the entity's control);
- It is unlikely that there will be any significant changes to the plan or that the plan will be withdrawn;
- If these criteria are not satisfied at the end of the reporting period, the assets should not be classified as held for sale; and
- If the criteria are satisfied after the reporting period but before the financial statements are authorised for issue, the fact that the assets are not classified as held for sale should be disclosed in the notes to the financial statements.

## (ii) The Accounting Treatment for Non-Current Assets Held for Sale

- A non-current asset or disposal group that is held for sale is measured at the lower of its carrying amount and net realisable value (fair value less costs to sell).
- Where net realisable value is lower than carrying value, this represents an impairment loss which should be recognized immediately.
- Non-current assets held for sale should not be subjected to annual depreciation even where the asset is still being used by the entity in ordinary course of business.
- IFRS 5 requires that assets held for sale to be presented separately on the face of the statement of financial position and information concerning discontinued operation should be disclosed in the financial statements.

### (b) (i) Wizkid Bottling Company Plc

#### Statement of profit or loss for the year ended March 31, 2019

	<b>2019</b>	<b>2018</b>
	<b>₦'000</b>	<b>₦'000</b>
<b>Continuing operations:</b>		
Revenue	1,570,000	1,250,000
Cost of sales	<u>(505,000)</u>	<u>(450,000)</u>
Gross profit	1,065,000	800,000
Distribution cost	(186,500)	(157,500)
Admin. Expenses	(311,000)	(255,000)
Other operating expenses	<u>(124,500)</u>	<u>(102,500)</u>
Profit before tax	443,000	285,000
Income tax expense	<u>(130,500)</u>	<u>(85,000)</u>
Period for the period	312,500	200,000
<b>Discontinued operations (Blue Bull)</b>	<u>(49,500)</u>	<u>3,500</u>
(w1)		
Profit for the Period	<u>263,000</u>	<u>203,500</u>
<b>Workings:</b>	<b>₦'000</b>	<b>₦'000</b>
(wi) Discontinued operation revenue	235,000	250,000
Cost of sales	<u>(175,000)</u>	<u>(200,000)</u>
Gross profit	60,000	50,000
Distribution cost	(20,000)	(10,000)
Admin exp.	(35,000)	(25,000)
Other operating exp. (15,000 – 9,500)	(5,500)	(10,000)

Impairment loss	(9,500)	--
Severance pay	<u>(42,500)</u>	--
Profit/(Loss) before taxation	(52,500)	5,000
Tax (expense)/credit	<u>3,000</u>	<u>(1,500)</u>
Profit/(loss) for the period	<u>(49,500)</u>	<u>3,500</u>

(ii) **Additional disclosure as requested by finance director**

- A description of the division of the company to be disposed.
- A description of the facts and circumstances that led to discontinuance of operations/ and subsequent close down of the Blue Bull division of the company.
- A description of the facts and circumstances leading to the expected disposal and the expected manner and timing of the disposal.
- Where some adjustments are classified separately in the discontinued operation, the nature and amount of the adjustments must be disclosed.

### Examiner's Report

The question tests candidates' knowledge of the provisions and application of International Financial Reporting Standard (IFRS 5) on Non-Current Assets Held for Sales and Discontinued operations.

Most of the candidates attempted the question, but, performance was below average.

Some candidates could not correctly prepare draft statement of profit or loss, disclosing continuing and discontinuing operations as required by IFRS 5.

Candidates are advised to pay more attention to all relevant accounting standards at the skills level of the Institute's examination for better performance in future.

### Marking Guide

		Marks	Marks
(a)i	Conditions which must exist to classify non-current assets as held for sale		
	• Five correct conditions	5	
ii	Accounting treatment of non-current assets held for sales		
	• Two correct accounting treatment.	<u>2</u>	7

(b)i	Draft statement of profit or loss: Continuing operations (year 2019 and 2018): Determination of gross profit	1 <sup>3</sup> / <sub>4</sub>	
	Determination of profit for the period	2 <sup>3</sup> / <sub>4</sub>	
	Discontinuing operations (year 2019 and 2018): Calculation of discontinuing operating profit	5	10
	Entity's profit	<u>1</u> / <sub>2</sub>	3
ii	Additional disclosure in notes form in the financial statements for discontinuing operations: Three disclosures	3	
	<b>Total</b>		<b><u>20</u></b>

#### SOLUTION 4

(i) **BOTTLE NIGERIA PLC**  
**Consolidated statement of profit or loss for the year ended December 31, 2019**

	<b>₦'000</b>
Revenue (225 + 45 - 4.5)	265,500
Cost of sales (130.5 + 27 - 4.5 + 0.9)	<u>(153,900)</u>
Gross profit	111,600
Other expenses (76.5 + 14.4)	<u>(90,900)</u>
Profit before tax	20,700
Income tax expenses (5.85 + 1.125)	<u>(6,975)</u>
Profit for the year	<u>13,725</u>
Profit attributable to:	
Owner of patent	13,230
Non-controlling interest (20% x 2,475)	<u>495</u>
	<u>13,725</u>

(ii) **Bottle Nigeria Plc**  
**Consolidated statement of financial position as at December 31, 2019**

	<b>₦'000</b>	<b>₦'000</b>
<b>Non-current assets</b>		
Property plants and equipments (86.4 + 9)		95,400
<b>Current assets:</b>		
Inventories (22.5 + 5.4 + 3.6)	31,500	

Trade receivables (29.25 + 1.8 – 4.5)	26,550	
Cash and cash equivalents (17.55 + 1.575)	<u>19,125</u>	<u>77,175</u>
		<u>172,575</u>
<b>Equity and liabilities:</b>		
Equity attributable to owners of parent:		
Share capital		90,000
Retained earnings (W5)		<u>30,240</u>
		120,240
Non-controlling interest (W4)		<u>3,060</u>
Total equity		123,300
Current liabilities:		
Trade payables (40.95 + 1.350)	42,300	
Current tax liabilities (5.850 + 1.125)	<u>6,975</u>	<u>49,275</u>
		<u>172,575</u>

### Working Notes

#### Wk 1: Group structure

Bottle Nig Plc ..... 80% ..... Glass Ltd  
 NCI = 20%

	At Rep. Date	At Acq. Date	Post-Acq
	₦'000	₦'000	₦'000
<b>Wk 2: Net asset of subsidiary</b>			
Ordinary share	4,500	4,500	---
Retained earnings	<u>10,800</u>	---	<u>10,800</u>
	<u>15,300</u>	<u>4,500</u>	<u>10,800</u>

#### Wk 3: Determination of goodwill on acquisition

	<b>₦'000</b>
Consideration transferred by parent	3,600
NCI (20% x 4.5)	<u>900</u>
	4,500
Less: Net assets of subsidiary at acquisition	<u>(4,500)</u>
Goodwill	<u>Nil</u>

#### Wk 4: Valuation of NCI

	<b>₦'000</b>
NCI at acquisition (Wk 3)	900
Add: Share of post-acquisition profit (20% x 10,800)	<u>2,160</u>
	<u>3,060</u>

<b>Wk 5: Consolidated retained earnings</b>	<b>₦'000</b>
Bottle Nigeria Plc	22,500
Add: Share of post-acquisition profit (80% x 10,800)	8,640
Less: Unrealised profit on inventory (4.5 – 3.6)	<u>(900)</u>
Consolidated retained earnings	<b><u>30,240</u></b>

<b>Wk 6: Consolidated inventories</b>	<b>₦'000</b>
Bottle Nigeria Plc	22,500
Glass Limited	5,400
Goods in transit	4,500
Unrealised profit	<u>(900)</u>
Consolidated inventories	<b><u>31,500</u></b>

(iii) **Cash and cash equivalents**

- Cash – comprises cash in hand and demand deposits.
- Cash equivalents are short-term, highly liquid investments that are readily convertible to known amounts of cash and which are subject to an insignificant risk of changes in value.
- For the purpose of statement of cash flows, cash and cash equivalent are treated as being the same thing.
- Cash and cash equivalents are held in order to meet short-term cash commitment, rather than for investment purposes or other purposes. Examples of Cash and Cash Equivalents
- A bank deposit where some notice of withdrawal is required.
- Short term investments with maturity of three months or less from the date of acquisition.

**Examiner's Report**

The question tests candidates' knowledge of preparation of consolidated financial statements and explanation of cash and cash equivalents.

Majority of the candidates attempted the question and performance was above average.

The commonest pitfall was the inability of the candidates to show the calculations of how a NIL goodwill balance was arrived at.

Candidates are advised to ensure that they cover all sections of the syllabus for better performance in future examinations of the Institute.

## Marking Guide

	Marks	Marks
(a)i Consolidated statement of profit or loss:		
• Presentation of consolidated statement of profit or loss for the year ended December 1, 2019	5 2	
• Determination of revenue and cost of sales	<u>1</u>	
• Workings for other expenses and income tax expense		8
Consolidated statement of financial position:		
ii • Presentation of consolidated statement of financial position as at December 31, 2019	5	
• Determination of goodwill on acquisition	2	
• Calculation of non-controlling interests	1	
• Calculation of consolidated retained earnings	1	
• Calculation of consolidated inventories	<u>1</u>	
Cash and cash equivalents:		10
• Correct definition/explanation of cash and cash equivalents	1	
iii	<u>1</u>	2
• Correct examples of cash and cash equivalent		
<b>Total</b>		<b><u>20</u></b>

## SOLUTION 5

To: Finance Director  
 From: Chief Accountant  
 Subject: Analysis of performance of Pepeyoyo Ltd for years 2016 to 2018.

### Introduction:

Based on the information provided which shows the ratios calculated; the performance of our competitor is as follows:

(a) Performance of Pepeyoyo Ltd.

(i) **Profitability**

- The gross profit margin has remained relatively static over the three years period, although it has increased by approximately 1% in year 2018.
- Return on capital employed, while improving very slightly in year 2017 to 21.5%, dropped drastically to 17.8% in year 2018.
- The profit margin also fell in year 2018 in spite of the

improvement in gross profit margin. This might be due to a rise in the company's overheads which suggests that it was not well controlled.

- The utilisation of assets compared to turnover generated has declined reflecting a drop in trading activities between years 2017 and 2018.
- It is apparent that there was a dramatic increase in the trading/operational activities of Pepeyoyo limited between years 2017 and 2018, but then, there was a significant fall in year 2018. The reason for this fluctuation is not clear. It may be the effect of some kind of one-off events or it may be the effect of a change in product mix.
- Whatever the reason, it appeared the improved credit terms granted to customers (receivable collection period of 46 days to 64 days) did not result significantly improvement in the profit performance of the company.

(ii) **Liquidity**

- Both the current and quick ratios demonstrate an adequate working capital situation for the company.
- There has been an increased investment in inventories over the period which has been partly financed by long payment period to trade payables.
- The company's collection period has consistently been longer than the payment period. This is not a good situation which shows that its working capital management is poor and it seems that the company is experiencing liquidity challenges. Although, this also requires further investigation.

(iii) **Financial Stability**

- The debt/equity ratios of the company increased substantially from 18.5% in year 2016 to 32% in year 2017 and slightly declined to 30.9% in year 2018.
- However, poor performance of the company in terms of profitability led to the inability of the profit to adequately cover the interest on debt, despite the decline in the debt/equity ratios.

**Conclusion:** There are some areas that require further investigation on the company's performance in terms of the profitability, liquidity and financial stability.

Thanks.

Mr. XYZ

Chief Accountant

(b) **Areas that require further investigation**

**Loan notes**

- There is no indication as to why the company Pepeyoyo Ltd., raised more Loans than required and how it was used to finance their business operations.
- There could be need to obtain further details on interest rate(s), security given and repayment dates.

**Trading activities**

Level of fluctuations in the net profit margin and asset turnover may imply that the revenue has also fluctuated in quite an unusual manner, hence we may need information on their pricing policy, product mix and market share.

**Accounting policies and financial statements**

Accounting policies may have significant effect on certain items such as Overheads, depreciation, etc., therefore, we may need their statement of profit or loss, statement of cash flows and statement of financial position to have a better explanation for the ratios provided.

**Dividend policy**

We need dividend and retention policies of the company, to determine if they are reasonable, which could have assisted in moderating the company's debt/equity ratios.

**Further information**

It would be useful to breakdown some information in the financial statements when provided such as:

- Revenue by segment, marketers by geographical coverage areas etc.
- Expenses – showing depreciation, administration expenses and distribution costs, etc.
- Inventory with breakdown of raw materials, Work in Progress (WIP) and finished goods.

### Average industry ratios

- Average industry ratios is also necessary to determine if Pepeyoyo Ltd Performance is above or below the industry average.

### Examiner's Report

The question tests the ability of the candidates to interpret financial statements from relevant financial ratios.

Most of the candidates attempted the question, but performance was below average.

Some of the candidates were able to give correct interpretation to the performance of the company using the relevant financial ratios provided, while others could not.

The second part of the question which requires identification of areas to be investigated were poorly attempted, as candidates could not precisely identify the information that could complement the analysis made in part (a) of the question.

Candidates are advised to pay more attention to interpretation of financial ratios rather than emphasising ratio computations.

### Marking Guide

	Marks	Marks
(a) Drafting a report on performance of the Pepeyoyo Ltd:		
• Presentation in memo format	1	
• Introduction and conclusion of report	1	
• Four correct interpretation of profitability situation of the company	4	
• Two correct interpretation of liquidity position	2	
• Two correct interpretation of financial stability	<u>2</u>	10
(b) Areas which require further investigation:		
• Five areas identified	5	
• Explanations of the five areas identified.	<u>5</u>	10
<b>Total</b>		<b><u>20</u></b>

## **SOLUTION 6**

Qualitative characteristics for preparation and preparation of financial statements as specified by IASB's framework are:

### **(a)(i) Relevance**

- Information must be relevant to the decision-making needs of users.
- Information is relevant if it can be used for predictive and/or confirmatory purposes.
- It has predictive value if it helps users to predict what might happen in the future.
- It has confirmatory value if it helps users to confirm the assessment and prediction they have made in the past.
- The relevance of information is affected by its materiality.
- Information is relevant if omitting it or misstating it could influence decisions that users make on the basis of the financial information about a specific reporting entity.

### **(ii) Faithful representation**

- Financial reports represent economic phenomena (economic resources, claims against the reporting entity and the effects of transactions and other events and conditions that change those resources and claims) by depicting them in words and numbers.
- To be useful, financial information must not only represent relevant phenomena but it must also faithfully represent the phenomena that it purports to represent.

A perfectly faithful representation would have three characteristics. It would be:

- ❖ **Complete**:- the depiction includes all information necessary for a user to understand the phenomena being depicted, including all necessary description and explanation.
- ❖ **Neutral**:- the depiction is without bias in selection or presentation of financial information.
- ❖ **Free from error**:- where there are no errors or omission in the description of the phenomenon, and the process used to produce the reported information has been selected and applied with no errors in the process.

### **(iii) Comparability**

- Comparability is the qualitative characteristic that enables users to identify and understand similarities and differences among items.

- Information about reporting entity is more useful if it can be compared with similar information about other entities and with similar information about the same entity for another period or another date.
- Consistency is related to comparability, but it is not the same. Consistency refers to the use of the same method for the same items, either from period to period within a reporting entity or in a single period across entities.
- Consistency helps to achieve the goal of comparability.
- 

(b)(i) This item involves the characteristic of **faithful representation** and specifically reporting the substance of the transaction.

- As the lease agreement is not for the whole of the asset's useful economic life, Jaye Investment Nigeria Ltd. will experience the same risks and rewards as if it owned the asset, hence, it should recognise the right-of-used asset.
- Although the legal form of this transaction is rental, its substance is equivalent to acquiring the assets and raising a loan, in order for the financial statement to be reliable and faithfully presented. The transaction should be shown as an asset in Jaye Investment Nig. Ltd's statement of financial position with corresponding liability for the future lease rental payments. The statement of profit or loss should be charged with depreciation on the asset and a finance charge on the loan.
- This is an operating lease because the lease period of five (5) years doesn't cover substantially the useful economic life of the asset of fifteen (15) years. In line with IFRS 16 on lease, either operating lease or finance lease should be accounted for same way. The right to use the asset should be capitalised and the obligation to lease should also be recognised. The amount to be recognised is the present value (PV) of the annual amount payment of ₦150,000, which equals ₦750,000.
- This right to use the asset to be recognised is the PV of ₦750,000 at DCF of 10% for five (5) years is ₦568,618. This will be written down on yearly basis to income statement for the next five years. Yearly finance cost will be recognised as stated above and obligation to lease an amount ₦568,618 as liability will also be recognised at beginning of the year and will be written down at the implicit rate of interest on yearly basis as the payments are made, which recognised both finance cost and capital repayment.

(ii) This item involves the characteristic of **relevance**

- This situation questions whether historical cost accounting is more relevant to users than current value information, Jaye Investment Nig. Ltd's current method of reporting these events using purely historical cost based information (i.e showing an operating loss but not reporting the increase in

property values) is perfectly acceptable. However, the company could choose to revalue its hotel properties (which would subject it to other requirements).

- This option would still report an operating loss (probably an even larger loss than under historical costs if there are increased depreciation charges on the hotels) but the increase in value would be reported (in equity) arguably giving a more complete picture of performance.
- (iii) This item involves the characteristics of **comparability**. Changes in accounting policy should generally be avoided in order to preserve comparability, presumably, the directors have good reasons to believe the new policy presents a more reliable and relevant view.
- In order to minimise the adverse effect a change in accounting policy has on comparability, the financial statements (including the corresponding amount) should be prepared on the basis that the new accounting policy had always been in place (i.e. retrospective application). Thus, the assets (retail outlets) should include the previously expensed finance costs and the statement of profit or loss will no longer show a finance cost. Any finance costs relating to periods prior to the policy change (i.e. for two or more years before) should be adjusted for by increasing retained earnings brought forward in the statement of changes in equity. This would be in compliance with IAS 8 on Accounting Policies, Changes in Accounting Estimates and Correction of Errors.

### **Examiner's Report**

The question tests candidates' knowledge of qualitative characteristic of financial information in accordance with IASB's framework as well as application of such characteristics to specific financial transactions.

Most of the candidates attempted the question and performance was average.

Majority of the candidates were able to explain the qualitative characteristics of financial information in part (a) of the question, but could not apply the qualitative characteristics to specific transactions in part (b) and this led to loss of marks.

Candidates are advised to note that the examiners at the skills level of the Institute's examination will emphasise application of principles and theories to financial transactions and events.

## Marking Guide

	Marks	Marks
(a) Explanation of qualitative characteristics		
• Explanation of relevance	2	
• Explanation of faithful representation	2	
• Explanation of comparability	<u>2</u>	6
Treatment of events that took place in Jaye Investment Nigeria Limited:		
• Identification of correct qualitative characteristic applicable to each of the three events		
(b) • Two correct relevant points for event (i)	3	
• Two correct relevant points for event (ii)	5	
• Two correct relevant points for event (iii)	3	
	<u>3</u>	14
<b>Total</b>		<b><u>20</u></b>

# **THE INSTITUTE OF CHARTERED ACCOUNTANTS OF NIGERIA**

## **SKILLS LEVEL EXAMINATION – MAY 2021**

### **AUDIT AND ASSURANCE**

Time Allowed: 3<sup>1</sup>/<sub>4</sub> hours (including 15 minutes reading time)

**INSTRUCTION: YOU ARE REQUIRED TO ANSWER FOUR OUT OF SIX IN THIS QUESTIONS PAPER**

**SECTION A: COMPULSORY QUESTION (40 MARKS)**

#### **QUESTION 1**

Chukwuemeka & Co. (Chartered Accountants) has been auditors to GED Manufacturing Nigeria Plc. There have been some regulatory and compliance issues for which the company was sanctioned and paid penalties to the Financial Reporting Council of Nigeria.

At the board of directors meeting to consider the last annual report audited by the firm, some of the previous problems caused by the auditors were raised and discussed. Following the reoccurrence of such issues, it was proposed that another audit firm be engaged in addition to the present firm.

To achieve their objective, a bigger firm that has international affiliation was considered to take a leading role in a joint audit arrangement and to ensure appropriate compliance. Your firm has been approached for the appointment. A meeting was scheduled between your firm, Chukwuemeka & Co. and the executive management of GED Manufacturing Nigeria Plc.

After the meeting, your firm was subsequently appointed and the necessary formalities were properly followed. Your partner has directed that you liaise with Chukwuemeka & Co, to obtain the necessary materials for the preparation of the audit and that you review the prior year working papers to obtain an understanding of the issues. Your assessment of the documents obtained from the other auditor revealed the following, amongst others:

- (i) The work done on the process of dispatch of goods and invoicing was not considered sufficient and appropriate; and

- (ii) The IT operations of the company had weak controls such that it was possible for some staff to over-ride some of the existing controls

**Required:**

- a. Explain the risks inherent in the dispatch of goods and invoicing. (10 Marks)
- b. Discuss the control objectives and principal controls that are relevant to the process of dispatch of goods and invoicing (10 Marks)
- c. Explain the limitations of a joint audit (5 Marks)
- d. Discuss the benefits of audit carried out by an international affiliated audit firm (10 Marks)
- e. Explain briefly the importance of audit working papers (5 Marks)
- (Total 40 Marks)**

**SECTION B: OPEN-ENDED QUESTIONS (60 MARKS)**

**INSTRUCTION: YOU ARE REQUIRED TO ANSWER ANY THREE OUT OF FIVE QUESTIONS IN THIS SECTION**

**QUESTION 2**

Your partner invited you and other colleagues to a pre-audit meeting and informed you that the audit of Why Worry Agro Chemical Company Limited will soon commence. He stated that based on experience, the internal control system is not reliable. Therefore, it will be a transaction-based audit approach which will involve high level of substantive testing.

He further informed the engagement team that arrangements will be made for a brainstorming session on risk assessment and how to address the risk, using relevant audit assertions. The internal specialists on information technology and tax were invited to the meeting and you have two new audit trainees attached to you on the audit.

As the proposed audit senior personnel on the audit team,

**You are required to explain:**

- a. Substantive audit procedures (2 Marks)
- b. Purpose of risk assessment (6 Marks)

- c. Categories of financial statements audit assertions (6 Marks)
- d. Examples of substantive testing (6 Marks)

**(Total 20 Marks)**

### **QUESTION 3**

The partners of Integrity Professional Services have just obtained their practicing licenses from the Institute. The professional service firm has decided to engage in audit, taxation and consulting services. The firm has secured the approval of shareholders of some companies to be their auditors.

In view of the development, interested candidates have been invited to submit applications for appointment as audit seniors in the firm. You were shortlisted for an interview:

#### **Required:**

Explain the following:

- a. Factors to be considered before accepting the audit of a company (4 Marks)
- b. Stages in an audit of a company (6 Marks)
- c. The different roles of the Institute of Chartered Accountants of Nigeria and Federal Government of Nigeria in the regulation of external audit (10 Marks)

**(Total 20 Marks)**

### **QUESTION 4**

A regulatory review was conducted on SINAPE Microfinance Bank Limited in September, 2018. During the course of the review, numerous findings and recommendations were made in respect of the bank's ongoing compliance with various internal and external regulations, policies and guidelines.

It was noted from the reports generated that processing systems, internal controls over financial accounting and financial reporting were not in order. The review of the bank's process and procedures for transaction recognition was far from satisfactory. Furthermore, there were instances of management's override of controls in the financial reporting process.

The regulator required the bank to appoint a reputable firm of chartered accountants to perform a review of the internal control system and make a comprehensive recommendation.

Your firm has been appointed by the bank to perform the internal control reviews and as part of the exercise, a brainstorming forum has been arranged.

You have been nominated to make a presentation at the brainstorming forum.

**Required:**

Discuss the following:

- a. Principal methods available to record internal control systems (6 Marks)
- b. Categories of control activities (6 Marks)
- c. General information technology controls and application controls

(8 Marks)

**(Total 20 Marks)**

**QUESTION 5**

JAK Professional Services is a member firm of James Candle International in Cayman Islands. The member firm's practice review exercise has just been concluded. As part of the global firm, practice reviews are done yearly on selected engagement files where member firms review one another. Some of the issues included in the review notes raised on JAK Professional Services audit files are as follows:

- (i) Lack of sufficient and appropriate audit evidence regarding audit of cash and bank as well as inventory balances. This was partly due to the fact that no evidence existed in the file regarding physical cash and inventory count which were material;
- (ii) No proper documentation of confirmation replies received from banks, receivables and solicitors;
- (iii) No cash flow working documentation to show how the figures on the cash flow statements in the financial statements were arrived at;
- (iv) Improper documentation of how expected credit loss on financial instruments in the financial statements were arrived at; and
- (v) Figures in the financial statements could not be traced to the respective working papers.

As an experienced auditor, some of the trainees were not impressed about the report and have approached you for clarification.

**You are required to explain:**

- a. Meaning of 'sufficient and appropriate audit evidence' (5 Marks)
- b. Factors to be considered when deciding amount of audit evidence needed (4 Marks)
- c. What auditors should do in case of inadequate audit evidence (5 Marks)
- d. Reasons for sufficient and appropriate audit documentation (6 Marks)

**(Total 20 Marks)**

## QUESTION 6

Wakaso Nigeria Limited has experienced serious labour turnover which has affected the business of the company in the last twelve months. The most frustrating issue was the resignation of a well-tested Financial Controller of the company close to year-end. Wakaso management is noted for timely financial reporting and rendering of tax returns due to the efficiency and effectiveness of the Financial Controller who was also involved in the preparation of tax computations. The company has been finding it difficult to quickly recruit a new Financial Controller that will match the technical ability of the former accountant. The Managing Director of the company has invited the company's external auditors to a meeting, intimating them of the plan to employ their services to complete the write-up of the books of accounts and management account pending when they employ a good chartered accountant to handle the financial operations of the company.

The company's management, in order to ensure timely reporting, has also informed the auditors that to save time and meet cost of operations, the firm's staff will be accommodated in a five star hotel with mouth-watering offer of payment in lieu of feeding as recommended by the audit partner. In addition, the previous year's audit fee will be doubled and an additional twenty percent payment made if the management accounts and audit work could be completed within three weeks.

The partner of the firm has rejected the offers on the grounds of possible threat to independence. The Managing Director complained to you, as his brother, lamenting that accountants are not good business men and uncooperative.

### **Required:**

Discuss the following:

- a. Meaning of threats to independence (2 Marks)
- b. In relation to independence of auditors:
  - i. Fees and pricing (4 Marks)
  - ii. Financial interest (4 Marks)
  - iii. Contingent fees (2 Marks)
  - iv. Family and personal relationship (4 Marks)
- c. The reasons why the preparation of accounting records and management accounts constitute a threat to the independence of the auditors. (4 Marks)

**(Total 20 Marks)**

## **SECTION A**

### **SOLUTION 1**

- a) **The risks inherent in the dispatch of goods and invoicing include:**
- i. Goods may not be dispatched for some customers' orders;
  - ii. Goods may be dispatched twice for some customers' orders;
  - iii. Goods may be dispatched to customers without sufficient credits either because no credit terms have been agreed in the case of a new customer or because the order takes an existing customer above his credit limit;
  - iv. Goods not ordered at all may be packaged and dispatched;
  - v. Invoices may not be produced for goods that have been dispatched to some customers;
  - vi. Customers may claim that they did not receive the goods that have actually been delivered to them; and
  - vii. Returns from customers are not properly recorded, so that the client company does not know the correct figure for sales, net of sales returns.
- b) **The control objectives and principal controls that are relevant to the process of dispatch of goods and invoicing**

Control objectives include:

- i. Goods should be dispatched for every authorised customer or
- ii. Goods should not be dispatched twice for the same sales order;
- iii. Customers should acknowledge the receipt of goods supplied to them and confirm agreement with their orders;
- i. There must be an invoice for every dispatch note;
- ii. Invoices should be raised for the correct amounts; and
- iii. There must be authorised credit notes for all the goods returned by customers.

The principal controls that are relevant to the process of dispatch of goods and invoicing include:

- i. Dispatch notes or goods delivery notes (GDN) should be numbered sequentially and should be attached to a copy of a specific customer order. The GDN should be signed by an authorised member of the dispatch party staff. The sequential numbering of GDNs allows a check to be made that all deliveries can be accounted for;
- ii. Customers should sign a delivery note for the receipt of goods as confirmation of receipt of the goods supplied;

- iii. The signed copy of the delivery note should be attached to a copy of the dispatch note and customer order. Copies of these documents should be transferred to the accounts department after dispatch so that a sales invoice can be produced;
  - iv. Each sales invoice should be linked to a copy of the dispatch note and customer order or produced automatically from them;
  - v. Sales invoices should be sequentially numbered or the system should allocate sequential numbers to the documents;
  - vi. There should be segregation of duties and the individuals who are involved in the goods dispatch process should not be the same as those who prepare sales invoices or process the customer orders;
  - vii. Credit notes should be sequentially numbered and authorized; and
  - viii. There should be periodic checks by someone in the accounts department on the accuracy of invoices or strong IT controls to ensure the accuracy of invoices.
- c. **Limitations of a joint audit include:**
- i. Shared legal responsibility: Liability for co-auditors' negligence may arise;
  - ii. Lack of control: Another firm may have dissimilar audit procedures that may be unsatisfactory to the other firms, thereby requiring higher standard of supervision and control;
  - iii. Personality clash: Any shared work or task may lead to personality clashes or difficulty in agreeing on a joint approach;
  - iv. Cost: Joint audit may be more expensive to the client; and
  - v. Fee sharing: Problems may exist in fee sharing.
- d. **Benefits of audit by an international affiliated audit firm include:**
- i. Audit risk may reduce as a result of the technical competence and exposure of the international affiliated audit firm;
  - ii. Synergy of affiliation with international audit firm may enhance robust and consistent quality control;
  - iii. International affiliated audit firms give opportunity to audit clients and create international presence or recognition;
  - iv. It ensures better training for audit staff and gives them international exposure; and
  - v. Probability of audit failure is reduced and consequently, damages in case of negligence will be reduced.

- e. **Importance of audit working papers can be briefly explained as follows:**
- i. **Quality of audit:** It enhances quality of the audit;
  - ii. **Audit evidence:** It facilitates the effective review and evaluation of the audit evidence obtained and conclusions reached before the audit report is finalized. Documentation prepared at the time the work is performed is likely to be more accurate than documentations prepared later;
  - iii. **Planning of audit:** It assists the audit team to plan and perform the audit;
  - iv. **Supervision:** It assists supervisors in directing and supervising audit work;
  - v. **Accountability:** It ensures members of the audit team are accountable for their work;
  - vi. **Record of important matters:** It helps in keeping record of matters of continuing significance to future audits; and
  - vii. **Training:** It enables an experienced auditor with no previous connection with that audit to conduct quality control reviews or other inspections of the audit work.

### **Examiner's Report**

The question, a compulsory one, is in five parts. It tests candidates' knowledge on dispatch of goods and invoices, related control objectives and principal controls thereto. It also tests their knowledge on joint audit, international audit firm and audit working papers.

All the candidates attempted the question. Candidates' understanding of the question was generally poor for parts (a) to (d) and fair for part (e), hence the marks earned were generally poor.

The pitfalls observed were the inability of the candidates to relate their studies in internal control to practical scenarios and their lack of knowledge on a joint audit and the benefits of audit by an international affiliated audit firm.

Candidates are advised to make use of the Institute's Study Text properly and endeavour to apply their knowledge to practical scenarios and circumstances.

## Marking Guide

	Marks	Marks
(a) 1 mark each for any of the 10 risks		10
(b) 1 mark each for any 5 control objectives	5	
1 mark each for any 5 principal controls	<u>5</u>	10
(c) 1 mark each for 5 limitations stated		5
(d) 1 mark each for any 5 benefits stated		10
(e) 1 mark each for any 5 points stated on importance of working papers		<u>5</u>
	<b>Total</b>	<b><u>40</u></b>

## **SECTION B**

### **SOLUTION 2**

- a) **Substantive audit procedures:** Substantive audit approach involves testing and vouching to supporting documents of every item in the financial statements. The approach is still sometimes used for small entities with weak internal controls, some specialised audits and if there are few transactions that are subject to audit tests.

Substantive procedures are audit procedures performed to detect material misstatements in the presentation and disclosures of the figures reported in the financial statements.

Substantive audit procedures seek to obtain direct audit evidence of the correct treatment of a transaction, a balance, an asset, a liability or any other item in the books of accounts and records of an entity.

- b) **Purpose of risk assessment:** The risk assessment process will provide a basis for designing and implementing responses to assessed risks of misstatement whether due to fraud or error, through understanding the entity and its environment including its internal controls.

**Issues to consider in risk assessment include the following:**

- i. The areas where risk of misstatement appear to exist and the nature of the risk;
- ii. When an error should be considered material and when it may be ignored;
- iii. What aspects of the audit will be the most difficult to plan because of the high risk of misstatement;
- iv. Assessment of inherent risks and control risks and the identification of significant audit areas;
- v. Setting materiality levels;
- vi. The possibility of material misstatements including those arising because of fraud rather than unintentional error; and
- vii. The identification of complex accounting areas particularly those involving accounting estimates that can be difficult to audit.

c) **Categories of audit assertions:** These include the following:

**Assertions about class of transactions and events and related disclosures:**

- i. **Occurrence:** Transactions and events that have been recorded or disclosed have occurred and such transactions and events relate to the entity;
- ii. **Completeness:** All transactions and events that should have been recorded have been included in the financial statements have been included;
- iii. **Accuracy:** Amounts and other data relating to recorded transactions and events have been recorded appropriately and all related disclosures have been appropriately measured and described;
- iv. **Cut-Off:** Transactions and events have been recorded in the correct accounting period;
- v. **Classification:** Transactions and events have been classified and recorded in the proper accounts; and
- vi. **Presentation:** Transactions and events are appropriately aggregated or disaggregated and clearly described; and related disclosures are relevant and understandable in the context of the requirements of the applicable financial reporting framework.

**Assertions about account balances and related disclosures**

- i. **Existence:** Assertion to confirm existence of assets, liabilities and equity interests;
- ii. **Rights and obligations:** The entity holds or controls the rights to assets and liabilities are those of the entity;
- iii. **Completeness:** All assets, liabilities and equity interests that should have been recorded have been recorded and all related disclosures that should have been included in the financial statements have been included;
- iv. **Accuracy, valuation and allocation:** Assets, liabilities and equity interests have been included in the financial statements at appropriate amounts and any resulting valuation or allocation adjustments are appropriately recorded and related disclosures have been appropriately measured and described;
- v. **Classification:** Assets, liabilities and equity interests have been classified and recorded in the proper accounts; and
- vi. **Presentation:** Assets, liabilities and equity interests are appropriately aggregated or disaggregated and clearly described and related disclosures are relevant and understandable in the context of the requirements of the applicable financial reporting framework.

- d. **Examples of substantive testing** include the following:
- i. Bank confirmation;
  - ii. Accounts receivables confirmation;
  - iii. Account payable confirmation;
  - iv. Inquire of management regarding the collectability of customer accounts;
  - v. Matching customer orders to invoices billed;
  - vi. Matching collected funds to invoices billed;
  - vii. Observing a physical inventory count;
  - viii. Confirming with experts that the fair values assigned to assets obtained through a business combination are reasonable;
  - ix. Confirmation of inventories held by third parties; and
  - x. Analytical procedures.

### **Examiner's Report**

The question tests candidates' knowledge on substantive audit procedure, risk assessment and audit assertions.

About 80% of the candidates attempted the question. The candidates performed below average.

The commonest pitfall was their exhibiting lack of knowledge on part (a) – risk assessment and part (c) audit assertions.

Candidates are advised to prepare well for future examinations by making use of the Institute's Study Text and Pathfinder.

### **Marking Guide**

	<b>Marks</b>	<b>Marks</b>
(a) 2 marks for definition of substantive procedures		2
(b) 2 marks for purpose of risk assessment	2	
1 mark each for any 4 issues in risk assessment	<u>4</u>	6
(c) 1 mark each for any 3 points about transaction assertion	3	
1 mark each for any 3 points on balances assertion	<u>3</u>	6
(d) 1 mark for any 6 examples of substantive testing		<u>6</u>
<b>Total</b>		<b><u>20</u></b>

### **SOLUTION 3**

a) **Factors to be considered before accepting an audit**

Auditors should consider the following factors:

- i. Before accepting a new client relationship, the auditor should consider whether acceptance would create any threats to compliance with the fundamental principles. Potential threats to integrity or professional behaviour may be created from questionable issues associated with the client (its owners, management and activities). Client's issues that, if known, could threaten compliance with the fundamental principles include:
  - Client involvement in illegal activities, that is, money laundering, dealing in illegal drugs, etc.
  - Lack of integrity in the way business transactions are being
  - carried out, for example, dishonesty; and questionable financial reporting practices.
- ii. Auditors should agree to provide only those services that they are certified and competent to perform. Before accepting a specific client engagement, an auditor should consider whether acceptance of the audit would create any threats to compliance with fundamental principles for example, a self-interest threat to professional competence and due care is created if the engagement team does not possess or cannot acquire the competencies necessary to properly carry out the engagement;
- iii. The auditor should take permission from the client to communicate with the former auditor (if there is any) to establish if there are any matters that he should be aware of when deciding whether or not to accept the appointment; and
- iv. An auditor in public practice should evaluate the significance of identified self interest threat and if found significant, must apply the following safeguards before accepting the engagement:
  - Acquiring an appropriate understanding of the nature of client business, the complexity of the operation, the specific requirement of the engagement and the purpose, the nature and the scope of work to be done;
  - Acquiring the knowledge of relevant industries or subject matters;
  - Assigning sufficient staff with necessary competencies;
  - Using experts where necessary;
  - Agreeing on a realistic time frame for the performance of the engagement; and
  - Complying with quality control policies and procedures

designed to provide assurances that specific engagement is accepted, only when they are performed competently.

- b) **Stages in an audit:** An audit usually has four main stages which are:
- i. **Planning stage:** This is a stage when the audit planning memorandum is prepared. An audit plan should be prepared as a means of achieving audit objectives efficiently and effectively. The plan should contain details on staffing, timing and scope of the audit among other things. Audit plan will set out the procedures to be used in order to assess the risk of misstatement in the entity's accounting records/financial statements and plan further audit procedures for each material audit area;
  - ii. **Internal control review:** Modern auditing is, whenever possible, based on a systems-based approach where the auditor relies on the accounting systems and the related controls to ensure that transactions are properly recorded.  
Before he can rely on the systems and controls that are in place, he must establish what those systems and attendant controls are and carry out an evaluation of the effectiveness of the controls;
  - iii. **Internal control testing:** The systems-based audit approach is based on the premise that accounting systems and other related controls are sufficient to record transactions properly. The auditor must, therefore, test the controls in order to satisfy himself that his approach to the audit is valid. The degree of effectiveness of an internal control system will depend on whether the control system is able to prevent material misstatements or is able to detect and correct material misstatements if they occur; and whether the controls are being operated properly by the client's management and other employees;  
If the auditor concludes that the system of controls is weak and the controls cannot be relied on, he will carry out substantive procedures which is a form of transactions- based audit test approach; and
  - iv. **Reporting:** This is the stage that the auditor will communicate in writing all matters of non-compliance of material importance to those charged with governance. The auditor will express his opinion which could either be in form of unmodified or modified report. The modified /qualified opinion can be "except for", "disclaimer" or "adverse".

**c. Roles of ICAN and Federal Government of Nigeria (FGN) in regulating external audit:**

External audit is regulated by both the Institute of Chartered Accountants of Nigeria (ICAN) and the (FGN).

**i. Regulation by ICAN (self regulation)**

Eligibility to act as an external auditor is usually determined by membership of an appropriate regulatory body such as ICAN. The roles of such regulatory body include the following:

- Offering professional qualifications for auditors to provide evidence that auditors possess a minimum level of technical competence; and
- Establishing procedures to ensure that the professional competence of auditors is maintained by ensuring that audits are performed only by fit and proper persons, members carry out their audit work in accordance with appropriate technical and ethical standards, members remain technically competent and up to date with modern auditing practice. The body provides procedures for monitoring and enforcing compliance by its members with its rules and regulations.

**ii. Regulation by Federal Government of Nigeria (FGN)**

- FGN may appoint a public body with similar responsibilities to a self-regulating professional body. The public body may establish rules and procedures for:
  - Approving/authorising individuals to perform audit work;
  - Ensuring that authorised auditors have the necessary minimum skills and knowledge to carry out their audit work to a proper standard; and
  - Handling complaints and taking disciplinary measures against auditors where appropriate.
- The FGN may enact statutes or laws to establish that certain individuals are ineligible to act as an external auditor in the context of a given company or entity.
- The FGN establishes relevant statutory department or agency that regulates audit practice especially in public interest entities.

## Examiner's report

The question tests candidates' knowledge on audit acceptance, stages in an audit and regulatory issues of external audit.

About 60% of the candidates attempted the question. Their understanding of the question was fair in parts (a) and (b) but poor in part (c), hence, the low marks obtained in part (c).

The commonest pitfall was the candidates' lack of deep knowledge on the regulatory roles of the Institute of Chartered Accountants of Nigeria (ICAN) and Federal Government of Nigeria which caused switching of the solutions for each other.

Candidates are advised to study well for subsequent examinations before attempting them.

## Marking guide

	Mark	Total
(a) 2 marks each for any 2 factors of audit acceptance		4
(b) 2 marks each for any 3 stages in an audit		6
(c) 2 ½ marks each for any 2 key roles of ICAN	5	
(d) 2 ½ marks each for any 2 roles of FGN	<u>5</u>	<u>10</u>
		<u>20</u>

## SOLUTION 4

- a) Principal methods of recording internal control systems include the following:
- i) **Narrative notes:** Narrative notes are a written description of the control system and the controls that are in place. They are used mainly to make a record of the control activities involved in processing transactions. Narrative notes are simple to prepare but may become lengthy and time consuming to prepare initially;
  - ii) **Systems flowchart:** Systems flowcharts provide a representation of accounting systems in the form of a diagram. For each type of transaction, they show the documents generated, the processes applied to the documents and the flow of the documents between the various departments involved. Flowcharts, therefore, show the flow of work by showing how documents are transferred within a system and how they are used; and

- iii) **Questionnaire:** Questionnaire is widely used by auditors to document systems. This can be prepared in advance as standard documents. They are also ideally suited for use by an auditor in an electronic form which means that a standard questionnaire is available and ready for use on the auditor's laptop computer. A questionnaire is a list of questions about controls in a particular aspect of operations or accounting. The two main types of questionnaire are internal control questionnaire and internal control evaluation questionnaire and both of them have different objectives.
- b. Categories of control activities:- ISA 315 categorises internal controls into the following types:
- i) **Performance review:** These include reviews and analysis of actual performance against budgets, forecasts and prior period performance. Most of these control activities will be performed by management and are often referred to as management controls. They include supervision. by management of the work of subordinates, management review of performance and control reporting;
  - ii) **Information processing:** A variety of controls are used to check the accuracy, completeness and authorisation of transactions. These controls are split into two broad groupings which are application controls and general IT controls;
  - iii) **Physical controls:** These include controls over the physical security of assets and records to prevent unauthorised use, theft or damage. Examples include limiting access to inventory areas to a restricted number of authorised personnel and requiring authorisation for access to computer programs and data files; and
  - iv) **Segregation of duties:** This control involves assigning different People the responsibilities of authorising and recording transactions and maintaining the custody of assets. This reduces the likelihood of an employee being able to both carry out and conceal errors or fraud.
- c) i) **General information technology (IT) controls:** General IT controls policies and procedures that relate to many different applications. They support the effective functioning of application controls by ensuring the continued proper operations of IT systems. If the general IT Controls are weak, it is unlikely that processing undertaken by the system will be complete and accurate because the IT controls apply to most of the IT applications.

The main categories of general controls that an auditor would expect to find in a computer based information systems are:

- Controls over the development of new computer information systems and applications;
- Controls over the documentation and testing of changes to programs;
- The prevention or detection of unauthorised changes to programs (for example by an employee committing fraud or by a hacker accessing the system);
- Controls to prevent use of incorrect data files or programs;
- Controls to prevent unauthorised amendments to data files; and
- Controls to ensure that there will be continuity in computer operations and that the system will not “breakdown” or cease to be operational.

- ii) **Application Controls:** These apply to the processing of individual applications (such as revenue, purchases or payroll). These controls help to ensure that transactions are authorised and are completely and accurately recorded and processed. These controls could be manual or computerised depending on the system in question.

In IT systems, application controls share a number of common features regardless of the particular application involved. This common features are categorised as:

- Input controls (controls over input data);
- Processing controls;
- Data file controls; and
- Controls over the output from the system (Output controls).

### **Examiner’s report**

The question is in three parts. It tests candidates’ knowledge on internal control.

Most candidates avoided this question as about 20% attempted it. Their performance was generally poor, especially in part (c).

The commonest pitfall was candidates’ inability to proffer correct solution to general information technology controls and application controls.

Candidates are advised to adequately cover all areas of the syllabus noting that the information technology is an important area of modern auditing.

## Marking guide

	Marks
(a) 2 points each for the 3 methods of recording internal control	6
(b) 2 points each for any 3 categories of control activities	6
(c) 2 points each for any 4 controls of IT	<u>8</u>
<b>Total</b>	<b><u>20</u></b>

## SOLUTION 5

- a) Sufficient relates to the quantity of evidence while appropriate relates to the quality (relevance and reliability) of the evidence. The auditor will need to exercise professional judgment on both aspects: the quantity and the quality of evidence, for example:
- When is there enough evidence to support a conclusion?
  - What is the quality of a given piece of evidence?
  - Is this sufficient to justify the audit opinion?

The two characteristics of quantity and quality are also inter-related: an auditor may be able to reach a conclusion based on a smaller quantity of high quality evidence, but a larger quantity of lower quality evidence may be required to reach the same conclusion.

- b) Deciding how much audit evidence will be sufficient, or whether existing audit evidence is sufficient, is a matter of judgment by the auditor and the quantity of audit evidence required will depend to a large extent on:
- i. The quality of that evidence;
  - ii. The seriousness of the risk that the financial statements might not give a true and fair view: when this risk is high, more audit evidence will be required;
  - iii. The materiality of the item;
  - iv. The strength of the internal controls in the client's accounting systems; and
  - v. The sampling method that the auditor will use to obtain the audit evidence: the chosen method will affect the size of the audit sample that the auditor requires.

c) **Auditors' role in case of inadequate audit evidence**

Having obtained audit evidence, the auditor must assess whether it is sufficient to allow him to reach the opinion that the financial statements give a true and fair view. If the auditor decides that the evidence obtained is insufficient to reach this opinion, he may take any of the following actions, depending on the circumstances:

- i. He may obtain additional audit evidence by means of: more tests of controls and more substantive testing procedures;
- iii. Discuss the problem with the client's senior management or the audit committee or those charged with governance so that they are aware of the problem;
- iv. Indicate the findings from the audit evidence obtained - these should be included in the management letter prepared by the auditor for the client;
- v. Make enquiries of management and verify management's responses, and perform other audit procedures as necessary; and
- vi. Modify the audit report. This should only be used as an extreme measure, which the auditor should only use if other methods fail to resolve the problem.

c) **Reasons for preparing sufficient and appropriate audit documentation:**

ISA 500: *audit evidence* sets out the objective of the auditor as being to design and perform audit procedures on a timely basis and in such a way to enable him to:

- i. Enhance the quality of the audit, and
- ii. Facilitate the effective review and evaluation of the audit evidence obtained and conclusions reached, before the audit report is finalised.

Documentation enables the auditor record the audit evidence which serves as basis for determination of the audit opinion.

Documentation prepared at the time the work is performed is likely to be more accurate than documentation prepared later.

Other purposes of audit documentation include the following:

- i. Assisting the audit team to plan and perform the audit;
- ii. Assisting supervisors in directing and supervising audit work;
- iii. Ensuring members of the audit team are accountable for their work;

- iv. Keeping a record of matters of continuing significance to future audits; and
- v. Enabling an experienced auditor, with no previous connection with that audit, to conduct quality control reviews or other inspections i.e. by understanding the work that has been performed and the conclusions that have been reached.

### **Examiner's report**

The question tests candidates' knowledge on audit evidence and audit documentation.

About 80% of the candidates attempted the question. The understanding of the question was fair.

The commonest pitfall was that candidates' solutions in parts (b) to (d) were generic and not related to the factors when deciding the amount of audit evidence needed, and reaction of the auditor to inadequate audit evidence.

Candidates are advised to answer questions according to the requirements of the examiner to earn maximum points.

### **Marking guide**

	<b>Marks</b>
(a) Meaning of sufficient and appropriate audit evidence.	5
(b) 1 mark each for 4 factors for amount of audit evidence.	4
(c) 1 mark each for 5 auditors' action on inadequate audit evidence.	5
(d) 1 mark each for 6 reasons for audit documentation.	6
<b>Total</b>	<b><u>20</u></b>

### **SOLUTION 6**

#### **Wakaso Nigeria Limited**

- a. Meaning of threats to Independence: In audit practice, any development or relationship that may influence the auditors sense of judgment is usually referred to as threat to auditor's independence. For example, in this case, the company offering undue hospitality by way of accommodation and promises to double audit fee certainly constitutes a threat to auditor's independence.

- b. **Independence of auditors**
- i. **Fees and pricing:** The auditor should not charge fees outside the basis approved by the Institute. The firm should not accept an engagement whose fee will be more than 25% of the firm's total fee income unless as exempted by the Institute. The auditor should not depend so much on a fee from a client to the extent that he will be afraid of losing that particular assignment and may want to compromise his integrity.
  - ii. **Financial interest:** An auditor should not have financial interest in a client's business except if such a client is a financial institution and the transaction will be done at arm's length. Financial interest includes lending to or borrowing from a client, subscribing to bonds issued by the company and having proprietary capital in the company.
  - iii. **Contingent fees:** The auditor should not accept assignment where fees payable are contingent upon the outcome of an event or satisfactory completion of an assignment to be decided by the client. For example, in this case, the fees will be paid provided the auditor completes the audit within three weeks. Such a fee, is contingent and should not be acceptable to the auditor.
  - iv. **Family and personal relationship:** Family refers to members of immediate family of the auditor, such as spouses, parents and children. Personal relationship implies persons that the auditor has personal relationship with other than members of his immediate family that can influence his judgement and opinions.
- c. The reasons why the preparation of accounting records and management accounts constitute a threat to independence of the auditors are:
- i. Preparation of accounting records and management accounts are the responsibility of management while the auditor's duty is to audit these accounts and express an independent opinion on the accounting records and statements examined. If the accounting records and the management accounts are prepared by the auditor, his opinion on such cannot be independent since the statements were prepared and audited by the auditors as there may be self review threats; and
  - ii. It is not sufficient for the auditor to be independent, he must be seen to be independent, if the auditor prepares the accounting records and the management accounts and at the same time, he audits the statements, the parties using the statements may not believe in the auditors' independence even when he has complied with all relevant legal and ethical standards.

## Examiner's report

The question test candidates' knowledge on threats to independence of auditors.

About 85% of the candidates attempted the question and they generally exhibited very fair understanding of the requirements of the question.

The candidates' commonest pitfall was juxtaposing of solutions in the question which cost them valuable points.

Candidates are advised to study well to avoid giving wrong solutions to questions. They should also make use of ICAN Study Text adequately.

## Marking guide

	<b>Marks</b>	<b>Marks</b>
(a) Meaning of threats to independence		2
(b) i. 4 marks for fees and pricing	4	
ii. 4 marks for financial interest	4	
iii. 2 marks for contingent fees	2	
iv. 4 family and personal relationship	4	14
(c) 2 marks each for 2 points on reasons for threat to independence		<u>4</u>
		<b><u>20</u></b>

# THE INSTITUTE OF CHARTERED ACCOUNTANTS OF NIGERIA

## SKILLS LEVEL EXAMINATION – MAY 2021

### PERFORMANCE MANAGEMENT

Time Allowed: 3<sup>1</sup>/<sub>4</sub> hours (including 15 minutes reading time)

**INSTRUCTION:** YOU ARE REQUIRED TO ANSWER FOUR OUT OF SIX QUESTIONS IN THIS PAPER

**SECTION A:** COMPULSORY QUESTION (40 MARKS)

#### QUESTION 1

The Managing Director of NTAMS Manufacturing Company Limited located in Lagos attended a seminar titled “optimising scarce resource utility in a manufacturing setting with particular reference to linear programming”. On his return after three days of the programme, he called for a management meeting to discuss his experiences at the seminar in view of the board decision to produce two major products in the coming years.

The following information are made from the work of a research team earlier conducted by a group of external research experts.

The expected products are “Biggi” and “smalli”. The expected costs statistics are as follows:

	<b>Biggis</b>	<b>₦</b>	<b>Smallis</b>	<b>₦</b>
Material costs	(5kg @ ₦50/kg)	250	(3kg @ ₦50/kg)	150
Labour costs:				
Machining time	(4 hours @ ₦15/Hr)	60	(2hours @ ₦15/Hr)	30
Other Processing Time	(4hours @ ₦10/Hr)	40	(5 hours @ ₦10/Hr)	50

The company expects to maintain a pricing policy that is hinged on total cost of production plus 20% mark up on cost. The Company further expects to incur annual period overhead of ₦10,000,000 with normal production expectation of 200,000 units of Biggis and 100,000 units of Smallis absorbing the overhead on 3 to 2 basis respectively.

It is expected that in the forth coming year, the company will have the following resources available

Materials 1,800,000kgs  
 Machine time 800,000 hours  
 Other Process time 1,400,000 hours

**You are required:**

As the management accountant

- a. Explain briefly the concept of linear programming and usefulness of the model (5 Marks)
- b. Compute the Prices that will be adopted by the company for the two products using the company pricing policy (5 Marks)
- c. Advise the company on the output that needs to be produced to maximise its total profit, supporting your answer with full financial analysis (10 Marks)
- d.
  - i. Explain the meaning of 'shadow prices' and comment on the usefulness of it and its limitation (5 Marks)
  - ii. Calculate the shadow prices of the constraints (7 Marks)
- e. Assuming the company's position in (c) is maintained for three years with an investment cost of ₦45,000,000 on the day of the commencement of manufacturing business, using a cost of capital of 15%:
  - i. Can this venture be justified for the period? (4 Marks)
  - ii. What is the breakeven discount factor for this project? (4 Marks)

**(Total 40 Marks)**

**SECTION B: OPEN-ENDED QUESTIONS (60 MARKS)**

**INSTRUCTION: YOU ARE REQUIRED TO ANSWER ANY THREE OUT OF FIVE QUESTIONS IN THIS SECTION**

**QUESTION 2**

PQR Plc is preparing its budgets for next year. It has already prepared forecasts of demand levels for its product range. These are as follows:

	Price ₦	Forecast 1 Quantity	Price ₦	Forecast 2 Quantity
Product A	10.00	500	15.00	350
Product B	20.00	800	25.00	700
Product C	30.00	2,200	40.00	1,000

You are to assume that only one of either forecast 1 or forecast 2 would be accepted. The expected variable unit costs of each product are as follows:

	Product A	Product B	Product C
	₦	₦	₦
Direct materials (50k per kg)	2.00	3.50	7.00
Direct labour	3.00	5.00	7.40
Variable overhead	<u>1.50</u>	<u>2.50</u>	<u>3.70</u>
	<u>6.50</u>	<u>11.00</u>	<u>18.10</u>

General fixed costs are budgeted as ₦20,000 for the year and no specific fixed costs are expected for any product.

All three products use the same direct material which is expected to be limited in supply to a maximum of 22,020 kgs in the budget year.

**Required:**

- a. Recommend, with supporting calculations, whether forecast 1 or forecast 2 should be adopted for the budget period. (11 Marks)
- b. Prepare a report, addressed to the managing director, to explain the budget preparation process, with particular reference to:
  - i. The principal budget factor (3 Marks)
  - ii. The budget manual (3 Marks)
  - iii. The role of the budget committee (3 Marks)

**(Total 20 Marks)**

**QUESTION 3**

Some time ago, Robert launched a new product. At first, sales were good but now the figures are causing concern. Robert wants a more accurate sales forecast to produce detailed cash forecasts.

Since there are some seasonality present in the raw data, the series for sales shown below represents the underlying trend based on an averaging process:

Year	Quarter	Trend point	Sales (Cartons)
		x	y
2016	3 <sup>rd</sup>	1	10,000
2016	4 <sup>th</sup>	2	10,760
2017	1 <sup>st</sup>	3	10,920
2017	2 <sup>nd</sup>	4	11,000
2017	3 <sup>rd</sup>	5	11,050
2017	4 <sup>th</sup>	6	11,080
2018	1 <sup>st</sup>	7	11,085
2018	2 <sup>nd</sup>	8	11,095
2018	3 <sup>rd</sup>	9	11,120
2018	4 <sup>th</sup>	10	11,130

On average, quarters 1 and 3 are 5% and 6% respectively above trend whilst quarters 2 and 4 are respectively 2% and 9% below trend. Some preliminary calculations on the above ten observations have been carried out and the results are summarised below:

Results from ten periods' observations:

Linear regression	$y = a + bx$
Slope	= 82.67
Intercept	= 10,472.33
Coefficient of determination	= 0.535

It is required to make forecasts of sales for quarters 3 and 4 in 2019 and for quarters 1 and 2 in 2020 but there is some discussion on whether the ten-period data shown above are suitable for forecasting or whether only the last five periods would provide a better basis for forecasting. Linear analysis of the last five periods only gives the following intermediate results:

Results of last five periods' observations:

$$\begin{aligned}\Sigma y &= 555.10 \\ \Sigma x^2 &= 330 \\ \Sigma y^2 &= 61,627.40 \\ \Sigma xy &= 4,442.15\end{aligned}$$

**Note:** the y values have been scaled down by 100 times for ease of calculation.

**Required:**

a.

- |      |             |                           |                                                                                                      |
|------|-------------|---------------------------|------------------------------------------------------------------------------------------------------|
|      | Probability | No of pupils joining late |                                                                                                      |
|      | 0.2         | 80                        | Forecast the sales of the four quarters required using the period observations results.<br>(8 Marks) |
|      | 0.3         | 30                        |                                                                                                      |
| ten- | 0.5         | 52                        |                                                                                                      |
- b. Prepare similar forecasts based on the last five periods' observations (8 Marks)
- c. Explain which forecasting bases produce the better forecast (4 Marks)
- (Total 20 Marks)**

#### QUESTION 4

Adrac Community School was founded by Adrac Community Resident Association of Garki, Abuja, Nigeria. The school is being supervised by a board of governors made up of selected experienced members of the community. The school is not allowed to charge the pupils any fee as it is a community project donated to assist members of the community.

Adrac Community Residents Association pays the school ₦21,000 for each child registered at the beginning of the school year, which is September 1, and ₦18,000 for any child joining the school part-way through the year. The school does not have to refund the money to the association if a child leaves the school part-way through the year. The number of pupils registered at the school on September 1, 2019 is 720, which is 10% lower than the previous year. Based on past experience, the probabilities for the number of pupils starting the school part-way through the year is as follows:

The school's headmistress normally prepares annual budget for consideration of the board of governors. Since she is not too comfortable with figures, she does not understand how to use the probability distribution provided for her annual budget. Therefore, she just used simple average for her calculation of number of pupils expected to join late. The revenue budget for 2019/2020 submitted by the headmistress is as follows:

	<b>Pupils</b>	<b>Rate per pupil</b>	<b>Total income ₦'000</b>
Pupils registered at beginning of school year	720	₦21,000	15,120
Average expected number of new joiners	54	₦18,000	<u>972</u>
			<b><u>16,092</u></b>

The headmistress uses incremental budgeting to budget for her expenditure, taking actual expenditure for the previous year as a starting point and simply adjusting it for inflation, as shown below.

	<b>Note</b>	<b>Actual cost for y/e 30 June 2019 ₦'000</b>	<b>Inflationary adjustment</b>	<b>Budgeted cost y/e 30 June 2020 ₦'000</b>
Repairs and maintenance	1	880	+3%	906.4
Salaries	2	12,400	+2%	12,648
Capital expenditure	3	1,300	+6%	<u>1,378</u>
Total budgeted expenditure				<u>14,932.4</u>
Budget surplus				<u>1,159.6</u>

### Notes

- i. ~~₦600,000~~ of the costs for the year ended 30 June 2019 related to standard maintenance checks and repairs that have to be carried out by the school every year in order to comply with the local government health and safety standards. These are expected to increase by 3% in the coming year. In the year ended 30 June 2019, ~~₦280,000~~ was also spent on redecorating some of the classrooms. There will be no redecoration in the coming year.
- ii. One teacher earning a salary of ~~₦520,000~~ left the school on 30 June 2019 and there are no plans to replace her. However, a 2% pay rise will be given to all staff with effect from 1 December 2019.
- iii. The full ~~₦1,300,000~~ actual costs for the year ended 30 June 2019 related to improvements made to the school building. This year, the canteen is going to be substantially improved, although the extent of the improvements and level of service to be offered to pupils is still under discussion. There is a 0.7 probability that the cost will be ~~₦1,450,000~~ and a 0.3 probability that it will be ~~₦800,000~~. These costs must be paid in full before the end of the year ending 30 June 2020.

The school's board of governors, who review the budget, are concerned that the budget surplus has been calculated incorrectly. They believe that it should have been calculated using expected income, based on the probabilities provided, and using expected

expenditure, based on the information provided in notes i to iii. They believe that incremental budgeting is not a reliable tool for budget setting in the school since, for the last three years, there have been shortfalls of cash despite a budget surplus being predicted. Since the school has no other source of funding available to it, these shortfalls have had serious consequences, such as the closure of the school kitchen for a considerable period in the last school year, meaning that no meals were available to pupils. This is thought to have been the cause of the 10% fall in the number of pupils registered at the school on 1 September 2019.

**Required:**

- a. Redraft the school's budget for the year ending 30 June 2020 based on the views of the board of governors. (6 Marks)
- b. Discuss the advantages and disadvantages of using incremental budgeting (4 Marks)
- c. Discuss the **THREE** main steps involved in preparing a zero-based budget (6 Marks)
- d. Discuss the extent to which zero-based budgeting could be used by Adrac Community School to improve the budgeting process (4 Marks)

**(Total 20 Marks)**

**QUESTION 5**

A national boutique chain sells a wide range of high quality customised fashion goods. One particular outfit is bought at ₦8,000 and sold at ₦13,000. Mean holding costs per season per outfit work out at ₦500 and it costs ₦80,000 to order and receive goods in stock. The manufacturers require orders in advance and once a batch has been made it is not possible to place a repeat order. Further, it is not possible for delivery to be staggered over the fashion season.

When a customer buys an outfit that requires adjustments, any alterations or adjustments are made and she collects the outfit a day or so later. Generally, if an outfit is out of stock at one boutique it can be readily obtained from another branch, usually in a matter of hours. However, if the chain as a whole runs out of an item, then not only is the profit not earned, but the ₦2,000 or so profit that comes from the extras that customers buy is also lost. If the chain has excess purchase for a season then it is expected that the chain will be able to dispose of the surplus outfits at ₦5,000 each.

The pattern of past sales of a comparable outfit show the following probability distribution for the chain as a whole:

<b>Outfits sold</b>	<b>Probability</b>
1,100	0.30
1,200	0.40
1,300	0.20
1,400	0.10

The problem facing the management accountant of the chain is to decide how many outfits to order for the season ahead, in order to maximise expected profit, bearing in mind the penalties for over and under ordering.

**You are required to:**

- a) Determine the number of outfits to order to maximise expected profits. (17 Marks)
- b) Compare and contrast the model that you have developed with the classical economic order model. (3 Marks)

**(Total 20 Marks)**

**QUESTION 6**

Chukwukah Nigeria Limited manufactures three products, JEL, JET and JAL. Demand for products JEL and JET is relatively elastic whilst demand for product JAL is relatively inelastic. Each product uses the same materials and the same type of direct labour but in different quantities. For many years, the company has been using full absorption costing and absorbing overheads on the basis of direct labour hours. Selling prices are then determined using cost plus pricing. This is common in the company's industry with most competitors applying a standard mark-up.

Budgeted production and sales volumes for JEL, JET and JAL for the next year are 25,000, 20,000 and 27,600 units respectively.

The budgeted direct costs of the three products are shown below:

<b>Product</b>	<b>JEL</b> ₦ per unit	<b>JET</b> ₦ per unit	<b>JAL</b> ₦ per unit
Direct materials	250	280	220
Direct labour (₦120 per hour)	300	360	240

In the coming year, Chukwukah also expects to incur indirect production costs of ₦6,887,000, which are analysed as follows:

<b>Cost pools</b>	<b>₦'000</b>	<b>Cost drivers</b>
Machine set up costs	1,400	Number of batches
Material ordering costs	1,580	Number of purchase orders
Machine running costs	2,100	Number of machine hours
General facility costs	1,807	Number of machine hours
	<b>6,887</b>	

The following additional data relates to each product:

<b>Product</b>	<b>JEL</b>	<b>JET</b>	<b>JAL</b>
Batch size (units)	500	800	400
No of purchase orders per batch	4	5	4
Machine hours per unit	<u>1.5</u>	<u>1.25</u>	<u>1.4</u>

The management of Chukwukah Nigeria Limited wants to boost sales revenue in order to increase profits but its capacity to do this is limited because of its use of cost plus pricing and the application of standard mark-up. The management accountant has suggested using activity based costing (ABC) instead of full absorption costing, since this will alter the cost of the products and may therefore enable a different price to be charged.

**Required:**

- Calculate the budgeted full production cost per unit of each product using absorption costing. All workings should be to two decimal places. (6 Marks)
- Calculate the budgeted full production cost per unit of each product using activity based costing. All workings should be to two decimal places. (8 Marks)
- Discuss the impact on the selling prices and the sales volumes of each product which a change to activity based costing would be expected to bring about. (6 Marks)

**(Total 20 Marks)**

# Formulae

## Learning curve

$$Y = ax^b$$

Where Y = cumulative average time per unit to produce x units

a = the time taken for the first unit of output

x = the cumulative number of units produced

b = the index of learning ( $\log LR/\log 2$ )

LR = the learning rate as a decimal

## Demand curve

$$P = a - bQ$$

$$b = \frac{\text{change in price}}{\text{change in quantity}}$$

a = price when Q = 0

$$MR = a - 2bQ$$

The linear regression equation of Y on X is given by:

$$Y = a + bX$$

where

$$b = \frac{n \sum XY - (\sum X)(\sum Y)}{n \sum X^2 - (\sum X)^2}$$

$$a = \frac{\sum y}{n} - \frac{b \sum x}{n}$$

## Coefficient of determination ( $r^2$ )

$$r^2 = \frac{(n \sum XY - \sum x \sum Y)^2}{(n \sum X^2 - (\sum X)^2)(n \sum Y^2 - (\sum Y)^2)}$$

## The Miller-Orr Model

$$Spread = 3 \times \left( \frac{\frac{3}{4} \times \text{Transaction Cost} \times \text{Variance of Cash flows}}{\text{Interest rate (as a proportion)}} \right)^{\frac{1}{3}}$$

### Annuity Table

Present value of an annuity of 1 i.e.

$$\frac{1 - (1 + r)^{-n}}{r}$$

Where  $r$  = discount rate  
 $n$  = number of periods

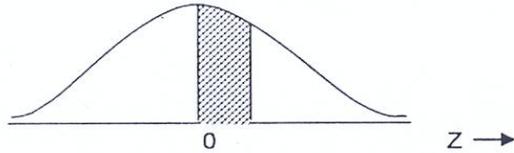
### Discount rate (r)

#### Periods

(n)	1%	2%	3%	4%	5%	6%	7%	8%	9%	10%	
1	0.990	0.980	0.971	0.962	0.952	0.943	0.935	0.926	0.917	0.909	1
2	1.970	1.942	1.913	1.886	1.859	1.833	1.808	1.783	1.759	1.736	2
3	2.941	2.884	2.829	2.775	2.723	2.673	2.624	2.577	2.531	2.487	3
4	3.902	3.808	3.717	3.630	3.546	3.465	3.387	3.312	3.240	3.170	4
5	4.853	4.713	4.580	4.452	4.329	4.212	4.100	3.993	3.890	3.791	5
6	5.795	5.601	5.417	5.242	5.076	4.917	4.767	4.623	4.486	4.355	6
7	6.728	6.472	6.230	6.002	5.786	5.582	5.389	5.206	5.033	4.868	7
8	7.652	7.325	7.020	6.733	6.463	6.210	5.971	5.747	5.535	5.335	8
9	8.566	8.162	7.786	7.435	7.108	6.802	6.515	6.247	5.995	5.759	9
10	9.471	8.983	8.530	8.111	7.722	7.360	7.024	6.710	6.418	6.145	10
11	10.368	9.787	9.253	8.760	8.306	7.887	7.499	7.139	6.805	6.495	11
12	11.255	10.575	9.954	9.385	8.863	8.384	7.943	7.536	7.161	6.814	12
13	12.134	11.348	10.635	9.986	9.394	8.853	8.358	7.904	7.487	7.103	13
14	13.004	12.106	11.296	10.563	9.899	9.295	8.745	8.244	7.786	7.367	14
15	13.865	12.849	11.938	11.118	10.380	9.712	9.108	8.559	8.061	7.606	15
(n)	11%	12%	13%	14%	15%	16%	17%	18%	19%	20%	
1	0.901	0.893	0.885	0.877	0.870	0.862	0.855	0.847	0.840	0.833	1
2	1.713	1.690	1.668	1.647	1.626	1.605	1.585	1.566	1.547	1.528	2
3	2.444	2.402	2.361	2.322	2.283	2.246	2.210	2.174	2.140	2.106	3
4	3.102	3.037	2.974	2.914	2.855	2.798	2.743	2.690	2.639	2.589	4
5	3.696	3.605	3.517	3.433	3.352	3.274	3.199	3.127	3.058	2.991	5
6	4.231	4.111	3.998	3.889	3.784	3.685	3.589	3.498	3.410	3.326	6
7	4.712	4.564	4.423	4.288	4.160	4.039	3.922	3.812	3.706	3.605	7
8	5.146	4.968	4.799	4.639	4.487	4.344	4.207	4.078	3.954	3.837	8
9	5.537	5.328	5.132	4.946	4.772	4.607	4.451	4.303	4.163	4.031	9
10	5.889	5.650	5.426	5.216	5.019	4.833	4.659	4.494	4.339	4.192	10
11	6.207	5.938	5.687	5.453	5.234	5.029	4.836	4.656	4.486	4.327	11
12	6.492	6.194	5.918	5.660	5.421	5.197	4.988	4.793	4.611	4.439	12
13	6.750	6.424	6.122	5.842	5.583	5.342	5.118	4.910	4.715	4.533	13
14	6.982	6.628	6.302	6.002	5.724	5.468	5.229	5.008	4.802	4.611	14
15	7.191	6.811	6.462	6.142	5.847	5.575	5.324	5.092	4.876	4.675	15

## NORMAL DISTRIBUTION

This table gives the area under the normal curve between the mean  $\mu$  and  $z$  deviations above the mean. The corresponding area for deviations below the mean is found by symmetry.



$Z = \frac{(x - \mu)}{\sigma}$	0.00	0.01	0.02	0.03	0.04	0.05	0.06
0.0	.0000	.0040	.0080	.0120	.0159	.0199	.0239
0.1	.0398	.0438	.0478	.0517	.0557	.0596	.0636
0.2	.0793	.0832	.0871	.0910	.0948	.0987	.1026
0.3	.1179	.1217	.1255	.1293	.1331	.1368	.1406
0.4	.1554	.1591	.1628	.1664	.1700	.1736	.1772
0.5	.1915	.1950	.1985	.2019	.2054	.2088	.2123
0.6	.2257	.2291	.2324	.2357	.2389	.2422	.2454
0.7	.2580	.2611	.2642	.2673	.2704	.2734	.2764
0.8	.2881	.2910	.2939	.2967	.2995	.3023	.3051
0.9	.3159	.3186	.3212	.3238	.3264	.3289	.3315
1.0	.3413	.3438	.3461	.3485	.3508	.3531	.3554
1.1	.3643	.3665	.3686	.3708	.3729	.3749	.3770
1.2	.3849	.3869	.3888	.3907	.3925	.3944	.3962
1.3	.4032	.4049	.4066	.4082	.4099	.4115	.4131
1.4	.4192	.4207	.4222	.4236	.4251	.4265	.4279
1.5	.4332	.4345	.4357	.4370	.4382	.4394	.4406
1.6	.4452	.4463	.4474	.4485	.4495	.4505	.4515
1.7	.4554	.4564	.4573	.4582	.4591	.4599	.4608
1.8	.4641	.4649	.4656	.4664	.4671	.4678	.4686
1.9	.4713	.4719	.4726	.4732	.4738	.4744	.4750
2.0	.4772	.4778	.4783	.4788	.4793	.4798	.4803
2.1	.4821	.4826	.4830	.4834	.4838	.4842	.4846
2.2	.4861	.4865	.4868	.4871	.4875	.4878	.4881
2.3	.4893	.4896	.4898	.4901	.4904	.4906	.4909
2.4	.4918	.4920	.4922	.4925	.4927	.4929	.4931
2.5	.4938	.4940	.4941	.4943	.4945	.4946	.4948
2.6	.4953	.4955	.4956	.4957	.4959	.4960	.4961
2.7	.4965	.4966	.4967	.4968	.4969	.4970	.4971
2.8	.4974	.4975	.4976	.4977	.4977	.4978	.4979
2.9	.4981	.4982	.4983	.4983	.4984	.4984	.4985

## SECTION A

### SOLUTION 1

#### a. Concept of linear programming and usefulness

Linear programming is a mathematical method for determining a way to achieve the best outcome (such as maximum profit or lowest cost) subject to a number of limiting factors (constraints).

A linear programming problem involves maximising or minimising a linear function (the objective function) subject to linear constraints.

Both the constraints and the “best outcome” are represented as linear relationships.

What constitutes the best outcome depends on the objective. The equation constructed to represent the best outcome is known as the objective function.

#### Uses of linear programming (LP)

- **Budgeting:** In preparing budget, one of the first steps is the identification of the key (limiting) factor. When there is more than one limiting factor, LP can be used to identify the most profitable use of resources.
- **Capital budgeting:** When we have multi-period capital rationing, LP can be used to optimally allocate the available funds among the competing projects.
- **Transfer pricing:** In a divisionalised organisation, LP can be used to compute optimal transfer price between divisions when the supplying division does not have sufficient capacity to meet all the demands placed upon it.
- **Calculating relevant costs:** The relevant cost of a scarce resource is calculated as acquisition cost of the resource plus opportunity cost. When more than one scarce resource exist, LP can be used to establish the opportunity cost (Shadow price).
- **Maximum payment for the supply of additional scarce resources:** If labour is an effective limiting factor, for example, the maximum overtime premium to pay per additional hour is the shadow price which can be determined using LP.
- **Control:** LP is also useful in the analysis of variances. For example, adverse material usage variances can be indication of material wastage. Such variances

should be valued at the standard cost of the material plus the opportunity cost of the loss of one scarce unit of material. LP can be used to determine the opportunity cost.

- b. Computation of unit selling price and associated unit profit of the two products.

	Biggis	Smallis
	₦	₦
Material	250	150
Labour costs:		
Machine time	60	30
Processing	40	50
Overhead cost	<u>30</u>	<u>40</u>
Total costs	380	270
Profit per unit	<u>76</u>	<u>54</u>
Selling price per unit	<u>456</u>	<u>324</u>

- c. **ADVICE ON THE OUTPUT TO BE PRODUCED TO MAXIMISE TOTAL PROFIT**

**STEP 1 –DETERMINATION OF LIMITING FACTOR**

Materials needed to produce 200,000 units of Biggis & 100,000 units of Smallis

<b>BIGGIS</b>	5kg x 200,000	1,000,000
<b>SMALLIS</b>	3kg x 100,000	<u>300,000</u>
<b>Total Required</b>		<b>1,300,000</b>
<b>Available Material</b>		<b>1,800,000</b>

**Conclusion:**

Materials are not limiting factor since available resources exceed resources needed to meet production levels.

Machine time needed to produce 200,000 units of Biggis and 100,000 units of Smallis.

BIGGIS	4hrs x 200,000	800,000
SMALLIS	2hrs x 100,000	<u>200,000</u>
<b>Total Required</b>		<b>1,000,000</b>
<b>Available Hours</b>		<b>800,000</b>

**Conclusion:**

Machine time is a limiting factor since hours available are less than the hours needed to meet production levels.

Other processing time needed to produce 200,00 units of Biggs and 100,000 units of smallis:

BIGGIS	4hrs x 200,000	800,000
SMALLIS	5hrs x 100,000	<u>500,000</u>
<b>Total Required</b>		<b>1,300,000</b>
<b>Available Hours</b>		<b>1,400,000</b>

**Conclusion:**

Other processing time is not a limiting factor since hours available exceeds hours needed to meet production levels.

**STEP 2 – DETERMINATION OF PRIORITY OF PRODUCTION PLAN**

	<b>Biggis</b>	<b>Smallis</b>
	<b>₦</b>	<b>₦</b>
Selling price	456	324
Total variable costs	(350)	(230)
Contribution per unit	106	94
Machine time per unit	4	2
Contribution per machine time	26.5	47
Ranking	2 <sup>nd</sup>	1 <sup>st</sup>

<b>PRODUCT</b>	<b>UNITS</b>	<b>HOURS USED</b>	<b>HOURS LEFT</b>
SMALLIS	100,000	200,000	600,000
BIGGIS	150,000	600,000	-

**Comment**

Hence, the optimal production plan for NTAMS Manufacturing Company Ltd is to produce 100,000 units of Smallis and 150,000 units of Biggis.

**(d) SHADOW PRICE****MEANING**

The shadow cost of a binding constraint is the amount by which the objective function decreases (or increases) as a result of availability of one unit less or more of the scarce resource. The solutions to the dual problem of the primal problem give the shadow costs (prices), hence the alternative term dual costs (prices).

**USEFULNESS OF SHADOW PRICES**

- Can be used to determine the relevant cost of a scarce resource
- Useful in setting transfer price
- Useful in setting transfer price
- It assists in determining opportunity cost
- Can be used in allocating funds to projects when there is multi-period capital rationing.

The major limitation of shadow price is that it is valid for a limited range of output. For example, if labour hour is the limiting factor, the shadow price will tend to zero as more labour hours are supplied.

### CALCULATION OF SHADOW PRICE OF THE CONSTRAINTS

Shadow price only exists for binding resources – hence shadow price will only exist for machine time. If one (1) additional machine time is available, total machine time will be 800,001

Total units of Biggis to be produced will be 150,000.25 units (600,001/4)  
 New Total contribution will be (100,000 x 94) + (150,000.25 x 106) =  
 25,300,026.50

Previous total contribution was (100,000 x 94) + (150,000 x 106) =  
 25,300,000

Increase in contribution = 25,300,026.50 – 25,300,000 = 26.50

### Alternative solution

Candidates may reduce the available machine time by 1 hour.

If one machine hour is reduced Total units of Biggis = 149,999.75 units

New contribution (100,000 x 94 + 149,999.75 x 106) = ~~25,300,000~~ 25,299,973.5  
 Old contribution 25,300,000

Shadow price (reduction in contribution) (26.50)  
 Shadow price = ₦26.50k

ei) NPV (Discount Factor 15%) = 2.283  
 Total contribution = 25,300,000 (2.283) = 57,759,900  
 Total Outflow = 45,000,000 = 45,000,000  
 NPV = ₦12,759,000

Yes, the project's NPV is positive and therefore worthwhile.

ii) If a discount factor = 35%  
 Total contribution = 25,300,000 x 1.696 = ~~₦42,908,800~~  
 Total Outflow = ~~45,000,000~~  
 NPV at 35% = (₦2,091,200)

$$IRR = a + \left( \frac{A}{A - B} \right)^{(b - a)}$$

a = Positive NPV discount rate  
 A = Positive NPV  
 b = Negative NPV discount rate  
 B = Negative NPV

$$\begin{aligned}
 &= 15\% + \left( \frac{12,759,000}{12,759,000 + 2,091,200} \right)^{(35\% - 15\%)} \\
 &= 15\% + \left( \frac{12,759,000}{14,851,100} \right)^{(20\%)} \\
 &= 15\% + 17.18\% \\
 &= 32.18\%
 \end{aligned}$$

### Examiner's report

The question tests students' understanding of resource allocation using contribution per limiting factor. It was attempted by the majority of the candidates being a compulsory question.

The performance was below average.

The major pitfall was the lack of understanding in the subject area and the conditions that must be satisfied before the linear programming is applied.

Candidates are advised to read the ICAN study text when preparing for future examination of the Institute.

### Marking guide

		Mark	Total
a.	Definition of linear programming	1	
	Explanation of linear programming	1	
	Usefulness (3 points at 1 mark per point)	<u>3</u>	5
b.	Selling Price (20 ticks at ¼ mark per tick)		5
c.	Advice on the optimal output		10
d.	Shadow Price/usefulness/limitation	5	
	Shadow price computations	<u>7</u>	12
e.	Investment analysis - NPV	4	
	Calculation of IRR	<u>4</u>	<u>8</u>
			<u>40</u>

## SECTION B

### SOLUTION 2

(a) Materials supply is a limiting factor for forecast 1, but not for forecast 2.

#### Forecast 1

	Product A	Product B	Product C
	₦	₦	₦
Sales price per unit	10.00	20.00	30.00
Variable cost per unit	<u>6.50</u>	<u>11.00</u>	<u>18.10</u>
Contribution	3.50	9.00	11.90
Contribution per kg of material	0.88	1.29	0.85
Ranking	2nd	1st	3 <sup>rd</sup>

#### Optimal production plan for forecast 1

	Units	Contribution kg of material	₦
Product B	800	5,600	7,200
Product A	500	2,000	1,750
Product C	1,030	14,420	<u>12,257</u>
Total contribution		22,020	<u>21,207</u>

#### Optimal Production Plan for forecast 2

Total	Product A	Product B	Product C
	₦per unit	₦ per unit	₦ per unit
Sales price	15.00	25.00	40.00
Variable-cost	<u>6.50</u>	<u>11.00</u>	<u>18.10</u>
Contribution	<u>8.50</u>	<u>14.00</u>	<u>21.90</u>
Sales volume (units)	350	700	1,000
Total contribution	₦2,975	₦9,800	₦21,900 <u>₦34,675</u>

**Recommendation:**

Forecast 2 should be adopted for the budget period. It produces a contribution of ₦34,675 which is ₦13,468 higher than the contribution for forecast 1.

(b) **REPORT**

**To: The Managing Director**  
**From: The Finance Manager**  
**Subject: Budget Preparation Process**  
**Date: 5 May 2021**

1. **INTRODUCTION**

In line with the request of the management of our company, PQR Plc (“PQR” or “the Company”) kindly see below the detailed discussion on some of the key issues in the budget preparation process.

2. **PRINCIPAL BUDGET FACTOR**

The principal budget factor or limiting factor or key budget factor is a factor, which at any time is an overriding planning limitation on the activities of the organisation. Examples of principal budget factors include: staffing limitations, scarcity of materials and other logistics, limited financial resources, low sales demand, limited storage facilities, etc.

3. **BUDGET MANUAL**

The budget manual sets out the budget guidelines which are budgeting instructions, that the Budget Committee gives to guide departmental heads involved in the preparation of the budget so that they follow a particular goal, objective, technique, trend or method of estimating the income and expenditure variables.

4. **ROLE OF THE BUDGET COMMITTEE**

The Budget Committee is made up of members of senior management that oversees all budgetary matters. A typical budget committee includes the chief executive officer, heads of strategic business units and the chief finance officer. The committee sets or approves the overall budget goals for the organisation, and its major business units,

directs and coordinates budget preparation, approves the final budget, monitors operations as the year unfolds, and reviews the operating results at the end of the period.

The budget committee also approves major revisions of the budget during the period. This committee usually consists of sectional or departmental managers and is usually serviced by the Budget Officer who normally is the finance officer.

Apart from the above, the functions of the committee may include the following:

- Determine budget policy guidelines and selecting budget policies compatible with organisational goals and objectives;
- Establishing the budget timetable;
- Review budget estimates submitted by sectional heads;
- Facilitate the co-ordination of the budgets;
- Suggest amendments to budgets and revising budget estimates when necessary;
- Approve budgets after amendments;
- Facilitate the generation of budgetary control reports;
- Analysing budget reports and recommending changes;
- Examine variances, recommend investigation of variances and recommend solutions to remedy off-standard performance; and
- Advise top management on all matters concerning the budget.

### Examiner's report

The question examines candidates on optimal mix of production and some concepts associated with the budgeting process. Majority of the candidates attempted the question, the performance was average. The main pitfall is inability of the students to identify the quantity of the limiting factor.

Candidates are encouraged to read the Institute's study text when preparing for the examination of the Institute.

### Marking guide

		<b>Mark</b>	<b>Total</b>
a.	Forecast to be Adopted/Computation	11	
b.	i) Principal budget factor	3	
	ii) Budget manual	3	
	iii) Role of budget committee	<u>3</u>	<u>9</u>
			<u>20</u>

### SOLUTION 3

a)	Year	Quarter	Trend point x	Sales trend (cartons) y = a + bx
	2019	3	13	10,472.33 + (82.67 × 13) = 11,547
	2019	4	14	10,472.33 + (82.67 × 14) = 11,630
	2020	1	15	10,472.33 + (82.67 × 15) = 11,712
	2020	2	16	10,472.33 + (82.67 × 16) = 11,795

The seasonally adjusted forecasts are therefore as follows:

Year	Quarter	Seasonally adjusted forecast sales (cartons)
2019	3	11,547 × 1.06 = 12,240
2019	4	11,630 × 0.91 = 10,583
2020	1	11,712 × 1.05 = 12,298
2020	2	11,795 × 0.98 = 11,559

b) We need to calculate the regression line of the last five periods' observations. This line is

$$y = a + bx$$

$$\text{where } b = \frac{n \sum xy - \sum x \sum y}{n \sum x^2 - (\sum x)^2}$$

$$\text{and } a = \frac{\sum y}{n} - \frac{b \sum x}{n}$$

$$\text{So } b = \frac{(5 \times 4,442.15) - (40 \times 555.1)}{(5 \times 330) - (40 \times 40)} = \frac{6.75}{50} = 0.135$$

$$a = \frac{555.1}{5} - \frac{0.135 \times 40}{5} = 111.02 - 1.08 = 109.94$$

We need to multiply the a and b values back up by 100 to compensate for the fact that the y values were scaled down by 100 before the sigma calculations were carried out.

So the regression line is  $y = 10,994 + 13.5x$

Year	Quarter	Trend point x	Sales trend (cartons) y = a + bx
2019	3	13	10,994 + (13.5 × 13) = 11,169.5
2019	4	14	10,994 + (13.5 × 14) = 11,183.0
2020	1	15	10,994 + (13.5 × 15) = 11,196.5
2020	2	16	10,994 + (13.5 × 16) = 11,210.0

The seasonally adjusted forecasts are therefore as follows:

Year	Quarter	Seasonally adjusted forecast sales (cartons)
2019	3	11,169.5 × 1.06 = 11,840
2019	4	11,183.0 × 0.91 = 10,177
2020	1	11,196.5 × 1.05 = 11,756
2020	2	11,210.0 × 0.98 = 10,986

- c) One common method of deciding on which forecasting basis produces the better result is to compare the coefficients of determination. With ten periods' observations we are told that  $r^2 = 0.535$ .

With five periods' observations we have to calculate the coefficient of determination from the equation given in the tables provided.

$$r^2 = \frac{(n \sum xy - \sum x \sum y)^2}{(n \sum x^2 - (\sum x)^2)(n \sum y^2 - (\sum y)^2)}$$

$$= \frac{(5 \times 4,442.15) - (40 \times 555.1)^2}{(5 \times 330) - (40 \times 40)(5 \times 61,627.4) - (555.1 \times 555.1)} = \frac{6.75^2}{50 \times 0.99}$$

$$= 0.92$$

Prima facie the forecasting method, using five periods' observations is much better than the other using ten periods, since the coefficient of determination of the former is 0.92 compared with 0.535 for the latter.

We can explain 92% of the variations in sales by the passage of time using the former method, but can explain only 53.5% of the variations in sales using the latter method.

## Examiner's report

The question tests candidates' knowledge of regression analysis in forecasting. Few candidates attempted the question, the performance was average. The major pitfall of the candidates was inability to apply seasonal variation of the trend to the forecast.

Candidates are encouraged to read the Institute's study text when preparing for future examination of the Institute.

## Marking guide

		Mark	Total
a.	Forecast of 4 Quarters using 10-period observation	8	
b.	Forecast of 4 Quarters using 5-period observation	8	
c.	Commenting of better of forecast:		
	- Coefficient of determination formulae	1	
	- Substituting of figures into the formulae	1	
	- Comparison of two forecast figures	1	
	- Decision	<u>1</u>	<u>4</u>
			<u>20</u>

## SOLUTION 4

### ADRAC COMMUNITY SCHOOL

#### a. REDRAFTING THE BUDGET FOR THE YEAR ENDED 30 JUNE 2020 BUDGETED INCOME

	Pupils	Rate/Pupil ₤	₤'000
Pupils registered at the beginning of school year	720	21,000	15,120
Average Expected Number of New Joiners	51	18,000	918
			16,038

## BUDGETED EXPENDITURE

		Actual cost for the year Ended 30-June-2019 ₦'000	Inflationary Adjustment	Budget Cost for the year Ended 30-June-2020 ₦'000
Repairs and Maintenance	Note 1	600	3%	618
Salary	Note 2	11,880	2%	12,019
Improvement of canteen	Note 3	1,300		<u>1,255</u>
				<u>13,892</u>
Budgeted Surplus/(Deficit)				<u><u>2,146</u></u>

### Note 1:

Repairs & maintenance 600,000 (1.03) = 618,000

### Note 2:

Salaries (12,400,000 – 520,000) (1 + 0.02 x  $\frac{7}{12}$ ) = 12,019,000

### Note 3:

Improvement of canteen

Estimated cost	Pro	Expected cost
1,450,000	0.7	1,015,000
800,000	0.3	<u>240,000</u>
		<u><u>1,255,000</u></u>

## (b) Advantages of Incremental Budgeting

- Incremental budgeting is very easy to prepare. This makes it possible for a person without any accounting training to build a budget.
- Incremental budgeting is also very quick to comprehend compared to other budgeting methods.
- The information required to complete it is also usually readily available

## Disadvantages of Incremental Budgeting

- There is no incentive to eliminate wasteful or unnecessary spending from the budget;
- It encourages more waste (or budget slack) because managers will try to spend up to their budget limit so that budget for next financial year will not reduce.
- It increases allocated cost irrespective of performance.

(c) **STEPS IN PREPARING ZERO-BASED BUDGET**

Zero-based Budget is prepared as follows:

- (i) A decision must be taken to provide for a minimum level of operation. This means deciding for each basic operation whether or not to perform the operation.
- (ii) Having decided on a basic level of operations, a basic expenditure budget can be prepared.
- (iii) The next step is to consider each incremental decision package and decide whether additional operation is justified. An incremental decision package is justified if the expected benefits exceed the estimated costs.

(d) **EXTENT TO WHICH ZERO-BASED BUDGET CAN BE USED BY ADRAC TO IMPROVE BUDGETING PROCESS**

- i. It can be used to help lower costs by avoiding blanket increases or decreases to a prior period's budget.
- ii. It can be used to help in efficient allocation of resources (department-wise) as it does not look at the historical numbers but looks at the actual numbers
- iii. It leads to the identification of opportunities and more cost-effective ways of doing things by removing all the unproductive or redundant activities.
- iv. Since every line item is to be justified, zero-based budget overcomes the weakness of incremental budgeting of budget inflation.
- v. It also improves coordination and communication within the department and motivates employees by involving them in decision-making.

**Examiner's report**

The question tests candidates' understanding of Incremental Budget and Zero Based Budget. Majority of the candidates attempted the question.

Candidates performance was above average.

The candidates are advised to read the Institute's study text when preparing for the Institute's examination in future.

## Marking guide

			<b>Mark</b>	<b>Total</b>
a.	Redrafted budget		6	
b.	i) Advantages (Any 2 at 1 mark)	2		
	ii) Disadvantages (Any 2 at 1 mark)	<u>2</u>	4	
c.	3 steps at 2 marks		6	
d.	Extent of use of ZBB by Adrac (Any 2 points at 2 marks each)		<u>4</u>	<u>20</u>

## SOLUTION 5

a) Unit contribution

$$₦13,000 - (8,000 + 500) = ₦4,500$$

Unit loss when surplus sold

$$₦8,500 - 5,000 = ₦3,500$$

Unit penalty when demand not satisfied

$$₦2,000 \text{ per outfit not sold}$$

Probability of sales levels

Sales	Probability
1,100	0.3
1,200	0.4
1,300	0.2
1,400	0.1

### Contribution calculations

(1,100 units purchased)

Demand	contribution	₦
1,100	$1,100 \times ₦4,500$	= 4,950,000
1,200	$1,100 \times ₦4,500 - 100 \times ₦2,000$	= 4,750,000
1,300	$1,100 \times ₦4,500 - 200 \times ₦2,000$	= 4,550,000
1,400	$1,100 \times ₦4,500 - 300 \times ₦2,000$	= 4,350,000

(1,200 units purchased)

Demand	Contribution	₦
1,100	$1,100 \times ₦4,500 - 100 \times ₦3,500$	= 4,600,000
1,200	$1,200 \times ₦4,500$	= 5,400,000
1,300	$1,200 \times ₦4,500 - 100 \times ₦2,000$	= 5,200,000
1,400	$1,200 \times ₦4,500 - 200 \times ₦2,000$	= 5,000,000

(1,300 units purchased)

Demand	Contribution	₦
1,100	$1,100 \times \text{₦}4,500 - 200 \times \text{₦}3,500$	= 4,250,000
1,200	$1,200 \times \text{₦}4,500 - 100 \times \text{₦}3,500$	= 5,050,000
1,300	$1,300 \times \text{₦}4,500$	= 5,850,000
1,400	$1,300 \times \text{₦}4,500 - 100 \times \text{₦}2,000$	= 5,650,000

(1,400 units purchased)

Demand	Contribution	₦
1,100	$1,100 \times \text{₦}4,500 - 300 \times \text{₦}3,500$	= 3,900,000
1,200	$1,200 \times \text{₦}4,500 - 200 \times \text{₦}3,500$	= 4,700,000
1,300	$1,300 \times \text{₦}4,500 - 100 \times \text{₦}3,500$	= 5,500,000
1,400	$1,400 \times \text{₦}4,500$	= 6,300,000

### Summary of outcomes Probability Order quantity

	Demand				Expected contribution ₦000
	1,100 0.3	1,200 0.4	1,300 0.2	1,400 0.1	
1,100	4,950,000	4,750,000	4,550,000	4,350,000	4,730
1,200	4,600,000	5,400,000	5,200,000	5,000,000	5,080
1,300	4,250,000	5,050,000	5,850,000	5,650,000	5,030
1,400	3,900,000	4,700,000	5,500,000	6,300,000	4,780

Application of probability on the Pay off Matrix

Decision	State of Nature (Sales)				Max
	0.3	0.4	0.2	0.1	
Alternatives	1,100	1,200	1,300	1,400	
1100	1,485,000	1,900,000	910,000	435,000	1,900,000
1200	1,380,000	2,160,000	1,040,000	500,000	2,160,000
1300	1,275,000	2,020,000	1,170,000	565,000	2,020,000
1400	1,170,000	1,880,000	1,100,000	630,000	1,880,000

∴ On the basis of the expected contribution the number of outfits to order is 1,200 units.

**Note:** The order/receipt costs of ₦80,000 are constant throughout and therefore have been ignored.

- b) The basic EOQ model assumes a known demand per period e.g., per year and the aim is then to find how often, and therefore how much, to order at a time so as to minimise total costs, each order arriving when the stock level is zero so that there are no 'lost sales' and no surplus stock. (It has to be said that the basic EOQ model is rarely, if ever applicable in this simple form in a real-life case, although refinements such as variable demand can be built into the model).

By contrast, in the model calculated, demand is not known with certainty but is assumed to conform to the probability distribution given. Since the whole of the season's stock has to be ordered in a single batch at the start of the season, both overstocking and under stocking are possible, with resultant loss of profit contribution.

### Examiner's report

The question tests the candidates' understanding of decision making under uncertainty. Few students attempted the question and performance was below average. The major pitfall was lack of understanding in identifying possible scenarios for decision making.

Candidates are advised to study the Institute's text for future Institute's study examination.

### Marking guide

			<b>Mark</b>	<b>Total</b>
a.	i)	Number of outfits to maximise profits (32 ticks at ½ mark)	16	
	ii)	Decision	1	17
b.		Compare models	<u>1½</u>	
		Contrast models	<u>1½</u>	<u>20</u>

### SOLUTION 6

#### CHUKWUKAH NIGERIA LIMITED

- (a) Full budgeted production cost per unit using absorption costing

Product	Jel	Jet	Jal	Total
Budgeted annual production (units)	25,000	20,000	27,600	
Labour hours per unit	2.5	3	2	
Total labour hours	62,500	60,000	55,200	177,700

Overhead absorption rate =  $\text{₦}6,887,000/177,700 = \text{₦}38.76$  per hour.

Product	Jel ₤ per unit	Jet ₤ per unit	Jal ₤ per unit
Direct materials	250.00	280.00	220.00
Direct labour	300.00	360.00	240.00
Overhead ( $\cancel{₤}38.76 \times 2.5/3/2$ )	<u>96.90</u>	<u>116.28</u>	<u>77.52</u>
Full cost per unit	<u>646.90</u>	<u>756.28</u>	<u>537.52</u>

(b) Full budgeted production cost per unit using activity based costing

Product	Jel	Jet	Jal	Total
Budgeted annual production (units)	25,000	20,000	27,600	
Batch size	500	800	400	
<b>Number of batches (i.e. set ups)</b>	50	25	69	144
Number of purchase orders per batch	4	5	4	
<b>Total number of orders</b>	200	125	276	601
Machine hours per unit	1.5	1.25	1.4	
<b>Total machine hours</b>	37,500	25,000	38,640	101,140

**Cost driver rates:**

Cost per machine set up	$\cancel{₤}1,400,000/144 = \cancel{₤}9,722.22$
Cost per order	$\cancel{₤}1,580,000/601 = \cancel{₤}2,628.95$
Machine running cost = $\cancel{₤}21,000,000/101140$	= $\cancel{₤}20.76$
General facility cost = $1,807,000/101140$	= $\cancel{₤}17.87$

**Allocation of overheads to each product:**

Product	Jel ₤	Jet ₤	Jal ₤	Total ₤
Machine set up costs	486,111	243,055	670,833	1,400,000
Material ordering costs	525,790	328,619	725,591	1,580,000
Machine running cost	778,624	519,082	802,294	2,100,000
General facility cost	<u>669,987</u>	<u>446,658</u>	<u>690,355</u>	<u>1,807,000</u>
<b>Total</b>	<u>2,460,512</u>	<u>1,537,414</u>	<u>2,889,073</u>	<u>6,887,000</u>

Quantity Produced	25,000	20,000	27,600
Overhead cost per unit	<del>₦</del> 98.42	<del>₦</del> 76.87	<del>₦</del> 104.68

Allocation of overheads to each product

Total cost per unit:	<del>₦</del> per unit	<del>₦</del> per unit	<del>₦</del> per unit
Direct materials	250.00	280.00	220.00
Direct labour	300.00	360.00	240.00
Overhead	98.42	76.87	104.68
ABC cost per unit	<u>648.42</u>	<u>716.87</u>	<u>564.68</u>

- c. The company prices product on the basis of cost plus pricing model. The application of ABC model will impact the selling price and sales volume of the products as follows:

Jel: The demand is elastic.

As a result of ABC model, cost will increase from ~~₦~~646.90 to ~~₦~~648.42 meaning increase in selling price and reduction in sales volume

Jet: The demand is elastic.

As a result of ABC method, cost will decrease from ~~₦~~756.28 to ~~₦~~716.87 meaning that there will be a decrease in selling price and increase in sales volume.

JAL: The demand is inelastic meaning change in price will not affect the quantity demanded. Hence, even though the cost increased from ~~₦~~537.52 to ~~₦~~564.68, selling price will increase but will not affect the sales volume.

### Examiner's report

The question tests the candidates' understanding of overhead apportionment using Traditional and Activity Based Costing Method. Majority attempted the question and the performance was average. The major pitfall was the determination of the number of batches involved.

Candidates are encouraged to make use of the Institute's text for future Institute's examination.

## Marking guide

		<b>Mark</b>	<b>Total</b>
a.	Budgeted full cost per unit (12 ticks at ½ mark each tick)		6
b.	Budgeted ABC full production cost per unit		
	Cost driver rate (4 ticks at ½ mark each)	2	
	Production cost per unit (12 ticks at ½ mark each)	<u>6</u>	8
c.	Impact of ABC on selling price/sales volume		<u>6</u>
			<u>20</u>

# THE INSTITUTE OF CHARTERED ACCOUNTANTS OF NIGERIA

## SKILLS LEVEL EXAMINATION – MAY 2021

### PUBLIC SECTOR ACCOUNTING & FINANCE

Time Allowed: 3¼ hours (including 15 minutes reading time)

**INSTRUCTION: YOU ARE REQUIRED TO ANSWER FOUR OUT OF SIX QUESTIONS IN THIS PAPER**

**SECTION A: COMPULSORY QUESTION (40 MARKS)**

#### QUESTION 1

Okuku State University is one of the parastatals of Okuku State, but it is not a Government Business Enterprise (GBE). The following information relates to the accounts of the University for the year ended December 31, 2018:

#### Statement of financial position as at December 31, 2018

	Cost	Accum. Dep.	Carrying amount
	₦'million	₦'million	₦'million
<b>Non-current assets</b>			
Land and buildings	15,000	250	14,750
Equipment	1,000	100	900
Furniture	800	80	720
Plant and machinery	550	50	500
Motor vehicles	<u>450</u>	<u>45</u>	<u>405</u>
	<b><u>17,800</u></b>	<b><u>525</u></b>	<b><u>17,275</u></b>
<b>Current assets</b>			
Inventories		11,000	
Receivables		15,000	
Bank		<u>3,000</u>	
			<b><u>29,000</u></b>
<b>Total assets</b>			<b><u>46,275</u></b>
<b>Non-current liabilities</b>		30,000	
<b>Current liabilities</b>		<u>8,000</u>	
<b>Total liabilities</b>			<b><u>38,000</u></b>
<b>Net assets</b>			<b><u>8,275</u></b>
<b>Net assets/equity</b>			
Reserves			<b><u>8,275</u></b>

The following transactions, which took place during the year ended December 31, 2018 were not recorded in the books.

- (i) The University acquired office equipment worth ₦150,000,000 from Joko Nigeria Limited. The installation and transportation of the equipment amounted to ₦3,000,000. Half of the cost of the equipment was paid during the year, while the balance was paid later in January 2019. The University took over the building of a defunct State College of Education. The fair value of the building taken over was estimated at ₦500,000,000, at the end of the year.
- (ii) The University Teaching Hospital received motor vehicles and laboratory equipment from a UK based research institute as donation during the year. The intervention was to curtail the spread of lassa fever in the country. The cost of the motor vehicles and laboratory equipment donated amounted to ₦20,000,000 and ₦50,000,000, respectively.
- (iii) The University acquired a motor vehicle for ₦150,000,000 on January 1, 2018.
- (iv) One of the buildings owned by the University was gutted by fire during the year ended December 31, 2018. The carrying amount of the building as at the date of the fire incidence was put at ₦160,000,000. The fair value of the building after the fire incidence at the end of the year was estimated by a valuer to be ₦130,000,000.
- (v) The University acquired motor vehicle on January 1, 2017 at ₦8,000,000 with an estimated useful life of 5 years. The University decided to dispose of the motor vehicle for ₦4,000,000 at the end of the second year.
- (vi) The University acquired computers on January 1, 2017 at the cost of ₦1,000,000. The computers have an estimated useful life of 5 years. Due to fire outbreak in the University on December 31, 2018, the computers were badly damaged and of no use to the University. It was resolved that they should be discarded and written off. The University uses straight-line method in depreciating its property, plant and equipment (PPE).
- (vii) The University acquired a land in 2018 at the cost of ₦50,000,000 to construct a plaza for rent. Cost of construction was put at ₦250,000,000 as at the end of the year 2018. The plaza was estimated to have a useful life of 25 years. It is the policy of the University to depreciate investment properties using the straight-line method.

- (viii) The University adopted full year depreciation policy using the following rates:

	%
Motor vehicle	20
Building	4
Furniture	10
Equipment(including Laboratory and computers)	20
Plant and machinery	15

**Required:**

- a. Identify **FOUR** characteristics of Government Business Enterprises (GBEs) as stated in IPSAS 1 on presentation of financial statements. (2 Marks)
  - b. Prepare the necessary journal entries to record the above transactions for the year ended December 31, 2018. (10 Marks)
  - c. Prepare the adjusted statement of financial position as at December 31, 2018. (20 Marks)
  - d. Identify and explain **FOUR** qualitative characteristics of financial reporting as required by appendix 2 of IPSAS 1 on presentation of financial statements. (8 Marks)
- (Total 40 Marks)**

**SECTION B:**

**(60 MARKS)**

**INSTRUCTION: YOU ARE REQUIRED TO ANSWER ANY THREE OUT OF FIVE QUESTIONS IN THIS SECTION**

**QUESTION 2**

- a. Debt management is a key component of public finance management that enables the government meet its financing needs at minimum costs and within acceptable levels of risk.

One of the diagnostic tools that government uses in managing its debt portfolio is to annually conduct a Debt Sustainability Analysis (DSA).

**Required:**

Explain the term “Debt Sustainability Analysis”, identifying its **THREE** objectives and **FIVE** benefits. (10 Marks)

- b. You have received an official memo from your Permanent Secretary, which reads:

**Director of Account and Finance:**

Hope you are doing well. We have just closed from a workshop organised by the Ministry of Finance on public finance management not long ago and the discussion was all about adoption of IPSAS accrual accounting in the public sector. It was emphasised that migration from IPSAS Cash Basis to IPSAS Accrual Basis is necessary to improve financial reporting and transparency in the public sector. You know I have little knowledge in accounting, so I was completely lost in the discussions and I wished you had attended the workshop with me.

Another issue discussed was commitment accounting. We were made to understand that commitment accounting strengthens public finance management and therefore all Ministries, Departments and Agencies (MDAs) must ensure that every expenditure is committed in accordance with the appropriation prior to spending.

Please could you help me with some information on these issues?

**Required:**

Explain to the Permanent Secretary:

- i. **THREE** differences between accrual accounting and cash accounting. (3 Marks)
- ii. **THREE** justifications for adopting IPSAS accrual accounting in the public sector. (3 Marks)
- iii. The term “commitment accounting” and illustrate **THREE** ways it could strengthen public financial management. (4 Marks)

**(Total 10 Marks)**

**QUESTION 3**

- a. Cash management implemented by the Budget Office of the Federation (BoF) was to ensure that the right amount of money is made available to fund government expenditure in a timely manner as well as meeting its obligations as they fall due.

**Required:**

Explain **FIVE** strategies to enhance cash management control and **FIVE** factors militating against effective cash management. (10 Marks)

- b. Omidan Local Government Council has ₦20,000,000 to invest, if there is an assurance that the investment will earn at least 12% p.a. In view of this, the following projects are being considered:  
Project A will earn ₦21,800,000 at the end of year one with a residual value of ₦1,500,000;  
Project B will earn ₦24,000,000 at the end of year two with a residual value of ₦500,000; and  
Project C will earn ₦14,000,000 at the end of year one and another ₦10,000,000 at the end of year two with no residual value.  
If none of the projects is undertaken, Omidan Local Government Council will invest the ₦20,000,000 in a risk free security that will earn interest of 12% p.a.

**Required:**

Assess and advise Omidan Local Government Council on which of the projects to be undertaken using Net Present Value (NPV) method.

(10 Marks)

**(Total 20 Marks)**

**QUESTION 4**

- a. As the Accountant in charge of the expenditure division, you are to assist the Director of Finance in the ministry to set up a budget committee. You have also been asked to review the recently issued 2020 Budget Call Circular.

**Required:**

Explain briefly the following:

- i. Medium Term Expenditure Framework (MTEF) including **FOUR** of its objectives (6 Marks)
  - ii. Budget Call Circular (2 Marks)
  - iii. The main difference between MTEF and Budget call circular. (2 Marks)
- (10 Marks)

- b. The Ministry of Health of Federal Republic of Wazobia is currently considering public-private partnership as a means of improving health facilities in some rural areas in the country. The Ministry intends to use Public-Private Partnership (PPP) to construct and manage modern primary health centres in rural areas to increase access to quality health facilities. The project would be fully financed by the private sector, but will be built on land secured from the state governments. The private sector requires government guarantee to borrow externally to execute the project. Currently, health services are free, however, the new project, when

executed through Public-Private Partnership would be on “user-pay” basis. The government and the private contractors determine the average fees payable per user and it will be subject to an upward review from time to time. In order to stimulate private sector interest in the project, the Ministry intends to protect the private sector against risks associated with the project. Meanwhile, the Ministry would insist that local materials and skills are employed in the construction and management of the primary health centre projects. The project is also environmentally friendly as there will be little or no destruction of the forest vegetation. The project when completed, will be of great benefit to the country as a whole.

**Required:**

Based on guiding principles of Public-Private Partnership identify and explain **THREE** principles and **TWO** associated risks of the feasibility of the proposed primary health centre projects by the Ministry of Health.

(10 Marks)

**(Total 20 Marks)**

**QUESTION 5**

- a. IPSAS 12 on Inventories deals with the valuation and presentation of inventories in the financial statements in the context of historical cost system, the most widely adopted basis on which financial statements are presented.

**Required:**

In accordance with IPSAS 12, identify **FOUR** costs that are excluded from the cost of inventories and **FOUR** requirements to be disclosed in the financial statements.

(10 Marks)

- b. External debt does not constitute a burden when contracted loans are optimally deployed and the return on investment is sufficient to meet maturing obligations, as and when due, while servicing of the domestic economy is not undermined. The magnitude and severity of debt burden cannot be determined on the basis of debt volume only, rather, the debt volume should be viewed in combination with certain debt ratios for better appreciation of the debt problem.

**Required:**

Discuss **THREE** ratios commonly used to analyse the degree of indebtedness of a country and explain **TWO** sources of external debts.

(10 Marks)

**(Total 20 Marks)**

## QUESTION 6

- a. Expenditure assignment deals with the division or sharing of expenditure, regulatory and tax functions or responsibilities among multi-levels of government in a federation.

**Required:**

Explain **THREE** principles guiding expenditure assignment and highlight **TWO** of its drawbacks. (10 Marks)

- b. The importance of classification code as a system driven for budget cannot be over emphasised as it forms the basis for budgeting and budgetary control mechanism. Thus, for a country, state or local government to achieve a reasonable level of success in accountability, transparency, performance evaluation and adherence to Appropriation Act, the application of unified chart of accounts is paramount.

**Required:**

Discuss **FOUR** uses of budget and **FOUR** steps to be followed to ensure completeness of using the National Chart of Accounts for budgeting.

(10 Marks)

**(Total 20 Marks)**

## SECTION A

### SOLUTION 1

- a. Government Business Enterprise (GBE) is an entity that has all the following characteristics:
- i. It is an entity with the power to contract in its own name;
  - ii. It has been assigned the financial and operational authority to carry on a business;
  - iii. It sells goods and services, in the normal course of its business to other entities at a profit or full cost recovery;
  - iv. It is not reliant on continuing government funding to be a going concern (other than purchases of outputs at arm's length); and
  - v. It is controlled by a public sector entity.

b.

**Okuku State University**

**Journal entries to record transactions not recognised  
for the year ended December 31, 2018**

<b>S/N</b>	<b>Details</b>	<b>DR N'm</b>	<b>CR N'm</b>
i.	Office equipment	153	
	Bank		78
	Accounts payable		75
	Being the cost of assets made up of the purchase cost plus all attributable costs		
ii.	Building	500	
	Take over grant/ reserve		500
	Being the fair value of building taken over from State College of Education		
iii.	Motor vehicles	20	
	Laboratory equipment	50	
	Donation		70
	Being aids and grants received during the year from a UK based research institute.		
iv.	Motor vehicles	150	
	Bank		150
	Being cost of motor vehicle acquired during the Year		
	Depreciation charged	30	
	Accumulated depreciation		30
	Being depreciation charged during the year.		
v.	Impairment	30	
	Accumulated impairment		30
	Being impairment loss written off on building.		
vi.	Disposal account	8	
	Motor vehicles		8
	Being the cost of motor vehicle disposed off during the year.		
	Accumulated depreciation	3.2	
	Disposal account		3.2
	Being accumulated depreciation on disposed motor Vehicle.		

	Bank	4	
	Disposal account		4.8
	Loss on disposal	0.8	
	Being loss on the sale of the motor vehicle.		
vii.	Accumulated depreciation	0.4	
	Loss on disposal	0.6	
	Computer		1
	Being loss on computer gutted by fire during the year.		
viii.	Investment property	300	
	Bank		300
	Being the cost of investment property acquired during the year.		
	Depreciation a/c	10	
	Accumulated depreciation		10
	Being depreciation charged during the year.		

c.

**Okuku State University**  
**Statement of financial position as at December 31, 2018**

	Cost N'm	Accumulated depreciation N'm	Carrying amount N'm
<b>Non-current assets</b>			
Land and buildings	15,500.00	280.00	15,220.00
Equipment	1,202.00	140.20	1,061.80
Furniture	800.00	80.00	720.00
Plant and Machinery	550.00	50.00	500.00
Motor vehicles	612.00	75.80	536.20
Investment property	<u>300.00</u>	<u>10.00</u>	<u>290.00</u>
<b>Total</b>	<b><u>18,964.00</u></b>	<b><u>636.00</u></b>	<b><u>18,328.00</u></b>
<b>Current assets:</b>			
Inventories		11,000.00	
Receivables		15,000.00	
Bank		<u>2,476.00</u>	
<b>Total</b>			<b><u>28,476.00</u></b>
<b>Total assets</b>			<b><u>46,804.00</u></b>
<b>Less liabilities:</b>			
Non current liabilities		30,000.00	
Current liabilities		<u>8,075.00</u>	
<b>Total liabilities</b>			<b><u>38,075.00</u></b>
<b>Net assets</b>			<b><u>8,729.00</u></b>

**Equity  
Reserves**

**8,729.00**

**Workings**

**W (i) Property, Plant and Equipment (PPE)**

<b>Non-current assets</b>	<b>Land and buildings R' million</b>	<b>Office &amp; laboratory equipment R' million</b>	<b>Furniture R' million</b>	<b>Plant and equipment R' million</b>	<b>Motor vehicles R'million</b>
Unadjusted balanceb/f	15,000	1,000	800	550	450
Additions		153			150
Disposal		(1)			(8)
Transfer	500				
Donation	--	<u>50</u>	--	--	<u>20</u>
<b>Bal. at December 31, 2018</b>	<b><u>15,500</u></b>	<b><u>1,202</u></b>	<b><u>800</u></b>	<b><u>550</u></b>	<b><u>612</u></b>
<b>Accumulated depreciation/impairment</b>					
Unadjusted balanceb/f	250	100	80	50	45
Depreciation charges		40.6			34
Impairment charges	30				-3.2
Disposal	--	<u>(0.4)</u>	--	--	--
<b>Bal. at December 31, 2018</b>	<b><u>280</u></b>	<b><u>140.2</u></b>	<b><u>80</u></b>	<b><u>50</u></b>	<b><u>75.8</u></b>
<b>Carrying amount as at December 31, 2018</b>	<b><u>15,220</u></b>	<b><u>1,061.8</u></b>	<b><u>720</u></b>	<b><u>500</u></b>	<b><u>536.2</u></b>

**W (ii) Calculation of additional depreciation charges for the year**

	<b>R' million</b>
Office, computer and laboratory equipment (R203m X 20%)	40.6
Motor vehicles (R170million X 20%)	34.0
Investment property (R250million /25)	<u>10.0</u>
<b>Total</b>	<b><u>84.6</u></b>

**W (iii) Calculation of adjusted cash balance for the year ended December 31, 2018**

	N'million	N'million
Bank		
Bal.		3,000
Sale of motor vehicle		<u>4</u>
<b>Total</b>		<b>3,004</b>
<b>Expenditure</b>		
Office equipment	78	
Motor vehicle	150	
Investment	<u>300</u>	<u>528</u>
<b>Adjusted cash balance</b>		<b><u>2,476</u></b>

**Calculation of adjusted reserves balance for the year ended December 31, 2018**

<b>Reserves</b>	N'million	N'million
Bal b/d		8,275
<b>Add</b>		
Building taken over	500	
Donation	<u>70</u>	<u>570</u>
		<b><u>8,845</u></b>
<b>Less</b>		
Loss on disposal of vehicle	0.8	
Depreciation charges	57.6	
Impairment charges	30.0	
Computer loss due to fire	<u>0.6</u>	<u>89</u>
<b>Bal c/d</b>		<b><u>8,729</u></b>

**d. Qualitative characteristics of financial reporting**

The qualitative characteristics are:

**i. Understandability**

Information is understandable when users might reasonably be expected to comprehend its meaning. For this purpose, users are assumed to have a reasonable knowledge of the entity's activities, the environment in which it operates and be willing to study the information. Information about complex matters should not be excluded from the financial statements merely on the grounds that it may be too difficult for certain users to understand.

- ii. **Relevance**  
Information is relevant to users, if it can be used to evaluate past, present or future events or to confirm, or correct past evaluations. In order to be relevant, information must also be timely.
- iii. **Materiality**  
The relevance of information is affected by its nature and materiality. Information is material if its omission or misstatement could influence the decisions of users or assessments made on the basis of the financial statements. Materiality depends on the nature or size of the item or error of judgment in the particular circumstances of its omission or misstatement. Thus, materiality provides a threshold or cut-off point rather than being a primary qualitative characteristic which information must have, if it is to be useful.
- iv. **Reliability**  
Reliable information is free from material error and bias and can be depended on by users to represent faithfully that which it purports to represent or could reasonably be expected to represent.
- v. **Faithful representation**  
For information to faithfully represent transactions and other events, it should be presented in accordance with the substance of the transactions and other events, and not merely in their legal form.
- vi. **Substance over form**  
If information is to faithfully represent the transactions and other events that it purports to represent, it is necessary that they are accounted for and presented in accordance with their substance and economic reality and not merely in their legal form. The substance of transactions or other events is not always consistent with their legal form.
- vii. **Neutrality**  
Information is neutral if it is free from bias. Financial statements are not neutral if the information they contain has been selected or presented in a manner designed to influence the making of a decision or judgment in order to achieve a predetermined result or outcome.
- vii. **Prudence**  
Prudence is the inclusion of a degree of caution in the exercise of the judgments needed in making the estimates required under conditions of uncertainty, such that assets or revenue are not overstated and liabilities or expenses are not understated. However, the exercise of

prudence does not allow, for example, the creation of hidden reserves or excessive provisions, the deliberate understatement of assets or revenue, or the deliberate overstatement of liabilities or expenses, because the financial statements would not be neutral and, therefore, not have the quality of reliability.

viii. **Completeness**

The information in financial statements should be complete within the bounds of materiality and cost.

ix. **Comparability**

Information in financial statements is comparable when users are able to identify similarities and differences between that and information in other reports.

Comparability applies to the:

- Comparison of financial statements of different entities; and
- Comparison of the financial statements of the same entity over periods of time.

An important implication of the characteristic of comparability is that users need to be informed of the policies employed in the preparation of financial statements, changes to those policies and the effects of those changes. Since users wish to compare the performance of an entity over time, it is important that financial statements show corresponding information for preceding periods.

x. **Timeliness**

If there is an undue delay in the reporting of information, it may lose its relevance. To provide information on a timely basis, it may often be necessary to report before all aspects of a transaction are known, thus encouraging reliability. Conversely, if reporting is delayed until all aspects are known, the information may be highly reliable but of little use to users who have had to make decisions in the interim. In achieving a balance between relevance and reliability, the overriding consideration is how best to satisfy the decision-making needs of users.

xi. **Balance between benefit and cost**

The balance between benefit and cost is a pervasive constraint. The benefits derived from information should exceed the cost of providing it. The evaluation of benefits and costs is, however, substantially a matter of judgment. Furthermore, the costs do not always fall on those users who enjoy the benefits. Users other than those for whom the information was prepared may also enjoy benefits. For these reasons, it is difficult to apply a benefit-cost test in any particular case.

Nevertheless, standard-setters, as well as those responsible for the preparation of financial statements and users of financial statements, should be aware of this constraint.

### Examiner's report

The question tests candidates' knowledge on the features of Government Business Enterprises (GBEs) in part (a), while parts (b) and (c) test candidates' knowledge on the preparation of journal entries for after year end transactions and the preparation of adjusted statement of financial position respectively. Part (d) of the question also tests candidates' knowledge on qualitative characteristics of financial reporting as required by appendix 2 of IPSAS 1 on presentation on financial statements.

All the candidates attempted the question but their performance was below average.

The commonest pitfalls were the inability of the candidates to understand the characteristics of Government Business Enterprises (GBEs) and financial reporting as required by IPSAS 1 on preparation of financial statements. Also, candidates could not prepare journal entries and incorporate the additional information given in the notes to the question in the preparation of adjusted statement of financial position.

Candidates are advised to have adequate knowledge of relevant provisions of International Public Sector Accounting Standards (IPSAS) for better performance in the Institute's future examinations.

### Marking guide

	<b>Marks</b>	<b>Marks</b>
a. <b>Characteristics of Government Business Enterprise</b>		
Four characteristics		2
b. <b>Journal entries</b>		
Journal entries including narration		10
c. <b>Statement of financial position</b>		
Title	1	
<b>Calculation:</b>		
Total non current assets	5 $\frac{1}{4}$	
Total current assets	1	
Total assets	$\frac{1}{2}$	
Total liabilities	$\frac{3}{4}$	
Net assets	$\frac{1}{2}$	
Equity- reserves	$\frac{1}{4}$	
<b>Workings:</b>		
Adjusted cost on PPE	3	
Adjusted accumulated depreciation on PPE	2 $\frac{1}{2}$	
Additional depreciation per annum on PPE and investment	1	
Adjusted cash balance at the end of the year	1 $\frac{3}{4}$	
Adjusted reserves balance at end of the year	<u>2<math>\frac{1}{2}</math></u>	20
d. <b>Qualitative characteristics of financial reporting</b>		
Identification of four characteristics	4	
Explanation of four characteristics	<u>4</u>	<u>8</u>
<b>Total</b>		<b><u>40</u></b>

## **SECTION B**

### **SOLUTION 2**

a. **Debt Sustainability Analysis (DSA)**

When government is able to service all its debts without undue stress or adjustments to its revenue and expenditure balances in the medium to long term. Debt is sustainable when government's current and future streams of income cover expenditure.

**The objectives of DSA**

- To evaluate government's ability to finance its programmes and at the same time service the ensuing debt without undue pressure on its revenue stream.
- To reduce chances of excessive increase of debt.
- To recommend for a borrowing that limits risk of debt distress.
- To help guide countries and donors in mobilising critical financing for low income countries.

**Benefits of DSA**

To integrate fiscal and debt issues more effectively into economic analysis;  
To make comparison across countries, as it raises the profile of fiscal and debt issues in low income countries.

To dissuade policy makers from pursuing policies that deliver short-term benefits at the cost of creating unsustainable debts in the future.

To allow policy makers to identify the economic sectors responsible for excessive debt accumulation, (be they the national government, sub-national governments and state enterprises or the private sector)

To assess the impact of and response to powerful technological and demographic changes that constrain government policies in the long run.

To quantify the fiscal impact of population aging, immigration and other long-run population changes.

b. i. **The differences between accrual accounting and cash accounting**

- In accrual accounting, comprehensive set of financial statements are prepared to measure financial performance, financial position and cash condition of the entity. However, cash accounting reports mainly on cash condition of the entity by emphasising receipts and payments information.

- Under accrual accounting, non-financial assets are capitalised and depreciated over their useful life span but under cash accounting cost of non-financial assets are written off in the year of acquisition or construction, hence, no depreciation is charged.
- Under accrual accounting, all obligations of government are disclosed on the statement of financial position but in cash accounting system, such information is not disclosed in the financial statements until they are paid.
- Under accrual accounting, allowances are permitted for receivables but no such allowances are accounted for under cash accounting.
- Under accrual accounting, revenues are reported when they are earned, and expenditures, when incurred but under cash accounting, Revenues are recognised only when received, and expenditures, when actually made.

ii. **Justifications for adopting accrual accounting are that:**

- It provides superior measure of performance in terms of cost of service, efficiency and effectiveness in service delivery.
- It promotes accountability and transparency in public financial management through increasing disclosure of all assets and liabilities.
- It provides comprehensive financial information that supports decision-making and control.
- It ensures general improvement in the quality of financial reporting in the public sector.

iii. **Commitment accounting:** It is a basis that records anticipated expenditure evidenced by a contract or a purchase order. In public sector financing, budgetary and accounting systems are closely related to the commitment basis. It is a technique of accounting in which expenditures are recorded when decision is made by management to spend on an activity or item. It is a process by which appropriations are encumbered against future expenditure decisions of management.

**Commitment accounting strengthens public financial management in the following ways:**

- It ensures that departments do not over spend their appropriation without further authorisations;
- It also ensures that spending is done within the ambit of a vote, hence misapplication of funds may be reduced or curtailed;
- It promotes effective planning of expenditure within the available resources and ensures that disbursements are synchronised with commitment;
- Separate payment tabulation is available when required;

- Adjustments occurring when actual expenditure has been obtained does not affect the final accounts;
- It is an aid to financial control. A commitment is regarded as a charge, which has been made on a budget provision;
- It takes a realistic view of financial transactions;
- It reveals an accurate picture of the state of financial affairs at the end of the period;
- It is used for both economic and investment decision-making, as all parameters for performance appraisals are available;
- It aligns with the matching concept; and
- It makes allowance for the diminution in the value of assets employed to generate the revenue of the enterprise.

### Examiner's report

Part (a) of the question requires candidates to explain the term "Debt Sustainability Analysis", including its objectives and benefits, while part (b) requires candidates to explain the differences between accrual and cash accounting, justifications for adopting IPSAS accrual accounting in the public sector and commitment accounting including in which ways it could be used to strengthen public financial management.

Few candidates attempted the question and performance was below average. The commonest pitfalls were the inability of the candidates to differentiate between the objectives and benefits of "Debt Sustainability Analysis (DSA)" They also lacked the knowledge of accounting bases and justification for the adoption of IPSAS accrual accounting in the public sector.

Candidates are advised to make use of the Pathfinder and Study Text of the Institute for better performance in future examinations.

### Marking guide

	<b>Marks</b>	<b>Total</b>
a		
Explanation of Debt Sustainability Analysis	2	
Identification of three objectives	3	
Identification of five benefits	<u>5</u>	10
b.i.		
Three differences between accrual accounting and cash accounting	<u>3</u>	
Three justifications for adopting IPSAS and Accrual accounting in the public sector	3	
ii.		
Explanation of commitment accounting	1	
Three ways of how it could strengthen public financial management	<u>3</u>	<u>10</u>
<b>Total</b>		<b><u>20</u></b>

### **SOLUTION 3**

#### **a. Strategies initiated to enhance cash management control**

- i. Allocation of Ministries, Departments and Agencies (MDAs) indicative envelopes.
- ii. All costs for proposals for inclusion in the budget prepared by MDAs are required to be examined by the Ministry of Finance (MoF) before admission into the annual budget.
- iii. All disbursements from the Consolidated Revenue Fund (CRF) must be in line with the provisions of the Constitution and the Appropriation Act.
- iv. The authority to disburse funds is conveyed by the Honourable Minister of Finance after the budget has been approved, through Financial Warrants, as well as, through instrument of Authority to incur Expenditure (AIE), where the need arises.
- v. Recurrent warrants are issued monthly for personnel costs and quarterly for overheads and capital warrants.
- vi. Lump sum releases (100%) are not allowed, however where such provision is admitted for exceptional reasons, proposals, which are intended to be financed from the lump sum provision, are examined and disposed of by BoF.
- vii. The automation of budget data capture and computation templates enhance operational efficiency for expenditure control.
- viii. Application of embargo on releases to Ministries, Departments and Agencies (MDAs) where necessary, enhances cash management discipline.
- ix. Introduction of electronic movement of funds and information to provide more ease and accessibility to government services for citizens and taxpayers.
- x. Introduction of Integrated Payroll and Personnel Information System (IPPIS). The initiatives were to identify ghost employees, ghost pensioners and implement a computer-based IPPIS geared to ensuring efficient management of the wage bill.
- xi. Introduction of Treasury Single Account (TSA) is an accounting system under which all government revenue receipts and income are collected into one single account maintained by Central Bank of Nigeria (CBN).
- xii. Introduction of the Medium Term Expenditure Framework (MTEF) is an integrated top-down and bottom-up system of public expenditure management.

## Factors militating against effective cash management and other public sector financial management reforms

- i. There has been total disregard for accountability on the part of many public enterprises over the years.
- ii. A lot of public enterprises do not bother to produce promptly their annual reports and audited financial statements due to inefficiency, negligence and mal-administration.
- iii. Funds are allocated yearly without getting the accountability reports of previous years. Accountant General should begin to request for submission of audited financial statements before subventions are released by the end of specified month of the year.
- iv. One of the root causes of the ineffective management of the public sector finances is the poor quality of leadership provided by the management of government agencies and inadequate staffing.
- v. Lack of effective Management Information Systems (MIS) powered by Information and Communication Technology (ICT) infrastructure is a militating factor on effective financial management in the public sector.
- vi. Public sector practitioners or operators seem to be more interested in expenditure/outflows, believing that there will always be substantial revenue/inflow, losing sight of revenue generation from various sources.

### b. Calculation of Net Present Value (NPV)

Year	D/F 12 %	Project A		Project B		Project C	
		Cash flow ₦	PV ₦	Cash flow ₦	PV ₦	Cash flow ₦	PV ₦
0	1	20,000,000	-20,000,000	20,000,000	-20,000,000	20,000,000	-20,000,000
1	0.8929	21,800.00	19,465,220			14,000,000	12,500,600
	0.8929	1,500,000	1,339,350				
2	0.7972			24,000,000	19,134,800	10,000,000	7,972,000
	0.7972			500,000	398,600		
	NPV		804,570		-468,600		472,600

**Project A** - The positive NPV of ₦804,570 indicates that the project will earn more than the required rate of returned of 12%.

**Project B** - The negative NPV of ₦468,600 indicates that the project would fail to make the expected return of 12%.

**Project C** - The positive NPV of ~~₦472,600~~ indicates that the project will earn more than the required rate of return of 12%.

**Conclusion:** Project A has positive NPV of ~~₦804,570~~ while project C has positive NPV of ~~₦472,600~~. Project A should be undertaken because it has a higher positive NPV. It should be noted that investing in risk free security that will earn maximum interest of 12% p.a. will not be necessary because projects A and C gave positive NPV.

### Examiner's report

Part (a) of the question tests the candidates' knowledge of the strategies to enhance cash management control and factors militating against effective cash management, while part (b) tests the candidates' decision making skills on project evaluation under mutually exclusive scenario.

Majority of the candidates attempted the question and performance was above average.

The commonest pitfalls were the inability of the candidates to identify the strategies to enhance cash management control and factors militating against effective cash management.

Candidates are advised to cover all sections of the syllabus for better performance in future examinations.

### Marking guide

	<b>Marks</b>	<b>Marks</b>
a. Five strategies initiated to enhance cash management control	5	
Five factors militating against effective cash management	<u>5</u>	<b>10</b>
b. <b>Calculation of Net Present Value (NPV)</b>		
Title	$\frac{1}{4}$	
Calculation of discount factors	$\frac{3}{4}$	
Calculation of present values and net present values	6	
Decision on project's A, B and C	$1\frac{1}{2}$	
Conclusion	<u><math>1\frac{1}{2}</math></u>	<b>10</b>
<b>Total</b>		<b><u>20</u></b>

## **SOLUTION 4**

- a. i. **MTEF** is a medium term high level strategic plan of the government, usually three years in Nigeria and which forms the basis of annual budgeting taking into consideration the legal requirement that spending should not exceed revenue by more than 3% of GDP. It shifts the psychology of budgeting from “needs” to an “availability of resources”

In line with the Part II, Sections 11-17 of the Fiscal Responsibility Act (FRA), 2007, the MTEF shall contain the following for the next three financial years:

- Macro-economic framework;
- Fiscal strategy paper;
- Expenditure and revenue framework;
- Consolidated debt statement; and
- Statement on contingent liabilities.

### **Objectives of MTEF**

- To improve macroeconomic balance, including fiscal discipline through good estimates of the available resource envelope, which are then used to make budgets that fit squarely within the envelope.
  - To improve inter and intra sectoral resource allocation by effectively prioritising all expenditure (on the basis of the government’s socio-economic programme) and dedicating resources only to the most important ones.
  - To increase greater budget predictability as a result of commitment to more credible sectoral budget ceilings.
  - To increase greater political accountability for expenditure outcomes through legitimate decision-making.
  - To make public expenditure more efficient and effective, essentially by allowing line ministries greater flexibility in managing their budgets in the context of hard budget constraints and agreed policies and programmes.
- ii. **Budget Call Circular** is also known as the Budget Circular. It is a budget manual aimed at providing guidance to Ministries, Departments and Agencies (MDAs) in preparing the Medium Term Expenditure Framework (MTEF) and annual budget estimates of revenue and expenditure.
- iii. **Difference between MTEF and budget call circular**

The difference is that the MTEF is a 3-year projection, while the call circular is an annual estimation, which forms part of the MTEF.

**b. Feasibility of Primary Health Centres PPP project PPP guiding principles.**

**i. Value for money**

It states that the project should be cheaper when executed by PPP than when executed by the public entity. In this case, the private sector will provide all the financing for the project and therefore the Ministry would not spend any money on the project. Thus, value for money is ensured in the proposal.

**ii. Risk allocation**

The risk associated with PPP project should be shared by both the public and the private entities or at best, the public entity should transfer the risk to the private sector. In case the Ministry proposes to immune the private sector of risk associated with the project of PPP. This will be contrary to the guiding principles of PPP. The risk identified should be shared or transferred to the private sector.

**iii. Ability to pay**

Affordability of the service is paramount in PPP considerations.

Existing primary health services are free throughout the country and introducing PPP will mean paying for the services by the users. This is likely to make the services unaffordable. On account of ability to pay, the project is likely to fail.

**iv. Local content and technology transfer**

The project proposes the use of local materials and skills, which meets the requirement of the PPP guiding policy.

**v. Environment, climate and social safeguards**

The project is environmentally friendly and therefore it meets this requirement of the guiding policy.

**vi. Safeguard of public interest and consumer rights**

The project seeks to benefit the entire citizens.

**Risk associated with the Primary Health Centre projects**

**i. Exchange, default and interest rate risks**

This may give rise to exchange rate risk, default risk and interest rate risk and all these risks should be appropriately allocated in the PPP contract, if the project is to be embarked upon.

**ii. Demand risk.** The risk that the project will be executed and the patronage will be lower than anticipated, leading to revenue fall to the private sector. Allocation of demand risk is necessary.

- iii. **Availability risk.** The risk associated with the inability of the private sector to deliver the project at the agreed time.
- iv. **Construction risk.** The risk associated with strikes, physical collapse of structure, accidents on the project, etc.

### **Examiner’s report**

Part (a) of the question tests candidates’ knowledge of Medium Term Expenditure Framework (MTEF), Budget Call Circular” and the main difference between the two, while part (b) tests the principles and associated risks of the feasibility of the proposed primary health centres under Public-Private Partnership (PPP).

Majority of the candidates attempted the question and performance was above average.

The commonest pitfalls were the inability of the candidates to have in-depth knowledge of Medium Term Expenditure Framework (MTEF) and Public- Private Partnership (PPP).

Candidates are advised to make use of the Pathfinder and Study Text of the Institute for better performance in the Institute’s future examinations.

### **Marking guide**

	<b>Marks</b>	<b>Marks</b>
a.i. Explanation of Medium Term Expenditure Framework(MTEF)	<b>2</b>	
Four objectives	<b>4</b>	
ii. Explanation of Budget Call Circular	<b>2</b>	
iii. Difference between MTEF and Budget Call Circular	<b><u>2</u></b>	<b>10</b>
<b>b.i. Public-Private Partnership policy:</b>		
Identification of three principles	<b>3</b>	
Explanation of three principles identified	<b>3</b>	
<b>ii. Associated risks of the feasibility of the proposed primary health centres</b>		
Identification of two risks	<b>2</b>	
Explanation of two risks identified	<b><u>2</u></b>	<b><u>10</u></b>
<b>Total</b>		<b><u>20</u></b>

## **SOLUTION 5**

### **a. Costs excluded from costs of inventories**

The following costs are excluded from the cost of inventories and recognised as expenses in the period in which they are incurred:

- i. Abnormal amounts of wasted materials, labour or other production costs;
- ii. Storage costs, unless those costs are necessary in the production process prior to a further production stage;
- iii. Administrative overheads that do not contribute to bringing inventories to their present location and conditions; and
- iv. Selling costs.

### **IPSAS 12 disclosure**

The standard stipulates that the financial statements should disclose the following:

- i. The accounting policies adopted in measuring inventories, including the cost formula used;
- ii. The total carrying amount of inventories and the carrying amount in classifications appropriate to the entity;
- iii. The carrying amount of inventories carried at fair value less cost to sell;
- iv. The amount of any reversal of any written-down that is recognized in the statement of financial performance in the period;
- v. The circumstances or events that led to the reversal of a written-down of inventories;
- vi. The carrying amount of inventories pledged as security for liabilities; and
- vii. The cost of inventories recognised as an expense during the period or the operating costs applicable to revenues, recognised as an expense during the period, classified by their nature.

### **b. Ratios commonly used to analyse the degree of indebtedness of a country**

There are four major ratios or indicators commonly used to determine the extent of indebtedness of any country. These ratios are explained briefly below:

#### **i. External debt service to export ratio.**

This relates total external debt service to export of goods and services. It reflects the level of export earnings committed to servicing external debts. Since external debts are denominated in foreign currency, then servicing and repayment must be in foreign currency which can only be procured through export earnings.

#### **ii. External debt stock to export ratio.**

The ratio relates to the availability of foreign exchange earnings in the economy. It is an important indicator since foreign exchange is needed to pay off foreign debts. It reflects the extent to which total exports of goods

and services can be used to liquidate external debt outstanding. The movement in this ratio is an indicator of the nation's debt service capacity.

iii. **External debt stock to nominal gross domestic product ratio.**

This ratio measures the extent to which total domestic output can be deployed to defray total outstanding external debt obligations. The higher this ratio, the greater the degree of external debt burden.

iv. **External debt service to nominal gross domestic product ratio**

This ratio relates to the proportion of total domestic output set aside for servicing external debt. The ratio will be rising while total domestic output is falling.

### **Sources of external debt**

Nigeria has contracted a number of debt obligations from various sources, some of which are discussed briefly below:

i. **Paris club of creditors.**

The club came into existence in 1956 as a result of outstanding balances in the books of Argentina and some European countries. Since then, it has become a common forum where debtor nations and creditor countries meet to discuss debt repayment problems. The club actually represents only government guaranteed creditors. Membership of the club includes United States of America, United Kingdom, Federal Republic of Germany, France and Canada which guaranteed the export activities of their nations through their official export credit guarantee agencies. When the recipient nation's government is unable to pay the foreign exchange equivalent of the domestic currency cover paid by the importer, it then becomes government owed debt to creditor nations.

ii. **London club of creditors.**

These are mainly uninsured and unguaranteed debts extended by commercial banks to nationals of debtor countries. Members of the club are commercial banks mainly of industrialised nations. The first meeting of the London club was convened in 1976. Such meetings are held to discuss repayment problems and conclude restructuring agreements.

iii. **Multilateral creditors.**

These are international institutions funded by member nations. They include the World Bank and its affiliates such as International Monetary Fund (IMF), African Development Bank (AfDB), European Investment Bank (EIB), International Development Assistance (IDA), International Fund for Agricultural Development (IFAD), that provide credit for development purposes, balance of payment support, as well as private ventures.

iv. **Promissory note creditors.**

These are providers of uninsured trade credits, arising mainly from trade arrears accumulated between 1982 and 1983. The debts were refinanced by the issuance of promissory notes to the creditors.

v. **Bilateral creditors**

Bilateral credit is provided by a government to another government. Such credits are intended for development purposes in the recipient countries. Examples are Official Development Assistance (ODA), sometimes provided on bilateral basis with a minimum grant element of 25 per cent and export credits guaranteed by export credit agencies of exporting countries.

vi. **Private sector creditors**

These are usually short-term credits extended by commercial banks, institutional investors and individual foreign suppliers in form of suppliers 'or buyers' credits.

### **Examiner's report**

Part (a) of the question tests candidates' knowledge on the provisions of IPSAS 12 as it relates to costs that are excluded from the cost of inventories and disclosure requirements in the financial statements. Part (b) tests candidates' knowledge on ratios commonly used to analyse the degree of indebtedness of a country and the sources of external debts.

Few candidates attempted the question and performance was below average. The commonest pitfalls were the inability of the candidates to mention the costs that are excluded from the cost of inventories and disclosure requirements of IPSAS 12 on inventories. Also they were unable to identify ratios commonly used to analyse the degree of indebtedness in a country. Majority of the candidates used investment ratios for the analysis.

Candidates are advised to have adequate knowledge of relevant provisions of IPSAS and make use of the Pathfinder and Study text of the Institute for better performance.

### **Marking guide**

	<b>Marks</b>	<b>Marks</b>
a. Four exceptions to the costs of inventories	4	
Four requirements to be disclosed in the financial statements	<u>6</u>	10
b. <b>Ratios commonly used to analyse the degree of indebtedness of a country:</b>		

Identification of three ratios used	3	
Explanation of three ratios identified	3	
<b>Sources of external debt:</b>		
Identification of two sources	2	
Explanation of two sources identified	<u>2</u>	<u>10</u>
<b>Total</b>		<b><u>20</u></b>

## SOLUTION 6

### (a) **Basic principles guiding expenditure assignment**

The basic principles that should guide expenditure assignment as suggested by Anwar Shah are discussed briefly below:

#### i. **Efficient provision of public services**

Public services are provided most efficiently by the jurisdiction having control over the minimum geographic area that would internalise benefits and costs of such provision. In this case, local governments are better placed to meet the need of the local residents being the closest to the grassroots.

#### ii. **National equity or fairness**

It is commonly argued that effective redistribution is possible only through national programmes, that is, progressive income taxes and transfers to the poor. Allowing local subnational governments to carry out redistributive policies are likely to drive out the rich.

#### iii. **Provision of quasi-private goods**

Modern governments provide many services that, by nature, are essentially private goods, for example, health, education and social insurance. The national government's involvement is nevertheless justified to ensure horizontal equity and minimum standards of service in all jurisdictions.

#### iv. **Preservation of the internal common market**

Preservation of an internal common market is an important area of concern to most nations undertaking decentralisation. Sub-national governments, in their pursuit of labour and capital, may indulge in beggar-thy-neighbour policies and, in the process, erect barriers to goods and factor mobility. Decentralisation of government regulatory functions may create the potential for disharmonious economic relations among sub-national units. In order to prevent misuse of power, the Constitution guarantees free domestic flow of goods and services that may be the best alternative to assigning regulatory responsibilities solely to the national government.

## v. **Economic stabilisation**

It is customary to argue that the federal government should be responsible for stabilisation policies, because such policies cannot be carried out effectively by local jurisdictions. Monetary policy has little scope for being carried out by local governments.

### **Drawbacks of expenditure assignment**

#### i. **Lack of formal assignment**

The absence of a formal assignment of responsibilities among the multi-levels of government is a common problem with expenditure assignment.

A formal assignment of responsibilities contributes to the stability of the system of intergovernmental finances. From a fiscal management perspective, a formal expenditure assignment also introduces an important element of certainty for budget planning at all levels of government.

#### ii. **Inefficient assignments**

Another common problem in the assignment of expenditure responsibilities is the inefficiency of the assignments. First is the issue of capital expenditure responsibilities. The problem has been the assignment of all capital expenditure responsibilities at the central level, independently of the level of government responsible for the provision of the services associated with the capital infrastructure. This assignment is guided either by the capacity to finance large projects or by the belief that only central government officials are qualified to make capital investment decisions. However, the full assignment of capital expenditure responsibilities is inappropriate.

#### iii. **Ambiguity in certain assignments**

Despite the ambiguity in assignments, there are few open conflicts or disputes that have taken place between the central and sub-national governments in terms of assignment of expenditure responsibilities. For example, there are arguments on whose responsibility it is to maintain internal security in Nigeria when the police force is under the control of the central government while the governors have little or no control over the police.

#### iv. **Co-sharing of responsibilities**

The co-sharing of responsibilities within a particular public service is likely to cause confusion leading to inefficiencies. In the case of education, it would appear to be, for the most part, a local (or state) activity. Many key decisions in educational policies are carried out at the central level in many countries, for example, the Federal Ministry of Education may be responsible for the construction of school buildings, curriculum design, teacher training and production of textbooks. Activities that are reserved for the local level may be the recruitment and hiring of teachers, however,

even in these cases, local authority is limited because of the dual subordination of school officials to both the Federal Ministry of Education and to the sub-national government. Similar issues to those in the education sector arise in other sectors, such as health. The co-sharing or fragmentation of responsibilities within a particular public service has the disadvantage that it is likely to cause confusion, leading to inefficiencies.

**b. Uses of budget**

Budgets are used for the following:

**i. Planning**

Budgets are plans in which monetary values are assigned to what are to be achieved in a determinable future time, for example, a year.

**ii. Communication**

Budgets assist in communicating horizontally and vertically. When budgets are being prepared, individuals, groups, communities and associations will inform government about their areas of interests. This is upward communication. When the budget is approved, government reads it to members of the public and publishes it in newspapers. This is communicating downwards.

**iii. Motivation**

Government motivates its staff through promotions and improved conditions of service, for assisting in the full and successful implementation of the budget.

**iv. Standard for measurement of performance**

Since a budget is a target, it is a measure of performance. What is achieved is recorded and compared with the targeted of performance. The process of implementation draws management attention to problematic areas.

**v. Evaluation of economic and social policy**

Budgets are used to solve social problems of inflation and unemployment.

**vi. Cost reduction technique project appraisal**

Evaluation of operations and procedures may result in cost savings.

**Steps to be followed to ensure completeness of using National Chart of Accounts (NCOA) for budgeting**

The following steps should be taken to ensure completeness of using the National Chart of Accounts (NCOA) for budgeting. This involves identifying:

- i. The government institutions (cost and revenue centre) from the hierarchy of administrative list and codes provided in the chart of accounts;
- ii. The economic items that would be executed during the fiscal year;
- iii. The functions intended to be performed by government institutions (revenue and cost centre);
- iv. The programmes intended to be carried out by government institutions;
- v. The sources of financing the budgeted amount for each budget line; and
- vi. The planned location for the economic transactions or government institutions.

### Examiner's report

Part (a) of the question tests candidates' knowledge of the principles guiding expenditure assignment and its drawbacks, while part (b) requires the candidates to discuss uses of budget and steps to be followed to ensure completeness of using the National Chart of Accounts (NCOA) for budgeting.

Few candidates attempted the question and their performance was average.

The commonest pitfalls were the inability of the candidates to identify principles guiding expenditure assignment and their drawbacks. Also, candidates could not discuss the steps to be followed to ensure completeness of using the National Chart of Accounts (NCOA) for budgeting.

Candidates are advised to have adequate knowledge of relevant provisions of National Chart of Accounts (NCOA) and other regulations relating to public sector account for better performance in future examinations.

### Marking guide

	<b>Marks</b>	<b>Marks</b>
<b>a. Basic principles guiding expenditure assignment:</b>		
Identification of four principles	2	
Explanation of four principles identified	4	
<b>Drawbacks:</b>		
Identification of two drawbacks	2	
Explanation of two drawbacks identified	<u>2</u>	10
<b>b. Budgets:</b>		
Identification of four uses of budget	2	
Explanation of four uses of budget identified	4	
Four steps of National Chart of Accounts for budgeting	<u>4</u>	<u>10</u>
<b>Total</b>		<b><u>20</u></b>

# **THE INSTITUTE OF CHARTERED ACCOUNTANTS OF NIGERIA**

## **SKILLS LEVEL EXAMINATION – MAY 2021**

### **CORPORATE STRATEGIC MANAGEMENT & ETHICS**

Time Allowed: 3<sup>1</sup>/<sub>4</sub> hours (including 15 minutes reading time)

**INSTRUCTION: YOU ARE REQUIRED TO ANSWER FOUR OUT OF SIX QUESTIONS IN THIS PAPER**

**SECTION A: COMPULSORY QUESTION (40 MARKS)**

#### **QUESTION 1**

Davidson Ltd is an automobile company based in Aba, Nigeria. It has been in existence for nearly eighty years. The company originally began by supplying components for small vehicles and was producing equipment during the Second World War. However, in the nineties, it underwent rapid transformation under the founder's son, Tony. Tony has diversified the company into supplying tricycle components and spare parts to the Nigerian market. The company now employs some 500 staff around the country and is well known for the quality of its workmanship. The company operates under three divisions. One division is concerned with the manufacture of tricycle components, a second division with spare parts and the third division undertakes specific one-off work in automobile and automobile design. The tricycle component division is by far the biggest and accounts for seventy per cent of the total turnover. The smaller specialist automobile design division is by far the most profitable in terms of return on capital employed and it relies a great deal on a senior engineer, Emmanuel, who has been with the company for more than twenty years.

Recently, the company was invited to send sample components to a Japanese car manufacturer who is keen to commence operations in Nigeria. These components are needed within eight months. However, Mr. Tony is concerned that his company may not be able to meet the strict standard imposed by the Japanese manufacturer. The deal, if it is sealed, would establish Davidson Ltd as an important auto component supplier in South East Asia, thus, opening up the potential for exports. Tony realises that the export potential is great and that any initiative towards exports would get full backing from the government. While, this is happening, the spare parts division is also showing signs of growth. Recent reforms in part of North Africa has made companies in that region to be very keen to modernise and innovate their old manufacturing processes and Davidson had received business enquiries from the region.

Tony faces a dilemma. He knows that the opportunities that have presented themselves would give the company a global presence. At the same time, he knows that the company is solely under his management as chief executive. Tony holds eighty percent of the shares. The other two directors hold ten percent each. Although the other divisions have managing directors, they rely on him for decision making. The current managing directors are family members. One is a

brother in-law and the other a cousin. Their knowledge of the industry and its workings is generally poor. He made these appointments to please his father so that he could be left to run the company as he deems fit. Tony knows that to satisfy the Japanese auto manufacturer, he needs to reorganise the automobile design division and consider issues of Total Quality Management (TQM). This will take time and requires that he delegates responsibilities to other divisions. However, he feels uncomfortable doing this.

The company is at crossroads. The three divisions are doing well, but could do even better, if their old, bureaucratic and hierarchical systems are reviewed.

Indeed, some of the younger managers and engineers would prefer a more open, flexible management structure. Some of them have studied both engineering and management in Holland and the United States, and are keen to see key innovations in place. While Tony knows that these opportunities highlighted above should not be missed, he has to ensure that they are handled successfully so that the future is secured for Davidson Ltd. This requires that he takes some tough decisions in restructuring the company within a few months.

**Required:**

Write a report to the Chief Executive of Davidson Ltd addressing the following issues:

- a.
    - i. The key resources and implementation issues facing Davidson Ltd in the scenario above. (15 Marks)
    - ii. How the key resources will affect strategic choices (7 Marks)
    - iii. How implementation issues will affect strategic choices (8 Marks)
  - b. How should Tony restructure the company? (10 Marks)
- (Total 40 Marks)**

**SECTION B:**

**(60 MARKS)**

**INSTRUCTION: YOU ARE REQUIRED TO ANSWER ANY THREE OUT OF FIVE QUESTIONS IN THIS SECTION**

**QUESTION 2**

“A risk manager is not a line manager and is not directly responsible for risk management but might help with the management of specific risks.”

**Required:**

- a.
- i. Review the statement above within the context of the role of a risk manager. (7 Marks)
  - ii. Evaluate **THREE** specific risks that can be managed. (3 Marks)
- b. Discuss the purposes of risk monitoring. (10 Marks)

**(Total 20 Marks)**

**QUESTION 3**

- a. A friend of yours, who invested heavily in the ordinary shares of a company that has been struggling in recent years, came to you for advice. He is confused as to what he can do to protect his investment.

**Advise him on:**

- i. How he can use his voting rights as a shareholder to secure his investment. (6 Marks)
  - ii. Limitations to the use of his voting rights. (4 Marks)
- b. Using the Institute of Chartered Secretaries and Administrators (ICSA) guidance note, explain responsibilities of board of directors that should not be delegated. (10 Marks)

**(Total 20 Marks)**

**QUESTION 4**

Gray, Owen and Adams (1996) provided a framework for classifying different groups of people and their views of the relationship between business organisations and society.

**Required:**

- a. State and explain **SEVEN** levels or positions on social responsibility by Gray, Owen and Adams (1996). (15 Marks)

- b. State Johnson and Scholes **FOUR** possible ethical stances for a business entity. (5 Marks)

**(Total 20 Marks)**

### **QUESTION 5**

- a. Discuss **FOUR** of the different ways in which agency conflict can arise. (5 Marks)
- b. With the aid of a diagram, explain the concept of “As Low as Reasonably Practicable” (ALARP) principle. (5 Marks)
- c. Risk Assessment is a very important activity in an organisation. With the use of a table, relate ‘Impact and Likelihood’ to ‘Objective and Subjective’ risk perception. (5 Marks)

**(Total 20 Marks)**

### **QUESTION 6**

Mr John, a professional accountant, is the Chief Executive Officer of a company quoted on the Nigerian Stock Exchange. He also owns about 20% of the company’s shares worth hundreds of millions of Naira. But due to a number of factors, the company started performing poorly to such an extent that the unpublished financial report just forwarded to him shows that a huge loss will be declared by the company. In anticipation of a slide in the price of the company’s shares, Mr John instructed his stockbroker to help him sell half of his share in the company for possible repurchase when the price eventually falls after the financial statements are published. He made substantial amount of money from this transaction.

- a. Analyse the action of Mr. John using:
- i. The Model Code. (3 Marks)
  - ii. Critical theory. (3 Marks)
  - iii. Moral development of accountants. (4 Marks)
- b. Advise Mr. John on the fundamental ethical principles which professional accountants are expected to comply with. (10 Marks)

**(Total 20 Marks)**

## SECTION A

### SOLUTION 1

#### DAVIDSON LTD: STRATEGIC DIRECTION

To: Tony

From:

Date: May 4, 2021

Subject: Strategy Implementation Issues

- a) (i) **Key Resources and Implementation Issues:**
- 1) **Human Resources:** include both full-time and part-time employees, and the skills and competencies available to an entity.  
The automobile design division has the following human resource issues:
    - Mr Emmanuel is the only one competent enough to run the automobile design division such that his exit from the company will have serious consequences on the division's performance.
  - 2) **Management:** this describes the size, historical performance, level of competence and structure of management including decision making process.
    - Davidson has issues with competence of the management, as only Tony has the requisite managerial skill and experience to run the company.
    - Centralised decision making and bureaucracy inherent in the company's management system could impair the firm's ability to take advantage of business opportunities opening up in Asia and North Africa.
  - 3) **Non-current Assets:** These are physical assets such as machinery and equipment, etc.
    - Tony's lack of confidence in Davidson's ability to meet quality standards of overseas customers suggests that there are issues with the production process which may affect the company's product quality.
  - 4) **Raw Materials:** These are current assets used in the course of production.
    - No mention was made on the state of Davidson's raw materials or reliability of its source.
  - 5) **Intangible Resources:** These include intellectual rights, patent rights, copyrights, goodwill and reputation.
    - The scenario indicates that Davidson enjoys some level of goodwill and reputation with its customers.

- 6) **Financial Resources:** These include capital, cash and other liquid assets.
- The scenario was silent on the state of Davidson's financial resources.
- 7) **Internal Control and Organisation:** These are mechanisms, structures, rule and procedures put in place to ensure efficiency and effectiveness in the use of financial and other resources, decision making and coordination of affairs of the organisation.
- The divisional organisation structure of the company has proven to be effective so far. However, the bureaucratic system and centralised decision making could hinder the success of the company's strategies.
- (ii) Resource issues inherent in Davidson's strategic choice can be identified and evaluated under the strategies the company adopted, which can be categorised into the following:
- a. **Corporate Level and International:** choice of line of business of the entity and market where products will be sold.
- Davidson in response to emerging opportunities has decided to produce for both local and international markets. Resource issues that can adversely affect the success of this strategy are:
    - i. **Human Resources:**
      - The Company currently has shortage of talents who could head the automobile design division. Currently, Mr Emmanuel who has served Davidson for over two decades is the only employee competent enough to manage this division. His exit from the company, which is inevitable and may be imminent, could adversely affect the automobile design division and thereby impair the company's ability to serve both local and international markets.
    - ii. **Management:**
      - Tony is currently the only competent member of the board. To pursue a strategy focused on producing high quality output to serve both local and international markets will require an effective board and good corporate governance structure which are currently lacking.
      - The effectiveness of the board could also be adversely affected by its size, which is just 3. This could limit the board's ability to generate requisite ideas that will improve quality of products.

- iii. **Non-current Assets:**
    - Tony's lack of confidence in the company's ability to meet quality requirements of the international markets suggests inherent weaknesses in the company's production processes and systems.
  - iv. **Internal Control and Organisation:**
    - The organisational structure which is largely divisional has worked well for the company so far. However, bureaucracy and centralised decision making could hamper Davidson's ability to effectively expand to meet the needs of international market.
- b. **Business Strategies:** This involves choosing among, cost leadership, differentiation and focus strategies.
- c. **Development Direction and Methods:** These are the choices of growth strategies the company decided to adopt. Alternatives include internal (organic) and/or external growth strategy (mergers, acquisition, etc).
- From the given scenario, the company has chosen to adopt internal growth strategy through reliance on its ability to provide needed resources for growth from within.
  - However, resource issues which include human resources, management, non-current assets and organisational structure could adversely affect Davidson's ability to achieve this growth strategy.
- (iii) **Issues of implementation affecting strategic choices:**  
 Three criteria for evaluating strategic choices are:
- Suitability
  - Feasibility
  - Acceptability
    - **Corporate level and international strategy:** If the firm is to take advantage of emerging opportunities to serve the international markets, it needs to implement changes in the management structure.
      - Inherent weakness of the management structure must be addressed.
      - The centralised decision making process could also hamper the firm's international strategy.
    - **Shortage of managerial talent:** which made Mr. Emmanuel the only individual competent enough to manage the automobile design division puts the implementation of the firm's growth and international strategy at risk.

- b. Restructuring of Davidson should centre on addressing the identified resource issues:
- i. The company currently possesses a pool of young and qualified talents that if provided needed training and opportunity, could fill Davidson's identified talents gap that can succeed Mr. Emmanuel.
    - This skills gap can also be addressed through appropriate recruitment strategy.
  - ii. Management: Management restructuring is essential for Davidson to achieve success in its growth and corporate level strategies. This can be achieved through:
    - Expansion of board membership to allow for improved management effectiveness through the appointment of outside directors.
    - The firm could consider leveraging on the current pool of qualified young talents in its possession.
    - Training and development of board members to improve their skills and competence levels.
    - Decentralisation will bring decision making closer to the points of activity. This is in line with the philosophy of TQM which it plans to adopt.
    - Removal of bureaucratic bottlenecks in decision making process.
  - iii. Non-current assets: production process improvement could be achieved through adoption of TQM philosophy or other appropriate quality improvement management philosophies. This may lead to improved product quality.

### **Examiner's report**

This compulsory question requires candidates to write a report addressing the following issues:

- a.
  - i. Key resources and implementation issues confronting a company in the execution of the strategy in the given scenario;
  - ii. how key resources affect strategic choices; and
  - iii. how implementation issues affect strategic choices.
- b. Restructuring of the company.

Almost all the candidates attempted this question, but performance was poor.

The common pitfall was that candidates could not link the resources and implementation issues to the scenario. This implies that they were not able to demonstrate the skill of practical application of knowledge.

Candidates are admonished to develop skills that will enable them apply knowledge to practical situations.

## Marking guide

	Marks	Marks
(a) i. Heading to Memo	1	
Listing key resource and implementation issues (7 points X 1 Mark each)	7	
Explanation (7 points X 1 mark each)	<u>7</u>	15
ii. Listing points (3 points X ½ Mark )	1½	
Explanation and relating to scenario	<u>5½</u>	7
iii. Explanation of how implementation will affect strategic choices		8
(b) Mentioning and explanation of areas of restructuring		10
		<b><u>40</u></b>

## SOLUTION 2

- a) Risk managers are staff managers who only advise line managers in functional areas on risk management. Except in relation to some risks, they do not have direct responsibility for managing specific risks.
- (i) The role of a risk manager includes:
- 1) Helping with the identification of risks.
  - 2) Establishing 'tools' to help with the identification of risks.
  - 3) Establishing modelling methods for the assessment and measurement of risks.
  - 4) Collecting risk incident reports (e.g. health and safety incident reports).
  - 5) Assisting heads of department and other line managers in the review of reports by the internal auditors.
  - 6) Preparing regular risk management reports for senior managers or risk committees.
  - 7) Monitoring 'best practice' in risk management and encouraging the adoption of best practice within the entity.
- (ii) Types of specific risks that can be managed by risk managers include:
- 1) Insurance.
  - 2) Health and safety.
  - 3) Information systems and information technology.
  - 4) Human Resources.
  - 5) Financial or treasury.
  - 6) Compliance (with specific area of the law and industry regulations).

b) Purposes of Risk Monitoring

The purposes of risk monitoring are to ensure that:

- i) There are processes and procedures for identifying risk, and that these are effective.
- ii) There are internal controls and other risk management processes in place for managing risks.
- iii) Risk management systems are effective.
- iv) The level of risk faced by the entity is consistent with the policies on risk that are set by the board of directors.
- v) Failures in the control of risk are identified and investigated.
- vi) Weaknesses in risk management processes are identified and corrected.

**Examiner’s report**

This question on risk management tests the role of risk managers and the purpose of risk management.

Many candidates attempted the question and performance was above average. However, those candidates that did not perform well could not clearly identify role of risk managers in the risk management process.

Candidates are advised to effectively cover the materials in the Study Text.

**Marking guide**

	Marks	Marks
(a) i. Role of a risk manager 7 x 1 mark	7	
ii. Types of specific risk 3 x 1 mark	<u>3</u>	10
(b) Purposes of risk monitoring 5 x 2 marks		<u>10</u>
<b>Total Marks</b>		<b><u>20</u></b>

**SOLUTION 3**

- a. i. Shareholders can secure their investments by voting for or against:
- Election or re-election of directors.
  - Reappointment of the company’s auditors.
  - Approving a dividend proposed by the directors.
  - Approval of directors’ remuneration report.
  - Approval of new share incentive scheme.
  - Approval of proposed major transactions, such as mergers and acquisitions.

- ii. The following are limitations to the use of voting rights by shareholders:  
Individual shareholders might own only a small portion of the company's shares, as such, may be unable to influence management decisions. Shareholders are considered significant only if they own more than 3% of the shares of the company. Minority shareholders need to organize themselves into blocks to use their votes in concert to have any chance of obtaining majority of the votes.

Some shareholders may be unable to use their votes because

- A fund manager manages their shareholdings for them, thus limiting their access to direct voting.
- Institutional investors might engage in stock lending, a practice which cedes the voting right to the borrower for the duration of the agreement.
- If owned shares are for companies located abroad, there might be restrictions on foreign shareholders' ability to vote.

- b. According to ICSA guidance, responsibilities of board of directors that cannot be delegated are:
- i. Strategy and management: Overall management of the company, involving approval of long-term objectives, commercial strategies and annual budget. Others include oversight of operations, review of performance of the company or group and decision about expanding operations into new product areas or new markets and decision about closing any significant part of operations.
  - ii. Structure and capital: changes relating to capital structure of the entity including its management and control structure. This also includes changes in company status.
  - iii. Financial reporting and control: approval of financial statements, dividend policy, and treasury policy such as foreign currency exposures and use of financial derivatives.
  - iv. Internal controls: ensuring that there is a sound system of internal control and risk management by monitoring the systems that are in place.
  - v. Contracts: approval of major capital projects and strategically significant contracts. Approval of loans or foreign currency transactions above a stated amount. Approval of all major acquisitions and disposals.
  - vi. Communication: approval of all communications to shareholders and the stock market, and all major press releases.
  - vii. Board membership and other appointments: decisions about appointments to the board, appointment of company secretary and the appointment of company auditors.
  - viii. Remuneration: decision about remuneration of directors and senior managers, including approval of major share incentive schemes (which may also require the approval of shareholders).

- ix. Delegation of authority: deciding what responsibilities should be delegated to board committees and the division of responsibilities between the chief executive officer and board chairman.
- x. Corporate governance matters: such as communications with the company's shareholders, deciding on balance of interest between the shareholders and other stakeholders and ensuring that independent non-executive directors should remain independent.
- xi. Policies: approval of company policies such as health and safety policy, and environmental policy.
- xii. Other issues: such as decisions affecting company's contribution to employees' pension fund, appointment of company's main professional advisers and decision to prosecute, defend or settle major litigations involving costs and payments above specified amount.

### Examiner's report

This question on Corporate Governance tests in part (a) the use of shareholders' voting right to secure their investments and the limitations to the use of this power and part (b) tests the explanation of board responsibilities that cannot be delegated as enunciated by ICSA guidance note.

Many candidates attempted this question, but performance was below average.

The common pitfall was the inability of some candidates to relate voting rights to securing shareholders' interest in a company. Some others were unable to state the limitations to this right. Also, a sizable number of candidates did not know those board responsibilities that ICSA guidance note prohibits from board delegation.

Candidates at the skills level are admonished to give attention to practical application of the knowledge they had acquired.

### Marking guide

	Marks	Marks
(a) i. Identification of actions to secure investment (6 points x 1 mark)	6	
ii. Limitations of voting rights (2 points x 2 marks)	<u>4</u>	10
(b) ICSA's guidance notes on responsibilities that cannot be delegated (10 points x 1 mark)		<u>10</u>
<b>Total</b>		<b><u>20</u></b>

## SOLUTION 4

The 7–Level classification was propounded by Gray, Owen and Adams (1996) on social responsibility.

Level	Comment
<b>1. Pristine capitalists</b>	Pristine capitalists believe that: <ul style="list-style-type: none"> <li>• The only responsibility of a company is to make money for its shareholders' and to maximize shareholders' wealth.</li> <li>• Shareholders have invested the risk capital and are the legal owners of their company. It therefore follows that only the shareholders should have any right to decide the strategies and policies of the company.</li> <li>• The Pristine capitalist view is based on rational self-interest and putting individual self-interest before the collective benefits of society as a whole. Believes that market economy is a good thing.</li> <li>• There are no environmental problems because human beings are inventive and adaptable; the market economy will find solutions to the world's environmental problems.</li> </ul>
<b>2. Expedients</b>	<ul style="list-style-type: none"> <li>• Individuals who have an 'expedient' view also believe that the main aim of a company is to maximize the wealth of its shareholders. However, some concessions have to be made at times to other stakeholders in order to put the company in a stronger position, strategically. By doing so, it is more likely to maximize shareholders' wealth.</li> <li>• This 'expedient' position is taken by people with a longer-term view than pristine capitalists, who recognize that economic success can only be achieved by companies which accept certain social responsibilities.</li> </ul>
<b>3. Proponents of the social contract</b>	These individuals believe that: <ul style="list-style-type: none"> <li>• Companies and other organisations exist at the will of society, and there is a 'social contract' between the company and the society in which it operates.</li> <li>• Companies therefore have a responsibility and an obligation to respond to the needs of society. A company must therefore act in accordance with standards of behaviour of the society in which it operates.</li> <li>• A company must therefore act in accordance with standards of behaviour of the society, otherwise, that</li> </ul>

	<p>society will not allow the company to continue, if it does not.</p> <ul style="list-style-type: none"> <li>• It is right-based perspective in which the rights of all human beings are considered to be significant. Holders of this view would argue that government regulations might be necessary for the market economy, because free market prices do not properly reflect all the effects that companies have on society and its environment, e.g. pollution and other environmental damages.</li> </ul>
<b>4. Social ecologists</b>	Individuals taking this position are concerned about the social environment. They believe that companies and other large organisations have been responsible for creating social and environmental problems. They should therefore be held responsible for dealing with those problems and finding solutions to them.
<b>5. Socialists</b>	These individuals believe that there should be a significant re-adjustment in the ownership of assets and in the structure of society. They criticize all forms of domination, including the governments of a nation state, concentrated economic power (large companies) and authoritarianism.
<b>6. Radical feminists</b>	These individuals believe that society and social systems are dominated by an aggressive masculine view of the world. This is harmful and wrong. There is an urgent need for more feminine values, such as care, compassion and cooperation to guide attitudes,
<b>7. Deep ecologists/deep Greens</b>	These individuals are at the opposite extreme to pristine capitalists. They believe that human beings have no greater right to decisions and therefore business decisions should be based on concerns for all forms of life.

To a greater or lesser extent, there is an acceptance of the views in levels 1 to 3 within business. Levels 4 – 7 are all based on a view that the world should be made a better place, but to do this, there must be radical re-assessment of basic assumptions in society.

- b) Johnson and Scholes' four possible ethical stances are consistent with existing diverse view of corporate governance. These ethical stances are
- i) Maximizing short-term shareholders interests (the 'least ethical' of the four stances).
  - ii) Maximising long-term shareholder interests.
  - iii) Multiple stakeholder obligations: recognising obligations to different stakeholder groups.
  - iv) Being a shaper of society.

## Examiner's report

This question on Ethics tests candidates' knowledge of Grey, Owen and Adams framework on the levels on social responsibility in part (a), whilst part (b) tests ethical stances of business entities as stated by Johnson and Scholes.

Many candidates attempted the question, but performance was just average, as several candidates did not have a good grasp of the Johnson and Scholes framework in part (b).

Candidates are advised to master all the frameworks and models specified in the syllabus.

## Marking guide

	Marks	Marks
(a) 7 Levels of social responsibility (7 x 2 marks)	14	
Conclusion	<u>1</u>	15
(b) Four ethical stances (4 ethical stance X 1 <sup>1</sup> / <sub>4</sub> marks each)	<u>5</u>	<u>5</u>
<b>Total</b>		<b><u>20</u></b>

## SOLUTION 5

- a. Ways in which Agency Conflict can arise are:
- Moral Hazards
  - Effort Level
  - Earnings Retention
  - Risk Aversion
  - Time Horizon

### i) **Moral hazards**

Moral hazard sets in and can lead to agency conflicts when provisions are not made for a manager to receive benefits from his or her position.

These include all the benefits that come from status, such as a company car, a private chauffeur, use of company airplane, lunches, attendance at sponsored sporting events, and so on.

Jensen and Meckling suggested that a manager's incentive to obtain these benefits is higher when he has no shares, or only a few shares in the company.

ii) **Effort level**

- Managers may work less hard than they would if they were the owners of the company. The effect of this 'lack of effort' could be lower profit and a lower share price.
- The problem may exist in a large company at middle levels of management as well as at senior management level.
- The interests of middle managers and senior managers might well be different, especially if senior management are given pay incentives to achieve higher profits, but the middle managers are not.

iii) **Earnings retention**

- The remuneration of directors and senior managers is often related to the size of the company, rather than its profits. This gives managers an incentive to grow the company and increase its sales turnover and assets, rather than to increase the returns to the company's shareholders.
- Managements are more likely to want to re-invest profits in order to make the company bigger, rather than pay out the profit as dividend.
- When this happens, companies might invest in capital projects where the expected profitability is quite small.

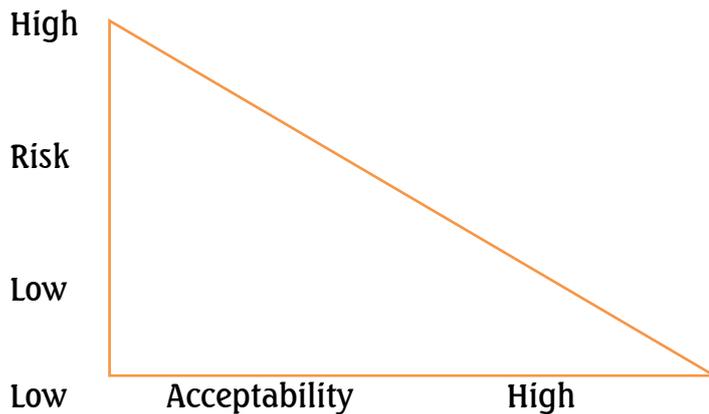
iv) **Risk aversion**

- Executive Directors and Senior Managers usually earn most of their income from the company they work for. They are therefore interested in the stability of the company, because this will protect their jobs and their future income. This means that management might be risk-averse, and reluctant to invest in high-risk projects.
- In contrast, shareholders might want a company to take bigger risks, if the expected return is sufficiently high. Shareholders often invest in a portfolio of different companies, therefore, it matters less to them if an individual company takes risks.

v) **Time horizon**

- Shareholders are concerned about the long-term financial prospects of their company, because, the value of their shares depends on expectations for the long-term future. In contrast, managers might only be interested in the short-term.
- This is partly because they might receive annual bonuses based on short-term performance, and partly because they might not expect to be with the company for more than a few years.
- Managers might have an incentive to increase accounting return on capital employed (or return on investment), whereas, shareholders have a greater interest in long-term value as measured by net present value.

- b. The concept of "As Low As Reasonably Practicable" (ALARP) is a principle that is centred on low risk being more acceptable than high risks. This can be explained through the following diagram.



- The above does not mean that risk should be totally avoided. It only suggests that there is an acceptable level of risk in a given circumstance to achieve a given objective. It is important to remember that risk and return are usually linked in a positive way so that higher return is often associated with higher risk.
  - ALARP, which stands for “As Low As Reasonably Practicable” is a term associated with safety precautions which was derived from UK Health and Safety legislation.
  - The ALARP principle is that it is usually impossible (or if it is possible, it is grossly expensive) to eliminate all risks but that any residual risk should be as low as reasonably practicable. A risk is said to be ALARP when the cost involved in reducing it further would be grossly disproportionate to the benefit gained.
  - ALARP should not be thought of as a simple quantitative measure of cost against benefit, because any safety improvement would not be worthwhile only if the costs were disproportionately more than the benefit achieved. This is a matter of judgment and might vary from country to country.
- c. Relating Impact and Likelihood to objective and subjective risk perception.

Risk assessment is very important for an organisation.

In many cases, it is difficult to assign a value to either likelihood or impact with any degree of accuracy. In this case, subjective judgments must be used.

The following table contains illustrations of risks where impact and likelihood might be objective or subjective.

<b>Objective likelihood measurement</b>	<b>Subjective likelihood measurement</b>
Quality failure in a batch of components (based on previous manufacturing experience)	An oil well disaster occurring this year in Siberia
<b>Objective impact measurement</b>	<b>Subjective impact measurement</b>

The change in interest payments as a result of a 1% increase in interest rates.	Change in a revenue due to change in consumer taste.
---------------------------------------------------------------------------------	------------------------------------------------------

Assessment of a risk based on objective measurement of likelihood and impact is more robust than if based on subjective judgment. This will affect the risk management strategy.

### Examiner's report

This composite question is on Corporate Governance and Risk Management and it tests in part (a) causes of agency conflict, part (b) the concept of ALARP and in part (c) relation of impact and likelihood to objective and subjective risk perception.

Many candidates did not attempt this question.

Performance in parts (a) and (b) was good, however, that in part (c) was dismal.

It is recommended that candidates should cover the entire syllabus in their preparation for the examination.

### Marking guide

		Marks	Marks
(a)	Listing of ways agency conflict can arise (4 x 1/2 mark)	2	
	Explanation of any 4 x 2 marks	<u>8</u>	10
(b) i.	ALARP Diagram	2	
	Explanation of ALARP (3 x 1 mark)	<u>3</u>	<u>5</u>
ii.			
(c)	Introduction (1 x 1/2 mark)	1/2	
	Explanation with Quadrants (4 x 1 mark)	4	
	Conclusion (1 x 1/2 mark)	1/2	<u>5</u>
	<b>Total</b>		<b><u>20</u></b>

## SOLUTION 6

- a. From the scenario:
- i. The Model code requires that:
    - Directors must not deal in shares of the company during 'closed period'. A closed period is the period before the announcement to the stock market of the company's interim or final financial result. Mr John broke this section of the moral code by selling his shares during closed period.
    - Directors must not deal in shares of the company at any time that they have price-sensitive information. Again, Mr John infringed on this section of the code by selling his shares when he has price sensitive information .
    - Before dealing in the company's shares at any other time, a director must obtain a prior permission from the chairman. Again, Mr. John erred on this one by not seeking the permission of the chairman before selling his shares.
  - ii. Critical theory believes that accounting is not objective for the following reasons:
    - Accounting is not objective and value free. It was developed as a tool for government and business leaders to help them maintain their position of power within society. Traditional financial reporting, for example, helps business leaders to retain control over the company they run. Its main focus is on shareholders and profits. Different interest groups (such as shareholders and employees) are treated differently and some have more or better accounting information than others. This position may justify Mr. John's action.
    - Accounting is not objective because it is a social as well as technical process. In any given situation or context, different accountants may have different views arising from cultural differences. All societal attitudes are based on historical conditioning and development of culture, and these attitudes cannot be changed easily because they are deep-rooted in the past.
    - The accountancy profession has created the concept of 'truth' in financial reporting, although the meaning of truth is uncertain and subject to different interpretations.
  - iii. Moral Development: If a person is moral and ethical, he will take moral decisions in the following way:
    - Step 1: recognition of the moral issue or moral dilemma, whenever there is an ethical aspect to a situation. In such a situation, there must be recognition that there is a moral decision to be made. Mr John clearly erred on this, by failing to recognise the moral significance of his decision.

- Step 2: The decision made must be consistent with the course of action that is morally correct.
  - Step 3: The decision-maker must give priority to the moral issue above all other considerations (for example, self-interest).
  - Step 4: the decision-maker must have enough moral strength to implement the decision that he took in steps 2 and 3.
- b. The fundamental principles to which professional accountants are expected to comply are:
- i. Integrity: Honesty and straightforwardness in the discharge of professional dealings. This includes a requirement for 'fair dealing' and truthfulness. Independence of mind and judgment are critical.
  - ii. Objectivity: must not allow professional or business judgment to be affected by bias, conflict of interest and undue influence from others.
  - iii. Professional competence and due care: duty to maintain professional knowledge and skills at a level that enables him to provide competent professional service to clients or employer. Accountants should also act diligently in accordance with relevant technical and professional standards, when doing their work for clients or employer.
  - iv. Confidentiality: respect for confidentiality of information obtained in the course of their work. This applies to confidentiality of information within the firm or employer's organisation as well as confidential information about clients.
  - v. Professional Behaviour: this requires compliance with relevant laws and regulations and ensure that nothing is done to put the profession or organisation into disrepute.

### **Examiner's report**

This question is on Ethics and it tests in part (a) application of the model code, critical theory and moral development to a particular course of action in a scenario and tests the fundamental ethical principles for chartered accountants in part (b).

Many candidates did not attempt this question.

The performance in part (a) was poor, whilst that in part (b) was good. The overall performance was below average.

The poor performance in part (a) was due to candidates mixing up the elements of the different models.

Candidates are advised to pay attention to details of the different models required by the syllabus.

## Marking guide

	Marks	Marks
(a) i. Model Code (3 points x 1 mark)	3	
ii. Critical Theory (3 Points x 1 mark)	3	
iii. (4 Steps x 1 mark each)	<u>4</u>	10
(b) 5 fundamental principles: Mentioning	5	
(c) Explanation	<u>5</u>	<u>10</u>
<b>Total</b>		<b><u>20</u></b>